DEPARTMENT of HEALTH and HUMAN SERVICES

Centers for Disease Control and Prevention

FY 2011 Online Performance Appendix

INTRODUCTION

The FY 2011 Online Performance Appendix is one of several documents that fulfill the Department of Health and Human Services' (HHS) performance planning and reporting requirements. HHS achieves full compliance with the Government Performance and Results Act of 1993 and Office of Management and Budget Circulars A-11 and A-136 through the HHS agencies' FY 2011 Congressional Justifications and Online Performance Appendices, the Agency Financial Report, and the HHS Summary of Performance and Financial Information. These documents are available at http://www.hhs.gov/budget/.

The FY 2011 Congressional Justifications and accompanying Online Performance Appendices contain the updated FY 2009 Annual Performance Report and FY 2011 Annual Performance Plan. The Agency Financial Report provides fiscal and high-level performance results. The HHS Summary of Performance and Financial Information summarizes key past and planned performance and financial information.

MESSAGE FROM THE DIRECTOR

As Director of the Centers for Disease Control and Prevention (CDC) and Administrator of the Agency for Toxic Substances and Disease Registry (ATSDR), I am pleased to present the FY 2011 Online Performance Appendix for the CDC. The report represents the monitoring and management of CDC's portfolio of health protection and preparedness programs.

CDC's mission is to collaborate to create the expertise, information, and tools that people and communities need to protect their health – through health promotion; prevention of disease, injury, and disability; and preparedness for new health threats. CDC seeks to accomplish its mission by working with partners throughout the nation and the world to
- monitor health,
- detect and investigate health problems,
- conduct research to enhance prevention,
- develop and advocate sound public health policies,
- implement prevention strategies,
- promote healthy behaviors,
- foster safe and healthful environments,
- provide leadership and training.

Each of CDC's component organizations undertakes these activities in conducting its specific programs. The steps needed to accomplish this mission are also based on scientific excellence, requiring well-trained public health practitioners and leaders dedicated to high standards of quality and ethical practice. Through the use of performance data, CDC monitors programs, policies and extramural awards to ensure the agency is on track to meet its public health protection goals.

To the best of my knowledge, the performance data reported by CDC for inclusion in the FY 2011 Online Performance Appendix are accurate, complete, and reliable with the following exceptions:
- Measure 4.2.1 – During state-led assessments in 2009, several variables were identified for which sites inconsistently applied proper methods. Efforts to clarify or remove these variables have been implemented.
- Measure 4.2.2 – Accuracy of "Pneumonia" reports was adversely affected due to insufficient documentation and database defects. The program has provided additional clarification on variables and plans to migrate to a new database system in 2010.
- Measure 5.2.2 – The USDA Economic Research Service discontinued its twice annual data updates in 2007. CDC conducted a feasibility study to replace the per capita consumption data source. A new data source has not yet been identified; therefore, CDC is working with HHS, USDA, and the Treasury to reinstate the previous source. Resolution is expected in the fourth quarter of FY 2010.

Sincerely,

Thomas R. Frieden, M.D., M.P.H.
Director, CDC, and
Administrator, ATSDR

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SUMMARY OF TARGETS AND RESULTS

The table below provides a summary of CDC's performance measures.

Fiscal Year	Total Targets	Target with Results Reported	Percent of Targets with Results Reported	Total Targets Met	% of Targets Met
2006	88	88	100%	60.43	69%
2007	112	101	90%	60.67	60%
2008	140	107	76%	72.5	68%
2009	149	62	42%	48	77%
2010	154	N/A	N/A	N/A	N/A
2011	142	N/A	N/A	N/A	N/A

PERFORMANCE DETAIL

INFECTIOUS DISEASES

IMMUNIZATION AND RESPIRATORY DISEASES

Measure	FY	Target	Result
1.E.1: Make vaccine distribution more efficient and improve availability of vaccine inventory by reducing the number of vaccine inventory depots in the U.S. (Outcome)	2011	Maintain 98% reduction in inventory depots	Jan 31, 2012
	2010	Maintain 98% reduction in inventory depots	Jan 31, 2011
	2009	Reduce inventory depots by 98%	Jan 31, 2010
	2008	Reduce inventory depots by 50%	98% reduction (Target Exceeded)
	2007	Reduce inventory depots by approximately 17%	36% reduction (Target Exceeded)
	2006	Award contract to centralize distribution, validate existing baseline	Yes (Target Met)

Unique Identifier	Data Source	Data Validation
1.E.1	Grantee annual report (VFC Management Survey), grantee interviews, and site visits were used to gather the baseline information, and the VFC Management Survey provides annual updates to CDC. The number of depots reported is based on those depots for which CDC is providing distribution funding (only Alaska and the Pacific Islands).	As of July 2008, all grantees have been transitioned to the centralized distributor and the number of depots reported is based only on those depots for which CDC is providing distribution funding (only Alaska and the Pacific Islands). CDC cannot prevent grantees from maintaining depots at their own cost, but has a written policy to ensure grantees understand that federally purchased vaccine is not being stored at such depots.

Efficiency Measure 1.E.1:

The Section 317 grant program was among the first round of programs to undergo OMB's formal program assessment in 2002 with results reported in the FY 2004 budget submission. Assessors gave the 317 program high marks for its design, function, and success in achieving dramatic disease reduction through childhood vaccination. Program assessors from OMB found that the program would be improved by a more specific mechanism to link successful outcomes to program processes and budgets. Subsequent to the assessment, the program initiated the vaccine management business improvement project (VMBIP) to revamp the entire vaccine distribution and ordering process and enhance the efficiency and accountability of vaccine management systems. The reduction of vaccine inventory depots has been achieved ahead of schedule. The program will develop a new efficiency measure to address continued program improvements.

In September 2006, CDC awarded a national centralized vaccine distribution contract to increase the efficiency, visibility, and management of publicly purchased vaccines by centralizing and consolidating vaccine inventory and distribution. As of July 1, 2008, all of the 64 immunization program grantees have successfully transitioned to centralized distribution. The program has met its target for this measure. The number of depots has been reduced by 98 percent (from 396 depots to eight).

Efficiencies anticipated from consolidation of vaccine depots include improved management of vaccine inventory through use of distribution best practices and increased visibility of the location of vaccines throughout the pubic vaccine supply chain. These efficiencies will enhance CDC's ability to address public health emergencies such as vaccine shortages, supplying emergency vaccine needs due to outbreaks, and natural disasters. Full implementation of this new vaccine purchase and distribution operating model is anticipated to gain additional efficiencies by reducing vaccine wastage and reducing inventory holding costs.

LONG TERM OBJECTIVE 1.1: REDUCE THE NUMBER OF INDIGENOUS CASES OF VACCINE-PREVENTABLE DISEASES.

Measure	FY	Target	Result
1.1.1a: Reduce or maintain the number of indigenous cases at 0 by 2010 for the following: Paralytic Polio (Outcome)	2011	0	Sep 30, 2012
	2010	0	Sep 30, 2011
	2009	0	Sep 30, 2010
	2008	0	0 (all ages) (Target Met)
	2007	0	0 (all ages) (Target Met)
	2006	0	0 (Target Met)
1.1.1b: Reduce or maintain the number of indigenous cases at 0 by 2010 for the following: Rubella (Outcome)	2011	10	Sep 30, 2012
	2010	0	Sep 30, 2011
	2009	5	Sep 30, 2010
	2008	8	8 (all ages) (Target Met)
	2007	8	12 (all ages) (Target Not Met)
	2006	15	11 (Target Exceeded)
1.1.1c: Reduce or maintain the number of indigenous cases at 0 by 2010 for the following: Measles (Outcome)	2011	100	Sep 30, 2012
	2010	0	Sep 30, 2011
	2009	25	Sep 30, 2010
	2008	35	115 (all ages) (Target Not Met)
	2007	45	14 (all ages) (Target Exceeded)
	2006	50	24 (Target Exceeded)
1.1.1d: Reduce or maintain the number of indigenous cases at 0 by 2010 for the following: Haemophilus influenzae (Outcome)	2011	0	Sep 30, 2012
	2010	0	Sep 30, 2011
	2009	75	Sep 30, 2010
	2008	150	193 (b + unknown) (children under 5) (Target Not Met but Improved)
	2007	150	202 (b + unknown) (children under 5) (Target Not Met)
	2006	150	208b + unknown (Target Not Met)
1.1.1e: Reduce or maintain the number of indigenous cases at 0 by 2010 for the following: Diphtheria (Outcome)	2011	0	Sep 30, 2012
	2010	0	Sep 30, 2011
	2009	3	Sep 30, 2010
	2008	4	0 (persons under 35 years of age) (Target Exceeded)

Measure	FY	Target	Result
	2007	4	0 (persons under 35 years of age) (Target Exceeded)
	2006	5	0 (Target Exceeded)
1.1.1f: Reduce or maintain the number of indigenous cases at 0 by 2010 for the following: Congenital rubella Syndrome *(Outcome)*	*2011*	0	Sep 30, 2012
	2010	0	Sep 30, 2011
	2009	2	Sep 30, 2010
	2008	3	0 (children under one) (Target Exceeded)
	2007	4	0 (children under one) (Target Exceeded)
	2006	5	0 (Target Exceeded)
1.1.1g: Reduce or maintain the number of indigenous cases at 0 by 2010 for the following: Tetanus *(Outcome)*	*2011*	0	Sep 30, 2012
	2010	0	Sep 30, 2011
	2009	8	Sep 30, 2010
	2008	10	6 cases (persons under 35 years of age) (Target Exceeded)
	2007	13	6 (persons under 35 years of age) (Target Exceeded)
	2006	25	12 (Target Exceeded)
1.1.2: Reduce the number of indigenous cases of mumps in persons of all ages from 666 (1998 baseline) to 0 by 2010. *(Outcome)*	*2011*	350	Sep 30, 2012
	2010	0	Sep 30, 2011
	2009	100	Sep 30, 2010
	2008	200	418 (Target Not Met but Improved)
	2007	200	800 (Target Not Met but Improved)
	2006	200	6,584 (Target Not Met)
1.1.3: Reduce the number of indigenous cases of pertussis among children under 7 years of age. *(Outcome)*	*2011*	2,000	Sep 30, 2012
	2010	2,000	Sep 30, 2011
	2009	2,150	Sep 30, 2010
	2008	2,300	4,166 (Target Not Met)
	2007	2,300	3,106 (Target Not Met but Improved)
	2006	2,300	3,841 (Target Not Met but Improved)
1.1.4: Reduce or eliminate indigenous cases of Varicella (persons 17 years of age and under). *(Outcome)*	*Out-year Target*	100,000 (2020)	9/2021
	2011	200,000	9/2011
	2101	223,000	9/2010
	2007	Baseline	582,535

Unique Identifier	Data Source	Data Validation
1.1.1 1.1.2 1.1.3	**Data Source:** National Notifiable Disease Surveillance System (NNDSS), National Congenital Rubella Syndrome Registry (NCRSR), Active Bacterial Core Surveillance (ABCs), Emerging Infections Programs.	NNDSS - CDC receives reports of notifiable diseases from the 50 state health departments, New York City, the District of Columbia, and five U.S. Territories. These reports are initiated when health care providers suspect or diagnose a case of a notifiable disease. Clinical laboratories also report results consistent with reportable diseases. Reporting of nationally notifiable diseases to CDC by the states is voluntary and only mandated (i.e., by state legislation or regulation) at the state level. All case reports, especially for low incidence and internationally quarantinable diseases, must be verified by the appropriate state officials. NNDSS case counts are likely incomplete, and therefore, these data are considered to represent a minimum number of cases. State reporting practices and some administrative procedures used in processing the NNDSS data may impact surveillance data reports and analyses. CDC staff provides technical assistance relevant for data verification to ensure data accuracy, completeness, and timeliness. Specifically, assistance includes: computer specifications and software for reporting from state and territorial health departments, development and implementation of procedures to validate surveillance data, and identification of incomplete records, transmission errors, and deviations from expected numbers. NCRSR - CDC maintains the NCRSR with supplemental information to NNDSS. The registry includes data only on cases classified as confirmed or compatible. Cases are also classified as indigenous (exposure within the U.S.) and imported (exposure outside the U.S.) and are tabulated by year of birth. In contrast, cases reported to the NNDSS are tabulated by year of report. ABCs is an active laboratory and population-based surveillance system for invasive bacterial pathogens of public health importance, and currently operates in 10 sites in the U.S. For each case of invasive disease in the surveillance population, a case report with basic demographic information is completed and bacterial isolates are sent to CDC and other reference laboratories for additional laboratory evaluation. The ABCs program provides routine laboratory audits to ensure the completeness of data collection. Each month, CDC staff review data and communicate potential errors to state personnel for evaluation. Performance standards for active surveillance have been established in each site to permit aggregation of data collected via somewhat different approaches. Detailed instructions for completion of case report forms ensure consistency across sites. Timeliness and completeness of reporting in ABCs is evaluated using threshold percentages of isolate collection and enrollment into special studies. Surveillance fatigue or operational problems are assessed using isolate shipping schedules, audit sensitivities, and the timeliness of the audit data being completed by set deadlines.
1.1.4	National Health Interview Survey	NHIS is a cross-sectional household interview survey. Households chosen for interviews are a probability sample representative of the target population. Data are collected

Unique Identifier	Data Source	Data Validation
		through a personal household interview conducted by staff employed and trained by the U.S. Census according to procedures delineated by CDC. The survey sample is designed to yield estimates that are representative and that have acceptably small variations.

Long-term Objective 1.1, Performance Measure 1

Vaccination programs have made a major contribution to the elimination of many vaccine-preventable diseases and significantly reduced the incidence of others. National recommendations provide guidance for use of vaccine to prevent or eliminate 17 vaccine-preventable diseases. Nine of the 17 diseases currently vaccine-preventable are represented by this objective to reduce the incidence of indigenous cases of vaccine-preventable disease. The sub-objectives for Long-Term Objective 1.1 correspond to many of the diseases prevented by vaccine coverage objectives tracked in Long-Term Objective 1.2 which ensure that children age 19 to 35 months are appropriately vaccinated.

The ambitious 2010 targets for these sub-objectives are consistent with the Healthy People (HP) 2010 goals set prior to 2000. Some targets are under consideration. FY 2011 targets reflect levels more realistic in light of the current environment for various vaccine-preventable diseases. For instance, tetanus is a non-infectious vaccine-preventable disease which is naturally occurring in the environment, thus a disease reduction goal of zero is not realistic, even with universal vaccination. The process for developing goals and targets for HP 2020 is progressing. The Healthy People goal review process will initiate extensive program-level consideration of objectives and corresponding targets for the next decade. In cases in which the program is consistently not meeting its targets, consideration is given for how targets can be set more appropriately through the HP 2020 process.

In 2008, a total of 140 cases of measles were reported in the United States, of which 25 were classified as imported cases and 115 were classified as indigenous (acquired in the United States). The HP 2010 and GPRA goal is indigenous measles cases, therefore, in 2008 the goal of less than 35 cases was not achieved. Some of the imported cases in 2008 occurred in areas with low vaccination coverage rates, resulting in outbreaks of measles largely among school-aged children who were eligible for vaccination but whose parents chose not to have them vaccinated. For the foreseeable future, measles importations into the United States will continue to occur because measles is still common in Europe and other regions of the world. Within the United States, the current national measles, mumps, rubella (MMR) vaccine coverage rate is adequate to prevent the sustained spread of measles. However, importations of measles likely will continue to cause outbreaks in communities that have sizeable clusters of unvaccinated persons.

Reaching the 2010 goal of zero cases of measles may be unlikely for multiple reasons, and there are factors that make it unlikely that the target will be achieved or exceeded each year. The number of imported cases and the locations in which those cases occur greatly impact the number of indigenous cases, the majority of which are acquired (spread) from imported cases. In addition, 1) measles is still endemic in many parts of the world; 2) no vaccine, including the MMR vaccine, is 100 percent effective; and 3) some groups of persons in the United States, including infants less than 12 months and persons with severe immunocompromising conditions, are not recommended for vaccination. Until measles is eliminated globally, there continues to be a risk of measles transmission to U.S. residents. CDC will continue to work with state health departments and immunization partners to ensure high routine 2-dose MMR coverage and MMR vaccination of selected high-risk groups as defined by the Advisory Committee on Immunization Practices (ACIP). CDC will also continue to be a major partner in the global measles mortality reduction initiative and the regional elimination initiative. Given the continued risk of

measles transmission in the United States, CDC subject matter experts have considered the above mentioned issues when recommending the HP 2020 goal for measles.

The Pan American Health Organization developed a comprehensive strategy in 2004 to eliminate rubella and Congenital Rubella Syndrome (CRS) from the Americas by 2010. In 2004, the endemic transmission of rubella was declared eliminated from the United States. Countries have demonstrated progress toward the rubella and CRS elimination goal. Of the total 16 cases of rubella in the United States in 2008, eight were associated with importation from another country.   Though the sources for the remaining eight cases of rubella are unknown, there is no evidence that endemic transmission continues in the United States. Until rubella is eliminated from the Americas and other countries, rubella cases may be imported to the United States from international sources. In light of this, the targets may be reconsidered as part of the HP 2020 process.

Haemophilus influenzae type B (Hib) conjugate vaccines for the prevention of Hib are highly effective. Hib is no longer the leading cause of meningitis among children younger than five years old in the United States. Rates of Hib remain relatively stable in the United States over the past five years. In accordance with the HP 2010 goal, this measure includes both type b cases (for which vaccine would be effective) and those with unknown serotypes. The majority of these cases have unknown or missing serotype, so the total number of Hib cases is unconfirmed. Neither HP 2010 targets nor GPRA targets have been adjusted to account for cases with unknown serotype. Therefore, the actual number of Hib cases may be less than 150, and small changes in the number of possible cases should be interpreted with caution. To address this issue of incomplete serotyping, CDC is working with state partners to provide technical assistance for enhanced Hib serotyping and to identify systematic errors in data transmission.   In fact, CDC data suggests that the decrease in Hib cases reported here reflects improvements in serotype reporting and a decrease in cases with unknown serotype rather than improvements in Hib control.   As the program sets forth goals for the next decade through the HP 2020 process, Hib reduction targets and measures may be revised to ensure that reductions in Hib disease are more clearly distinguishable.   For FY 2008, there were 30 cases of Hib, and 163 cases with unknown/missing serotype in children under five years of age.

Long-term Objective 1.1, Performance Measure 2

In 2008, there were 451 cases of mumps in the U.S, and 418 of those cases were indigenous. Although this represents a dramatic drop from the 800 cases in 2007, the target is unmet. The mumps disease targets were not met in FY 2006 due to a large national mumps outbreak that began in December 2005 and peaked in 2006 with 6,584 reported cases. During FY 2007, a higher number of mumps cases continued to be reported than before the 2006 outbreak likely due to higher awareness and enhanced surveillance, as well as a true increase in the number of cases as a consequence of the large outbreak. As a result of the 2006 outbreak, vaccination recommendations were modified in 2006 to better define evidence of immunity, ensure routine two-dose vaccination for high risk adult groups including college students and healthcare workers, and address additional vaccination needs for persons in outbreak settings.

Surveillance activities have also been enhanced to encourage reporting of all confirmed and probable mumps cases. Surveillance definitions for confirmed, probable, and suspect mumps cases were revised by the Council for State and Territorial Epidemiologists (CSTE), in collaboration with CDC in 2007 and the new definitions went into effect on January 1, 2008. CDC is currently involved in studies to assess the level of protection from mumps from one and two doses of measles, mumps and rubella (MMR) vaccine to better understand why the 2006 outbreak occurred and use the information to prevent future outbreaks. CDC is also working to develop better laboratory tests to reliably diagnose mumps, especially in vaccinated persons.

Prior to FY 2004, there was some progress in mumps disease reduction - reflected by a two-thirds reduction in cases from FY 1998 (666 cases) to FY 2003 (231 cases) meeting the reduction target that

year of 250 cases. However, in FY 2004, the reduction target was 200 and the number of reported mumps cases was 258, thus CDC did not meet the disease reduction target for that year or for FY 2005. Studies conducted during a small mumps outbreak in Maine in 2005 and during the large 2006 mumps outbreak showed that two doses of mumps or MMR vaccine was 79 percent - 91 percent effective in preventing mumps with lower effectiveness (79-88 percent) in settings of high exposure and transmission (college campuses). Thus, given the effectiveness of two doses of mumps vaccine and the continued risk of mumps importations, meeting the 2010 goal of zero indigenous cases is not feasible. Additionally, importations of mumps into the United States will continue because only 58 percent of countries around the world use mumps vaccines, and it is expected that some spread will occur from these cases. As a result of lessons learned during the 2006 mumps outbreak, CDC has consulted with state health departments, and with laboratory, immunology, and mumps disease subject matter experts to reassess the current mumps targets to determine if changes need to be made. As part of the HP 2020 objective-setting process, CDC is proposing a disease reduction objective as opposed to disease elimination.

Long-term Objective 1.1, Performance Measure 3

Pertussis (whooping cough) is a highly contagious, vaccine-preventable bacterial illness characterized by prolonged and severe cough. Although pertussis affects all age groups, complications and death are most frequently recognized among unvaccinated infants. The FY 2008 target was to reduce the number of pertussis cases among children under seven years of age to 2,300. The actual number of cases in this age group was 4,166. Many cases occur among infants who are exposed to pertussis before they have received the complete series of vaccinations at 15-18 months. Introduction in 2006 of adolescent and adult versions of improved acellular pertussis vaccines combined with a tetanus and diphtheria booster (Tdap vaccine) provides new opportunities for reducing severe pertussis and its complications in all age groups in the United States. This measure and corresponding targets are consistent with HP 2010 goals. The 1998 baseline for this performance measure was 3,417; advances in disease surveillance and diagnostics for pertussis have dramatically increased the number of reported cases since the HP 2010 target of 2,000 cases was set a decade ago. A review of prior performance indicates that targets set a decade ago were possibly too ambitious and have not been adjusted to account for progress in diagnostics and disease surveillance. CDC pertussis subject matter experts and infectious disease control partners are reconsidering this goal through the HP 2020 process. It is possible to adjust targets for HP 2020, but is it also important to consider whether or not this performance measure, given performance to date, continues to be the best one to demonstrate progress in the prevention and control of pertussis.

Long-term Objective 1.1, Performance Measure 4

Vaccination programs have made a major contribution to the elimination of many vaccine-preventable diseases and significantly reduced the incidence of others. National recommendations provide guidance for use of vaccine to prevent or eliminate 17 vaccine-preventable diseases. Nine of the 17 diseases currently vaccine-preventable are represented by this objective to reduce the incidence of indigenous cases of vaccine-preventable disease. The annual morbidity in the United States from varicella in the twentieth century was 4,000,000 cases during 1980-1990. NHIS data indicates there were 582,535 varicella cases in 2007.

CDC supports efforts to plan, develop, and maintain a public health infrastructure that helps assure high coverage levels for all recommended childhood vaccines, including varicella, and low incidence of vaccine-preventable diseases. The Vaccines for Children (VFC) Program provides vaccines to uninsured, Medicaid eligible and Native American and Alaska Native children and adolescents and to underinsured children and adolescents when they are served in a federally qualified health center. Underinsured children and adolescents, as well as, uninsured or underinsured adults may receive vaccines through the Section 317 Immunization Grant Program. In addition, the Section 317 Program supports immunization infrastructure activities including vaccine safety, surveillance, communication, and research activities.

CDC works with state and local public health through all of these activities to encourage high vaccination coverage rates for varicella and other recommended vaccines.

Varicella incidence based on NHIS data indicate a decline from a baseline of 2,228,000 cases in 1999 to 582,535 cases in 2007.There is some fluctuation in trend data because of the data reported is based on personal report and not validated by medical record review. In addition, as an increasing proportion of varicella cases occur in vaccinated individuals, the disease presentation is less severe and can be more readily confused with other conditions. This probably results in both under-diagnosis and over-diagnosis of the condition.

Vaccination coverage rates for existing vaccines are high, but each year a new cohort of children are born and the program must make the same efforts to assure the vaccination of these children as was needed with the preceding cohorts. In addition, the program faces the challenges of breakthrough varicella, parents hesitant to vaccinate, global travel, and the difficulties of introducing new vaccines into the schedule.

To sustain current high coverage rates and increase coverage rates for vaccines that have not yet reached the 90 percent target, CDC provides funding, guidance, and technical assistance to state and local immunization programs so that they may conduct provider assessments, develop and utilize immunization information systems, utilize coverage assessment information from the National Immunization Survey, and provide education and training to both public and private immunization providers. Vaccination coverage rates for children and cases of diseases are carefully monitored to assure that outbreaks are rapidly addressed. CDC will continue to work with state health departments and immunization partners to ensure high routine 2-dose varicella coverage as recommended by the Advisory Committee on Immunization Practices (ACIP) in 2006.

LONG TERM OBJECTIVE 1.2: ENSURE THAT CHILDREN AND ADOLESCENTS ARE APPROPRIATELY VACCINATED.

Measure	FY	Target	Result
1.2.1a: Achieve or sustain immunization coverage of at least 90% in children 19- to 35-months of age for: 4 doses DTaP vaccine *(Output)*	2011	At least 90% coverage	Sep 30, 2012
	2010	At least 90% coverage	Sep 30, 2011
	2009	At least 90% coverage	Sep 30, 2010
	2008	At least 90% coverage	85% (Target Not Met)
	2007	At least 90% coverage	85% (Target Not Met)
	2006	At least 90% coverage	85% (Target Not Met)
1.2.1b: Achieve or sustain immunization coverage of at least 90% in children 19- to 35-months of age for: 3 doses Hib vaccine *(Output)*	2011	At least 90% coverage	Sep 30, 2012
	2010	At least 90% coverage	Sep 30, 2011
	2009	At least 90% coverage	Sep 30, 2010
	2008	At least 90% coverage	91% (Target Exceeded)
	2007	At least 90% coverage	93% (Target Exceeded)
	2006	At least 90% coverage	93% (Target Exceeded)
1.2.1c: Achieve or sustain immunization coverage of at least 90% in children 19-	2011	At least 90% coverage	Sep 30, 2012
	2010	At least 90% coverage	Sep 30, 2011
	2009	At least 90% coverage	Sep 30, 2010

Measure	FY	Target	Result
to 35-months of age for: 1 dose MMR vaccine *(Output)*	2008	At least 90% coverage	92% (Target Exceeded)
	2007	At least 90% coverage	92% (Target Exceeded)
	2006	At least 90% coverage	92% (Target Exceeded)
1.2.1d: Achieve or sustain immunization coverage of at least 90% in children 19- to 35-months of age for: 3 doses hepatitis B vaccine *(Output)*	2011	At least 90% coverage	Sep 30, 2012
	2010	At least 90% coverage	Sep 30, 2011
	2009	At least 90% coverage	Sep 30, 2010
	2008	At least 90% coverage	94% (Target Exceeded)
	2007	At least 90% coverage	93% (Target Exceeded)
	2006	At least 90% coverage	93% (Target Exceeded)
1.2.1e: Achieve or sustain immunization coverage of at least 90% in children 19- to 35-months of age for: 3 doses polio vaccine *(Output)*	2011	At least 90% coverage	Sep 30, 2012
	2010	At least 90% coverage	Sep 30, 2011
	2009	At least 90% coverage	Sep 30, 2010
	2008	At least 90% coverage	94% (Target Exceeded)
	2007	At least 90% coverage	93% (Target Exceeded)
	2006	At least 90% coverage	93% (Target Exceeded)
1.2.1f: Achieve or sustain immunization coverage of at least 90% in children 19- to 35-months of age for: 1 dose varicella vaccine *(Output)*	2011	At least 90% coverage	Sep 30, 2012
	2010	At least 90% coverage	Sep 30, 2011
	2009	At least 90% coverage	Sep 30, 2010
	2008	At least 90% coverage	91% (Target Exceeded)
	2007	At least 90% coverage	90% (Target Met)
	2006	At least 90% coverage	88% (Target Not Met)
1.2.1g: Achieve or sustain immunization coverage of at least 90% in children 19- to 35-months of age for: 4 doses pneumococcal conjugate vaccine (PCV7) *(Output)*	2011	At least 90% coverage	Sep 30, 2012
	2010	At least 90% coverage	Sep 30, 2011
	2009	At least 90% coverage	Sep 30, 2010
	2008	At least 90% coverage	80% (Target Not Met but Improved)
	2007	At least 90% coverage	75% (Target Not Met but Improved)
	2006	At least 90% coverage	68% (Target Not Met)
1.2.2: Achieve or sustain immunization coverage of at least 90% in adolescents 13 to 15 years of age for: 1 dose of Td containing vaccine *(Output)*	2011	90% coverage	Sep 30, 2012
	2010	90% coverage	Sep 30, 2011
	2009	90% coverage	Sep 30, 2010
	2008	90% coverage	71% (Target Not Met but Improved)
	2007	90% coverage	69% (Target Not Met but Improved)
	2006	Baseline	56.7%

Long-term Objective 1.2, Performance Measure 1

The Advisory Committee on Immunization Practices (ACIP) Recommended Childhood and Adolescent Immunization Schedule advises routine vaccination of children for the above diseases. As childhood immunization coverage rates increase, cases of vaccine-preventable diseases decline significantly.

Vaccination coverage rates for existing vaccines are high, but each year a new cohort of children are born and the program must make the same efforts to assure the vaccination of these children as was needed with the previous cohorts. The 90 percent coverage goal is ambitious because, as new vaccines are added to the childhood immunization schedule, sustaining 90 percent vaccination coverage with vaccines recommended for some time while trying to achieve 90 percent coverage with vaccines recently recommended becomes increasingly difficult.

- The target of 90 percent coverage was met in FY 2008 for all routinely recommended pediatric vaccines with the exception of pneumococcal conjugate vaccine (PCV7) and the fourth dose of Diphtheria-Tetanus-acellular Pertussis (DTaP). Five of the routinely recommended vaccines exceeded the 90 percent coverage target: Hib, MMR, hepatitis B, polio, and varicella. Though still above the 90 percent coverage target, coverage with three or more doses of Hib vaccine decreased from 93 percent in 2007 to 91 percent in 2008. The decrease was likely due to the shortage of Hib vaccine and the recommendation to defer the routine Hib vaccine booster dose administered at age 12-15 months.

- The prevention of pneumococcal infections with PCV7 is becoming more important because of problems with treatment due to antibiotic resistance. Coverage with four doses of PCV7 increased significantly from 68 percent in 2006 to 80 percent in 2008, a substantial increase since PCV7 was first recommended in 2000. Please refer to the detailed discussion of PCV7 in the narrative for Long Term Objective 1.4, Performance Measure 1, regarding reduction of pneumococcal disease rates in children and older adults.

- Coverage with four doses of DTaP has not changed during the past six years. In FY 2008, the coverage rate for four doses of DTaP vaccine continues to be 85 percent. This goal continues to be difficult to achieve because it requires that the fourth dose be given to the child between 15 and 18 months of age. The administration of DTaP tends to coincide with regular well-baby visits through the third dose; however, the fourth dose does not, therefore it requires a visit specifically for this purpose. Coverage rates are 96 percent for the first three doses of DTaP; however there is a decrease in coverage for the fourth dose.

- Nearly one million two-year olds in the United States have not received one or more of the recommended vaccines. Even though coverage levels for immunized children by age two are high nationally and in many states, pockets of need, or areas within each state and major city where substantial numbers of under-immunized children reside, continue to exist.

To sustain current high coverage rates and increase coverage rates for vaccines that have not yet reached the 90 percent target, CDC provides funding, guidance, and technical assistance to state and local immunization programs so that they may conduct provider assessments, develop and utilize immunization information systems, utilize coverage assessment information from the National Immunization Survey, and provide education and training to both public and private immunization providers. Vaccination coverage rates for children are assessed annually by the National Immunization Survey and results are released to the public. http://www.cdc.gov/media/pressrel/208/r080904.htm

Long-term Objective 1.2, Performance Measure 2

New vaccine recommendations warrant the addition of an adolescent component to the longstanding childhood immunization goal as fully vaccinating a child now extends to the adolescent years. Beginning in 2005 and 2006, 11 and 12 year olds are recommended to receive three vaccines (tetanus, diphtheria, acellular pertussis [Tdap], meningococcal conjugate [MCV4], and human papillomavirus [HPV] vaccines). Initially, the program is only reporting performance for Td containing vaccine; however, performance for MCV4 is planned to begin being reported in 2012 and for HPV beginning in 2013. Td-containing vaccines have been recommended for routine use among adolescents for well over five years. This newly formulated booster vaccine Tdap is a replacement vaccine rather than a newly recommended vaccine.

Consistent with the corresponding childhood measure in this goal, performance for newly recommended adolescent vaccines will be reported in GPRA five years after ACIP recommends the vaccine and data becomes available. The performance reporting delay occurs because it takes time for the public and private sector immunization infrastructure to adjust to ensure program components are in place to implement the recommendation and assess vaccination coverage. Also, new vaccine implementation is dependent upon state-level policy decisions that impact which vaccines will be available through the Section 317 immunization program at public health clinics.

In 2008, vaccination coverage for adolescents aged 13 - 15 years increased to 71 percent from 69 percent in 2007 for at least one dose of Td containing vaccine, and reflects significant gains when compared to the 2006 baseline of 57 percent.

LONG TERM OBJECTIVE 1.3: INCREASE THE PROPORTION OF ADULTS WHO ARE VACCINATED ANNUALLY AGAINST INFLUENZA AND EVER VACCINATED AGAINST PNEUMOCOCCAL DISEASE.

Measure	FY	Target	Result
1.3.1a: Increase the rate of influenza and pneumococcal vaccination in persons 65 years of age and older to 90% by 2010. influenza *(Output)*	*2011*	90%	Jan 31, 2013
	2010	90%	Jan 31, 2012
	2009	85%	Jan 31, 2011
	2008	85%	67% (Target Not Met)
	2007	74%	67% (Target Not Met but Improved)
	2006	74%	64% (Target Not Met but Improved)
1.3.1b: Increase the rate of influenza and pneumococcal vaccination in persons 65 years of age and older to 90% by 2010. pneumococcal *(Output)*	*2011*	90%	Jan 31, 2013
	2010	90%	Jan 31, 2012
	2009	80%	Jan 31, 2011
	2008	80%	60% (Target Not Met but Improved)
	2007	69%	58% (Target Not Met but Improved)
	2006	69%	57% (Target Not Met but Improved)
1.3.2a: Increase the rate of vaccination among non-institutionalized high-risk adults aged 18 to 64 years to 60% by 2010 for: influenza	*2011*	60%	Jan 31, 2013
	2010	60%	Jan 31, 2012
	2009	40%	Jan 31, 2011
	2008	40%	39% (Target Not Met but Improved)

Measure	FY	Target	Result
(Output)	2007	32%	36% (Target Exceeded)
	2006	32%	34% (Target Exceeded)
1.3.2b: Increase the rate of vaccination among non-institutionalized high-risk adults aged 18 to 64 years to 60% by 2010 for: pneumococcal *(Output)*	2011	60%	Jan 31, 2013
	2010	60%	Jan 31, 2012
	2009	35%	Jan 31, 2011
	2008	35%	25% (Target Not Met but Improved)
	2007	22%	24% (Target Exceeded)
	2006	22%	23% (Target Exceeded)

Unique Identifier	Data Source	Data Validation
1.3.1	National Health Interview Survey (NHIS)	NHIS is a cross-sectional household interview survey. Households chosen for interviews are a probability sample representative of the target population. The annual response rate is more than 90 percent of eligible households in the sample. NHIS has three modules: 1) The basic module remains largely unchanged from year to year and allows for trend analysis. Data from more than one year can also be pooled to increase the sample size for analytic purposes. The basic module contains a family core, a sample adult core, and a child core through which data are collected on the family unit and from one randomly selected adult and child. 2) Periodic modules collect more detailed information on some of the topics included in the basic module. 3) Topical modules respond to new data needs as they arise. Data are collected through a personal household interview conducted by staff employed and trained by the U.S. Census according to procedures delineated by CDC. Data are reviewed and analyzed extensively to ensure their validity and reliability. The survey sample is designed to yield estimates that are representative and that have acceptably small variations. Before the actual survey, cognitive testing is performed by CDCs Questionnaire Design Research laboratory, and pretests are conducted in the field. Once collected, data are carefully edited, checked, and compared to data from earlier surveys and/or independent sources. Staff members

Unique Identifier	Data Source	Data Validation
		calculate descriptive statistics and perform in-depth analyses, which result in feedback on the analytic usefulness of the data.
1.3.2	National Health Interview Survey (NHIS)	NHIS is a cross-sectional household interview survey. Households chosen for interviews are a probability sample representative of the target population. The annual response rate is more than 90 percent of eligible households in the sample. NHIS has three modules: 1) The basic module remains largely unchanged from year to year and allows for trend analysis. Data from more than one year can also be pooled to increase the sample size for analytic purposes. The basic module contains a family core, a sample adult core, and a child core through which data are collected on the family unit and from one randomly selected adult and child. 2) Periodic modules collect more detailed information on some of the topics included in the basic module. 3) Topical modules respond to new data needs as they arise. Data are collected through a personal household interview conducted by staff employed and trained by the U.S. Census according to procedures delineated by CDC. Data are reviewed and analyzed extensively to ensure their validity and reliability. The survey sample is designed to yield estimates that are representative and that have acceptably small variations. Before the actual survey, cognitive testing is performed by CDCs Questionnaire Design Research laboratory, and pretests are conducted in the field. Once collected, data are carefully edited, checked, and compared to data from earlier surveys and/or independent sources. Staff members calculate descriptive statistics and perform in-depth analyses, which result in feedback on the analytic usefulness of the data.

Long-term Objective 1.3, Performance Measure 1

During the past decade, vaccination coverage levels among older adults increased slightly as CDC implemented national strategies and promoted adult immunization among healthcare providers and state and local governments. Influenza vaccination coverage levels among the elderly have increased from 64 percent in 1998 to 67 percent in the 2007-2008 influenza season. Despite recent vaccine availability issues, the increase in vaccination coverage began to slow before 2000. The plateau is not fully

understood. Because large gaps remain between existing coverage levels and some of the targets for subsequent years, CDC will be reviewing and potentially revising out-year targets as part of the Healthy People 2020 process.

CDC and partners such as the National Influenza Vaccine Summit will continue to aggressively promote vaccination. Healthcare provider recommendations for vaccination are very influential in an adult's decision to receive influenza vaccine. CDC, along with the National Influenza Vaccine Summit, will target educational and communication efforts to healthcare providers. These efforts will include encouraging healthcare providers to recommend influenza vaccine to their patients and encouraging vaccination of healthcare providers, a recommended group with consistently low vaccine coverage. Efforts will also be focused on eliminating disparities in coverage.

The percentage of adults aged 65 years and over who had ever received a pneumococcal vaccination increased from 50 percent in 1999 to 60 percent in 2008. CDC has worked with the Centers for Medicaid and Medicare Services to raise the reimbursement rate for influenza and pneumococcal vaccines. Similar challenges apply to pneumococcal vaccination in adults as for influenza vaccination. Because large gaps remain between existing coverage levels and some of the targets for subsequent years, CDC will be reviewing and potentially revising out-year targets as part of the Healthy People 2020 process.

During the reporting of FY 2007 data for this measure it was determined that prior performance reports for 2003, 2005, and 2006 in the performance appendix about the vaccination of older adults age 65 and older were based on National Immunization Survey data rather than the National Health Interview Survey. The previously reported data has been adjusted because the National Health Interview Survey is, and has been for some time, the approved data source for this performance measure. Prior reporting was corrected to ensure that the adult immunization performance narrative about data analysis and trends is consistent and accurate.

Long-term Objective 1.3, Performance Measure 2

The Advisory Committee on Immunization Practices (ACIP) Recommended Adult Immunization Schedule advises vaccination for influenza for adults at high risk of complications each year and pneumococcal vaccination for those persons at high risk. Current levels of coverage among adults vary widely among different age, risk, and racial and ethnic groups. High-risk adults aged 18 to 64 years may not have insurance coverage for influenza and pneumococcal vaccines, may make fewer visits for preventive care, and may not be aware of influenza and pneumococcal vaccination recommendations. Persons with high-risk conditions, such as heart disease and diabetes, remain at increased risk from these diseases.

The estimated influenza vaccination coverage for non-institutionalized persons 18-64 years with high risk conditions increased from 36 percent in 2007 to 39 percent in 2008, and the estimated pneumococcal vaccinations coverage increased from 24 percent in 2007 to 25 percent in 2008. CDC has been working with partner groups to increase awareness of influenza and pneumococcal vaccination recommendations among healthcare providers and the public.

CDC sponsors the annual National Influenza Vaccination Week (NIVW) each December. This event is designed to highlight the importance of continuing influenza (flu) vaccination, as well as foster greater use of flu vaccine through the months of November, December, and beyond. Extending the influenza vaccination season beyond November is one strategy for increasing the number of vaccinated adults. CDC is planning to hold NIVW in January 2010, but plans to remain flexible given the uncertainties related to the influenza A (H1N1) pandemic.

LONG TERM OBJECTIVE 1.4: PROTECT AMERICANS FROM INFECTIOUS DISEASE – PNEUMOCOCCAL.

Measure	FY	Target	Result
1.4.1a: By 2010, reduce the rates of invasive pneumococcal disease in children under 5 years of age to 46 per 100,000 and in adults 65 years and older to 42 per 100,000 Children under 5 years of age *(Outcome)*	*2011*	35	Dec 31, 2012
	2010	46	Dec 31, 2011
	2009	46	Dec 31, 2010
	2008	46	20.9 (Target Exceeded)
	2007	47	21.9 (Target Exceeded)
	2006	48	20.8 (Target Exceeded)
1.4.1b: By 2010, reduce the rates of invasive pneumococcal disease in children under 5 years of age to 46 per 100,000 and in adults 65 years and older to 42 per 100,000 Adults 65 years and older *(Outcome)*	*2011*	35	Dec 31, 2012
	2010	42	Dec 31, 2011
	2009	42	Dec 31, 2010
	2008	42	37.6 (Target Exceeded)
	2007	45	39.2 (Target Exceeded)
	2006	47	40.5 (Target Exceeded)

Unique Identifier	Data Source	Data Validation
1.4.1	The Active Bacterial Core surveillance (ABCs)/Emerging Infections Program Network	The data are collected by 10 states through active contact with all clinical laboratories in population catchment areas; the data are sent to CDC monthly for review, editing, and cleaning. States conduct regular audits for missed cases either monthly or in some cases bi-yearly. Pneumococcal isolates are collected and serotyped at three quality-controlled reference laboratories. Although the data are provided to CDC monthly, the data include cases that have occurred over multiple months. Because ABCs is a very high-quality active surveillance system that seeks to detect and confirm every case identified by all laboratories serving the surveillance population, it is a labor-intensive system. It is necessary to confirm residency and demographics of each case; therefore, for a certain percentage of the cases, confirmation and completion of data collection following review of the medical charts can take several months. When the data are submitted to CDC, it is carefully reviewed and feedback about possible errors are provided to the surveillance sites.

Long-term Objective 1.4, Performance Measure 1

This data indicate that CDC currently is reaching disease reduction targets. In 2000, the first pneumococcal conjugate vaccine (PCV7) was licensed and introduced for use in children in the United States. In the years since licensure, the incidence of invasive pneumococcal disease in children under 5 years dropped dramatically from the prelicensure rates of ~87/100,000 in 1998 and 1999. Rates of invasive pneumococcal disease in children under five years of age were 20.9 per 100,000 in FY 2008. Active surveillance for invasive pneumococcal disease, carried out by the CDCs Active Bacterial Core surveillance (ABCs) of the Emerging Infections Program Network, demonstrated dramatic declines in disease starting almost immediately after PCV7 was introduced. In addition, because of reduced pneumococcal transmission, marked decreases in invasive pneumococcal disease have been demonstrated among all adult age groups, including those 65 years of age and older. For every case of invasive pneumococcal disease prevented through direct vaccination, an additional case was prevented among unvaccinated persons. In FY 2008, the rate of invasive pneumococcal disease among adults 65 years and older was 37.6 per 100,000. Based on these successes, CDC has revised its targets for FY 2011 to 35 cases per 100,000 in children under five years of age and 35 cases per 100,000 among adults 65 years and older.

Monitoring the effects of vaccination after licensure addresses large populations and high risk groups that are often excluded from clinical trials, and reflects the practical realities of immunization delivery. ABCs monitoring demonstrated that PCV7 reduced racial disparities in invasive pneumococcal disease and decreased the incidence and prevalence of drug resistant pneumococcal infections in the general population. Studies now demonstrate that the full benefits and cost-effectiveness of PCV7 greatly exceed those estimated at the time national recommendations for childhood vaccination were made in 2000. Before it was licensed, PCV7 was known to be highly efficacious among fully vaccinated infants, protecting against invasive pneumococcal disease caused by vaccine-types. At the same time, the immunization program faced early challenges for the implementation of this vaccine.

- The vaccine was considered expensive at the time of introduction; incorporating PCV7 into the childhood schedule effectively doubled the cost of routine infant and childhood immunization.

- Soon after routine recommendations were issued, the supply of PCV7 was inadequate to meet demands. Interim recommendations for use of the vaccine according to partial schedules were issued. CDC worked with the vaccine manufacturer, Advisory Committee on Immunization Practices (ACIP), and professional organizations to promote optimal and equitable use of vaccine during those times of shortage. It should be emphasized that the disease reductions experienced in the United States occurred despite these vaccine shortages.

Vaccine supply is now adequate. However, challenges remain. A small increase in disease caused by strains not covered by the pneumococcal conjugate vaccine has been detected in the United States, and CDC is monitoring trends in these strains. Pneumococcal conjugate vaccines that include additional pneumococcal strains not covered by PCV7 are being developed and once they progress to licensure, should they be recommended for widespread use, the program would reset the disease reduction targets for this goal. As part of the Healthy People 2020 process, CDC is reviewing and recommended potential changes to the targets for reducing invasive pneumococcal disease. Monitoring invasive pneumococcal disease and antimicrobial resistance trends before, during, and after introduction of new vaccines remains critical.

LONG TERM OBJECTIVE 1.5: IMPROVE VACCINE SAFETY SURVEILLANCE.

Measure	FY	Target	Result
1.5.1: Improve capacity to conduct immunization safety studies by increasing the total population of managed care organization members from which the Vaccine Safety Datalink (VSD) data are derived annually to 13 million by 2010. *(Output)*	*2011*	10 million	Jun 30, 2012
	2010	10 million	Jun 30, 2011
	2009	10 million	Jun 30, 2010
	2008	10 million	9.1 million (Target Not Met but Improved)
	2007	10 million	9.0 million (Target Not Met)
	2006	10 million	9.0 million (Target Not Met)

Unique Identifier	Data Source	Data Validation
1.5.1	Vaccine Safety Datalink (VSD)	Since VSDs inception, each MCO has prepared annual data files, called Cycle files, which contain member information obtained from administrative files maintained by the individual MCOs. The Cycle files include demographic and medical services information on their members, such as age and gender, health plan enrollment, vaccinations, hospitalizations, outpatient clinic visits, emergency room visits, urgent care visits, procedure codes, mortality data, and additional birth information (e.g. birth weight) when available. To ensure confidentiality and comply with federal regulations, each individual within VSD is assigned a unique, randomized VSD study ID that is not linked to their MCO member ID. VSD study IDs can be used to link data on demographics and medical services. A standardized data dictionary, which ensures data consistency across sites, is updated each year by CDC and the VSD MCOs. Frequently, medical record data and, occasionally, participant survey or interview data are used to validate clinical diagnosis and vaccination data. These additional data along with automated data are de-identified, in which no direct identifiers are collected such as name, medical record number, social security numbers, and license numbers. In addition to these annual Cycle files, VSD additionally updates certain data files (vaccinations, hospitalizations, outpatient clinic visits, emergency room visits, urgent care visits, and certain demographic information) on a weekly to monthly basis in order to conduct active rapid surveillance projects. VSD conducts a number of different processes in order to validate and ensure the accuracy of its data. First, for the annual Cycle files, data quality analyses and reports are generated monthly for each of the sites. Analyses compare data from the most recent to previous years to ensure consistency. In addition, comparisons are made

Unique Identifier	Data Source	Data Validation
		between the individual sites to identify potential data inaccuracies. For the weekly files, data quality analyses and reports are generated on a weekly basis. Furthermore, at times data quality studies are conducted to assess the quality of a specific data element. For example, the VSD has recently begun generating a database to identify pregnant women, their start and end dates, and the pregnancy outcome. There is currently a study being conducted to validate the generated data through chart abstraction. Further, for most studies conducted within the VSD, several data quality assessments are also conducted related to the objectives of that study. Feedback is provided back to the site to improve the data files. Also, each year for the cycle files and at times for the weekly files, the participating sites will also conduct their own data quality assessments. Ad hoc data quality assessments may also be conducted as needed for surveillance or research studies. Both the data management and data quality working groups take the lead in determining the best processes to ensure the accuracy of the data and typically conduct conference calls on a monthly basis with 1-2 in person meetings a year.

Long-term Objective 1.5, Performance Measure 1

Vaccine Safety Datalinks (VSD) is a collaboration between CDC and eight managed care organizations (MCOs): Group Health Cooperative Center (Seattle, Washington), Harvard Pilgrim Health Care (Boston, Massachusetts), Healthpartners Research Foundation (Minneapolis, Minnesota), Kaiser Permanente Colorado (Denver, Colorado), Kaiser Permanente Northwest (Portland, Oregon), Marshfield Clinic Research Foundation (Marshfield, Wisconsin), Northern California Kaiser Permanente (Oakland, California), and Southern California Kaiser Permanente Health Care Plan (Los Angeles, California). The VSD was established in 1990 to improve the evaluation of vaccine safety through the use of active surveillance and epidemiological studies. The VSD provides comprehensive medical and immunization histories for more than 9.1 million people annually, which is three percent of the U.S. population. The VSD project evaluates the safety of newly licensed vaccines, new vaccine recommendations for existing vaccines, clinical disorders following immunizations, and assesses vaccine safety in special high risk populations. In addition, VSD develops and evaluates methodologies for vaccine safety assessment.

The VSD has been used to demonstrate associations between intussusception following Rotasheild vaccination and the risk of seizures following measles, mumps, rubella (MMR) or whole-cell pertussis vaccine. Another valuable contribution of VSD is that it provides a rapid cycle analysis mechanism that can make preliminary assessments of vaccine safety concerns more rapidly than formal studies. This sequential monitoring method is currently being used to study vaccine safety concerns about rotavirus and intussusception, meningococcal conjugate vaccine and Guillain-Barre syndrome, the safety of human papillomavirus vaccine, seasonal influenza virus vaccines, and H1N1 vaccines. In addition, VSD is also being used to analyze a potential vaccine safety signal of febrile seizures following combination measles-mumps-rubella, and varicella vaccine (MMRV). In February 2008, VSD released preliminary results of a study on MMRV that found a slightly higher risk for seizures on day seven to 10 after MMRV compared

to MMR vaccine and varicella vaccine administered separately but at the same visit. CDC continues to investigate this association.

The VSD currently has a total population of over nine million. In FY 2008, the population reached 9.1 million members when the VSD began collecting adult data (=18 years of age) at seven sites. This has allowed the VSD to conduct more vaccine safety studies on adolescents, adults, and pregnant women. The performance target of 10 million for FY08 was not met due to challenges with increasing populations in large-linked databases, which is contingent on cooperating entities, resources, and technologies. Expanding the number of participating managed care organizations is another strategy that would enable VSD to increase the percentage of the U.S. population represented in VSD and help to reach the performance target of 10 million.

PANDEMIC INFLUENZA

LONG TERM OBJECTIVE 1.6: DECREASE THE TIME NEEDED TO DETECT AND REPORT AN INFLUENZA OUTBREAK WITH PANDEMIC POTENTIAL.

Measure	FY	Target	Result
1.6.2: Increase the percentage of Pandemic Influenza Collaborative Agreement grantees (SLTTs) that meet the standard for surveillance and laboratory capability criteria. *(Output)*	*2011*	90%	Dec 31, 2011
	2010	80%	Dec 31, 2010
	2009	70%	NA*see narrative - Did not report
	2008	50%	67% (Target Exceeded)
	2007	Baseline	32%

Unique Identifier	Data Source	Data Validation
1.6.2	Federal Guidance to Assist States in Improving State-Level Pandemic Influenza Operating Plans. Distributed by U.S. Government to American States, Territories, and District of Columbia on March 11, 2008.	Quantitative scores from federal review of public health portions of Pandemic Influenza Operating Plans submitted annually by grantees.

Because of the 2009 novel influenza (H1N1) response and declared Public Health Emergency, states were not required to submit their pandemic influenza OPLANS in 2009, and no assessment was conducted. It is likely that the requirement for submission may be waived again in 2010 while states continue to respond and recover from the current pandemic. |

Long-term Objective 1.6, Performance Measure 2

The measure demonstrates integrated state and local improvements in preparedness and response planning for an influenza pandemic by identifying the extent to which Public Health Emergency Preparedness (PHEP) Cooperative Agreement grantees meet high priority standards in surveillance and laboratory capability planning. The target for FY 2008 (50 percent) used an improvement of 18 percent from the FY 2007 baseline of 32 percent as a foundation. The actual percentage of 67 percent is based on final concluding assessments for state pandemic operating plans in calendar year 2008. The performance target for FY 2008 was set at an approximate target level, and the deviation from that level is slight. There was no effect on overall program or activity performance.

CDC adjusted the target for calendar year 2009 using the target percentage improvement of 15 percent per year that was established in the performance measure. CDC has adjusted the targets for FY 2010 and FY 2011 to a 10 percent improvement, respectively. CDC considers the targets ambitious for multiple reasons:

1. Each grantee dedicates different levels of resources to meet the federal review requirements.

2. Meeting the target will require considerable cooperative actions among grantees as well as continued allocation of CDC resources for technical assistance.

Because of the 2009 novel influenza (H1N1) response and declared Public Health Emergency, states were not required to submit their pandemic influenza OPLANS in 2009, and no assessment was conducted.

Although no formal plan assessments were conducted in 2009, CDC has worked extensively with all project areas on their surveillance and laboratory capabilities as part of the 2009 H1N1 response.

CDC is working extensively with grantees to provide and encourage technical assistance and other strategies to help them strengthen preparedness and response to influenza pandemics. Influenza pandemics pose a sustained threat of serious illness and death that can spread rapidly and simultaneously throughout the United States. CDC is responsible for monitoring and assessing public health components of grantee operation plans that help protect communities and minimize the impact of infection as much as possible. The performance measure will directly assess states and local communities in regard to ongoing improvement of their surveillance and laboratory capability.

HIV/AIDS, VIRAL HEPATITIS, STD, AND TB PREVENTION

DOMESTIC HIV/AIDS PREVENTION

Note: In light of the current development of a National HIV/AIDS Strategy, future modifications of the Domestic HIV/AIDS Prevention program's performance plan may occur.

Measure	FY	Target	Result
2.E.1: Increase the efficiency of core HIV/AIDS surveillance as measured by the cost per estimated case of HIV/AIDS diagnosed each year. *(Efficiency)*	*2011*	$650	Feb 28, 2013
	2010	$650	Feb 23, 2012
	2009	$775	Feb 23, 2011
	2008	$840	Feb 23, 2010
	2007	$870	$699 (Target Exceeded)
	2006	$940	$882 (Target Exceeded)

Unique Identifier	Data Source	Data Validation
2.E.1	HIV/AIDS Reporting System (HARS) is used to collect state HIV and AIDS data, financial assistance information is drawn from administrative records.	CDC conducts validation and evaluation studies of data systems which track AIDS deaths and HIV diagnosis to determine the quality of data generated by them.

Efficiency Measure 2.E.1:

CDC provides financial and technical support to all state health departments, which have the legal authority for mandating and defining processes for reporting of medical conditions, to produce HIV and AIDS surveillance data. These data are used by states to guide their prevention programs. At the national level these data are used to guide allocations of funding for HRSA-funded care and treatment programs and the Housing Opportunities for People with AIDS program supported by HUD. CDC uses HIV/AIDS surveillance data to identify populations most at risk and to guide prevention efforts. However, while national data are available for AIDS cases, national data are not yet available on HIV infections. This is because states have historically used several different methods for collecting data on HIV infection: name-based, code-based, or name-to-code. In 2005, CDC recommended that all states and territories adopt confidential, name-based surveillance systems to report HIV infections. By April 2008, all states had implemented confidential, name-based HIV surveillance. However, not all of these state systems are mature; some states that recently adopted confidential name-based reporting have backlogs of cases. CDC does not report data from states until their HIV reporting systems have matured. HIV data from 34 states were included in the 2007 HIV Surveillance report and data from 37 will be included in the 2008 report. By 2011, CDC expects to have data from 48 states reflected in the HIV surveillance report.

To monitor trends in the epidemic at a national level, CDC analyzes data from states with mature, confidential, name-based HIV surveillance systems. The number of states included in this analysis has risen over the years, as additional states have adopted confidential, name-based HIV surveillance methods, and as those systems are implemented and stabilize.

This measure reflects efficiencies that are being achieved in HIV surveillance nationally. Because CDC historically provided technical and financial support to HIV and AIDS surveillance systems regardless of the type of reporting used, funds allocated to states to conduct core case surveillance are not anticipated to rise dramatically even while more states report data in a format CDC can utilize. Additional efficiencies might also be achieved as surveillance systems work to accommodate increased reports of HIV resulting

from widespread implementation of HIV screening. In 2003, 32 states had sufficiently mature and stable HIV data to include in CDC's analysis of trends. Approximately 32,000 cases of HIV/AIDS were estimated to have been diagnosed in those states in 2003. The cost per estimated diagnosed case (adjusted to 2005 dollars) was $1,357 that year. By 2005, the addition of New York to the analysis increased the number of estimated cases yearly by almost 5,000, thereby increasing the proportion of the national epidemic represented in the surveillance figures. In 2007, CDC reported HIV/AIDS case surveillance data from 34 states and the cost per estimated case reported (adjusted to 2005 dollars), fell to $699. In the coming years, CDC anticipates efficiency gains, as data will be included from those few states that do not yet have sufficiently mature systems. FY 2008 HIV/AIDS reports are not yet available to estimate FY 2008 performance.

LONG TERM OBJECTIVE 2.1: DECREASE THE ANNUAL HIV INCIDENCE RATE.

Measure	FY	Target	Result
2.1.1: Decrease the annual HIV incidence. (Outcome)	Out-Year Target	TBD (2015)	Nov 30, 2017
	2006	Baseline	56,300
2.1.2: Decrease the number of pediatric AIDS cases. (Outcome) [1]	2011	<75	Nov 30, 2012
	2010	<75	Nov 30, 2011
	2009	<75	Nov 30, 2010
	2008	<75	Mar 31, 2010
	2007	<100	28 (Target Exceeded)
	2006	<100	38 (Target Exceeded)
2.1.3: Reduce the black:white rate ratio of HIV/AIDS diagnoses. (Outcome)	2011	8.2:1	Nov 30, 2012
	2010	8.2:1	Nov 30, 2011
	2009	8.2:1	Nov 30, 2010
	2008	8.4:1	Mar 31, 2010
	2007	8.4:1	8.51:1 (Target Not Met but Improved)
	2006	8.7:1	8.88:1 (Target Not Met)
2.1.4: Reduce the Hispanic:white rate ratio of HIV/AIDS diagnoses. (Outcome)	2011	3.3:1	Nov 30, 2012
	2010	3.3:1	Nov 30, 2011
	2009	3.3:1	Nov 30, 2010
	2008	3.4:1	Mar 31, 2010
	2007	3.4:1	3.46:1 (Target Not Met but Improved)
	2006	3.5:1	3.49:1 (Target Exceeded)
2.1.5: Increase the number of states with mature, name-based HIV surveillance systems. (Output)	2011	48	Nov 30, 2012
	2010	46	Nov 30, 2011
	2009	37	Nov 30, 2010
	2008	35	37 (Target Exceeded)
	2007	34	34 (Target Met)
	2006	33	33 (Target Met)
2.1.6: Increase the percentage of HIV prevention program grantees using Program	Out-Year Target	100% (2015)	
	2011	100%	Nov 30, 2012
	2010	100%	Nov 30, 2011

Measure	FY	Target	Result
Evaluation and Monitoring System (PEMS) to monitor program implementation. *(Output)*	*2009*	65%	Nov 30, 2010
	2008	45%	95% (Target Exceeded)
	2007	20%	67% (Target Exceeded)
	2006	Baseline	0
2.1.7: Increase the number of evidence-based prevention interventions that are packaged and available for use in the field by prevention program grantees. *(Output)*	*2011*	20	Jan 31, 2012
	2010	20	Jan 31, 2011
	2009	20	Jan 31, 2010
	2008	18	17 (Target Not Met but Improved)
	2007	15	16 (Target Exceeded)
	2006	N/A	14
2.1.8: Increase the number of agencies trained each year to implement Diffusion of Effective Behavior Interventions (DEBIs). *(Output)*	*2011*	1500	Feb 29, 2012
	2010	1500	Feb 28, 2011
	2009	1100	Feb 23, 2010
	2008	1100	980 (Target Not Met)
	2007	1100	1147 (Target Exceeded)
	2006	N/A	987

[1]Original baseline for measure 2.1.2 is 241 cases in 1998.

Unique Identifier	Data Source	Data Validation
2.1.1	HIV Incidence Surveillance in 25 states.	CDC conducts validation and evaluation studies of the data systems which monitor HIV incidence to determine the quality of data generated by them. Data for 2006 are from 25 areas: Alabama, Arizona, California (3 sites), Colorado, Connecticut, DC, Florida, Illinois, Indiana, Louisiana, Massachusetts, Michigan, Mississippi, New Jersey, New York City, New York State, North Carolina, Pennsylvania, South Carolina, Texas (2 sites), Virginia and Washington. Additional states will be included as their data collection systems become fully operational.
2.1.2	HIV Reporting System (eHARS)	CDC conducts validation and evaluation studies of the data systems which monitor HIV/AIDS to determine the quality of data generated by them. Data on AIDS cases come from 50 states. The period of time between a diagnosis of HIV or AIDS and the arrival of a case report at CDC is called the "reporting delay". In order to provide the best estimates of recent trends, HIV and AIDS surveillance data are analyzed by date of diagnosis and are statistically adjusted for

Unique Identifier	Data Source	Data Validation
		reporting delays and incomplete information on some cases. CDC requires a minimum of 12 months after the end of a calendar year to provide accurate trend data.
2.1.3	HIV Reporting System (eHARS)	CDC conducts validation and evaluation studies of the data systems which monitor HIV/AIDS to determine the quality of data generated by them. Datafor2007comefrom33 stateswith mature, stable HIV surveillance systems to allow for trend analysis. These states are: Alabama, Alaska, Arizona, Arkansas, Colorado, Florida,Idaho, Iowa, Indiana, Kansas, Louisiana, Michigan, Minnesota, Mississippi, Missouri, Nebraska, Nevada, New Jersey, New Mexico, New York, North Carolina, North Dakota, Ohio, Oklahoma, South Carolina, South Dakota, Tennessee, Texas, Utah, Virginia, West Virginia, Wisconsin, and Wyoming. The period of time between a diagnosis of HIV or AIDS and the arrival of a case report at CDC is called the "reporting delay". In order to provide the best estimates of recent trends, HIV and AIDS surveillance data are analyzed by date of diagnosis and are statistically adjusted for reporting delays and incomplete information on some cases. CDC requires a minimum of 12 months after the end of a calendar year to provide accurate trend data.
2.1.4	HIV Reporting System (eHARS)	CDC conducts validation and evaluation studies of the data systems which monitor HIV/AIDS to determine the quality of data generated by them. Data for 2007 are from 33 states with mature, stable HIV surveillance systems to allow for trend analysis. These states are: Alabama, Alaska, Arizona, Arkansas, Colorado, Florida,Idaho, Iowa, Indiana, Kansas, Louisiana, Michigan, Minnesota, Mississippi, Missouri, Nebraska, Nevada, New Jersey, New Mexico, New York, North Carolina, North Dakota, Ohio, Oklahoma, South Carolina, South Dakota, Tennessee, Texas, Utah, Virginia, West Virginia, Wisconsin, and Wyoming. The period of time between a diagnosis of HIV or AIDS and the arrival of a case report at CDC is called the "reporting delay".

Unique Identifier	Data Source	Data Validation
		In order to provide the best estimates of recent trends, HIV and AIDS surveillance data are analyzed by date of diagnosis and are statistically adjusted for reporting delays and incomplete information on some cases. CDC requires a minimum of 12 months after the end of a calendar year to provide accurate trend data.
2.1.5	HIV Reporting System (eHARS)	CDC conducts validation and evaluation studies of the data systems which monitor HIV/AIDS to determine the quality of data generated by them. As of December 2008, 37 states had mature, stable HIV surveillance systems to allow for trend analysis.These states are: Alabama, Alaska, Arizona, Arkansas, Colorado, Connecticut,Florida, Georgia,Idaho, Iowa, Indiana, Kansas, Kentucky,Louisiana, Michigan, Minnesota, Mississippi, Missouri, Nebraska, Nevada, NewHampshire,New Jersey, New Mexico, New York, North Carolina, North Dakota, Ohio, Oklahoma, South Carolina, South Dakota, Tennessee, Texas, Utah, Virginia, West Virginia, Wisconsin, and Wyoming. The period of time between a diagnosis of HIV or AIDS and the arrival of a case report at CDC is called the "reporting delay". In order to provide the best estimates of recent trends, HIV and AIDS surveillance data are analyzed by date of diagnosis and are statistically adjusted for reporting delays and incomplete information on some cases. CDC requires a minimum of 12 months after the end of a calendar year to provide accurate trend data.
2.1.6	Program Evaluation and Monitoring System (PEMS)	CDC evaluates the data systems used to report prevention program activity and develops guidelines for implementation, data entry and program monitoring to determine the quality of data generated by them.
2.1.7	www.EffectiveInterventions.org	Internal program data are routinely monitored and cross-checked to ensure rapid translation of newly identified evidence-based prevention interventionsforuseinthefield.
2.1.8	Diffusion of Effective Behavioral Interventions (DEBI) Tracking Database	Internal program data are routinely monitored and cross-checked to ensure rapid deployment of DEBI trainings.

Long-term Objective 2.1, Performance Measure 1

The target population for this measure is adults and adolescents (more than 13 years of age). The ability to monitor trends in new HIV infections (i.e., HIV incidence) is a fundamental indicator of the impact of HIV prevention activities in the U.S. However, until this time, CDC has not had the ability to monitor trends in HIV incidence. Surveillance for HIV has relied primarily on reporting of diagnosed cases of HIV infection. Since individuals may be infected for years before being diagnosed, reports of HIV diagnoses may not provide information on recent infections.

CDC previously used several proxies to monitor trends in the epidemic. AIDS case surveillance was used until the late 1990s to monitor trends in the epidemic; however, the advent of effective, life-prolonging treatments has rendered AIDS surveillance less useful in monitoring trends in HIV infection. More recently, CDC has used HIV transmission among persons less than 25 years old as a proxy for HIV incidence, since most HIV infections among persons less than 25 years old are recent. However, since an estimated 21 percent of HIV infections are currently undiagnosed, this measure is subject to confounding with changes in HIV testing behaviors. Initiatives to increase HIV testing are designed to increase the proportion of HIV infections that are diagnosed. Because such testing initiatives are currently being funded by CDC, new diagnoses are no longer adequate proxies for HIV incidence.

CDC provides funding and technical assistance to selected state and local health departments to conduct HIV incidence surveillance using newly available laboratory methods. This complex surveillance system uses the Serologic Testing Algorithm for Recent HIV Seroconversion (STARHS) methodology, a testing algorithm developed by CDC staff to assess HIV incidence. Using residual serum specimens from standard HIV antibody testing, STARHS uses a less sensitive Enzyme-Linked Immunoassay (EIA) to determine whether the person has been infected with HIV for less than six months (recent infection) or longer than six months (long-standing infection). Ongoing population-based data from the funded areas are adjusted to impute annual national HIV incidence estimates. CDC's first estimates from this system indicate that approximately 56,300 new HIV infections occurred in the United States in 2006. Estimates for 2007 will be available in early 2010 and will inform target setting for future years. Baseline data for three years is necessary for target setting.

Long-term Objective 2.1, Performance Measure 2

This measure addresses children less than 13 years of age who have developed AIDS. Among this population, AIDS has declined from nearly 1,000 cases per year in the early 1990s to 28 in 2007. This decline was strongly associated with increased HIV testing and treatment of infected pregnant women. Effective treatments for pregnant women have been shown to greatly reduce, but not eliminate, perinatal transmission (transmission can be reduced from an estimated 25 percent to less than two percent among HIV-infected women in the U.S.). More recently, some decline is likely associated with improved treatments which delay the onset of AIDS for HIV-infected children.

Further declines in AIDS cases among children under 13 years of age will be difficult to achieve. Prevention programs for this age group have been extraordinarily successful and further declines are contingent upon continued delay of development of AIDS among those children under 13 who are already infected; reductions in the perinatal transmission rate among pregnant women; and reductions in the prevalence of HIV infection among women. Given the small number of cases, the growing population of women living with HIV and the existing number of children who are already infected, large decreases in the number of children developing AIDS are unlikely. CDC provides funding and technical assistance to 65 state and local health departments to conduct HIV/AIDS prevention programs, including perinatal transmission prevention. CDC also provides guidelines, technical assistance, and provider education to reduce perinatal HIV.

Data for 2008 are not yet available, as the 2008 surveillance report has not yet been finalized.

Long-term Objective 2.1, Performance Measure 3

African Americans are disproportionately affected by the HIV/AIDS epidemic. This measure compares the HIV/AIDS rates per 100,000 population between African Americans and whites in the 33 states with mature, confidential, name-based HIV reporting. The rate ratio between African Americans and whites has declined from 10.3:1 in 2002 to 8.51:1 in 2007. While the target for FY 2007 was not met, CDC has made consistent progress on this measure and is undertaking a number of initiatives to further reduce the black:white ratio of HIV/AIDS diagnoses. CDC provides funding and technical assistance to 65 state and local health departments to conduct HIV/AIDS prevention programs, including evidence-based prevention interventions for African American communities. At the national level, CDC has initiated community mobilization efforts to engage leaders in the African American community in the fight against AIDS. CDC also provides guidelines, technical assistance, and provider education to reduce racial and ethnic disparities in HIV/AIDS rates. With this continued emphasis, CDC expects to continue to make steady progress in reducing this disparity.

Data for 2008 are not yet available, as the 2008 surveillance report has not yet been finalized.

Long-term Objective 2.1, Performance Measure 4

Hispanics are disproportionately affected by the HIV/AIDS epidemic. This measure compares the HIV/AIDS rates per 100,000 population between Hispanics and whites. The rate ratio between Hispanics and whites has declined from 4.1:1 in FY 2002 to 3.46:1 in FY 2007. While the target for FY 2007 was not met, CDC has made consistent progress on this measure and is undertaking a number of initiatives to further reduce the Hispanic:white ratio of HIV/AIDS diagnoses. CDC has sponsored research to adopt evidence-based interventions in order to meet the needs of the Hispanic community. CDC also provides funding and technical assistance to 65 state and local health departments to conduct HIV/AIDS prevention programs, including evidence-based prevention interventions for Hispanic communities. Finally, CDC also produces guidelines and provides technical assistance and provider education to reduce racial and ethnic disparities in HIV/AIDS rates.

Data for 2008 are not yet available, as the 2008 surveillance report has not yet been finalized.

Long-term Objective 2.1, Performance Measure 5

This measure addresses the HIV surveillance systems in the 50 United States. Since 1985, all states and territories have conducted AIDS surveillance using the same standardized name-based methods as for all other infectious diseases. Implementation of HIV surveillance has been less consistently implemented, and some states have used code-based methods of HIV surveillance.

By April 2008, all states had adopted name-based HIV surveillance systems. However, after a state implements name-based HIV surveillance, it takes a number of years for the system to "mature" (establish statewide surveillance standards, train reporting entities, eliminate backlogs of prevalent cases, eliminate interstate and intrastate duplicates, etc.). For purposes of conducting statistical analyses of trends, etc., CDC does not include data from states until the HIV surveillance system is identified as being "mature." In CY 2008, 37 states had mature, confidential, name-based HIV reporting and will be included in the 2008 surveillance report. At least 48 states are expected to have mature systems by the end of FY 2011.

Long-term Objective 2.1, Performance Measure 6

This measure addresses all CDC-funded prevention program grantees. CDC developed a Program Evaluation and Monitoring System (PEMS) to strengthen monitoring and evaluation of HIV prevention programs nationwide. PEMS is a secure Internet browser-based software program for data entry and reporting. PEMS is to be used by health departments and Community Based Organizations (CBOs) funded through CDC HIV prevention cooperative agreements. Currently, more than 1,250 agencies, including health departments and (CBOs) across the country have access to PEMS. When fully implemented, PEMS will be used by all health departments and CBOs funded through CDC HIV prevention cooperative agreements and will provide quantitative data to show program progress toward meeting implementation goals and program effectiveness.

In FY 2008, CDC exceeded its target for adoption of PEMS by grantees. More health departments and CBOs began using PEMS because of increased training of personnel and improvement of information systems and data collection tools. With additional training and capacity building, CDC expects to continue to increase the percentage of grantees that use PEMS to monitor their programs.

Long-term Objective 2.1, Performance Measure 7

This measure addresses the number of evidence-based prevention interventions that are packaged and available for use in the field by CDC-funded prevention program grantees. CDC conducts systematic reviews to identify efficacious HIV prevention behavioral interventions based on rigorous efficacy criteria. After an intervention has been identified as effective, CDC "packages" the intervention through the Replicating Effective Programs (REP) Project. CDC then provides technical assistance and training to move effective HIV interventions into program practice. CDC did not achieve its target in FY 2008, when a number of new intervention packages were in the late stages of development. CDC anticipates these will be available in 2009.

Long-term Objective 2.1, Performance Measure 8

This measure addresses the number of community-based organizations (CBOs) funded by CDC that are trained each year to implement evidence-based behavioral HIV prevention interventions. The Diffusion of Effective Behavioral Interventions (DEBI) project was designed to bring evidence-based, community- and group-level HIV prevention interventions to community-based service providers and state and local health departments. The goal is to enhance the capacity to implement effective interventions at the state and local levels, to reduce the spread of HIV and STDs, and to promote healthy behaviors. CDC supports training for community-based organization (CBO) staff nationwide to help CBOs implement effective prevention interventions for their local populations.

By 2005, most CBOs funded by CDC had been trained on one or more DEBIs. CDC is now focused on training replacement staff, newly funded CBOs, and on newly available DEBIs. By FY 2006, most CBOs funded by CDC had been trained on one or more DEBIs, and in FY 2007, CDC exceeded its target by training 1147 agencies. CDC did not meet the FY 2008 target because of the increasing cost of high quality training products. Newer interventions are more sophisticated and involve more costly training products such as Technical Assistance Guides, Evaluation Field Manuals, Starter Kits, and DVDs. In order to effectively deliver comprehensive training on the interventions, fewer trainings have been offered. Targets for fiscal years 2010 and 2011 have been revised to reflect past performance and planned appropriations for this activity. Priority will be given to interventions that address the populations at highest risk for HIV transmission.

LONG TERM OBJECTIVE 2.2: DECREASE THE RATE OF HIV TRANSMISSION BY HIV-INFECTED PERSONS.

Measure	FY	Target	Result
2.2.1: Decrease the rate of HIV transmission by HIV-infected persons. *(Outcome)*	*Out-Year Target*	TBD (2015)	TBD
	2006	Baseline	5.0%
2.2.2: Decrease risky sexual and drug using behaviors among persons at risk for transmitting HIV. *(Outcome)*	*2011*	TBD	Nov 30, 2012
	2010	TBD	Nov 30, 2011
	2009	TBD	Nov 30, 2010
	2008	Baseline	Mar 31, 2010

Unique Identifier	Data Source	Data Validation
2.2.1	Calculations of HIV incidence and prevalence, utilizing HIV Incidence Surveillance System and special prevalence studies	CDC will conduct validation and evaluation studies of the methodology and data systems used to calculate HIV transmission rates. Population data come from the Bureau of Census and will be updated annually.
2.2.2	Medical Monitoring Project (MMP)is being conducted in 19 states, one U.S. territory, and six cities. MMP uses a three-stage sampling design which will result in annual cross-sectional probability samples of adults in medical care for HIV infection in the United States. During the first stage of sampling (state sampling), 20 geographic primary sampling units (PSUs) were selected from the 50 U.S. states and Puerto Rico using probability proportional to size (PPS) sampling based on AIDS prevalence at the end of 2002. During the second stage (provider sampling), a sample of facilities providing HIV care in each of the project areas was selected. The measure of size for PPS sampling of facilities was the number of HIV-infected patients who received care at the facility during the most recent reporting year for which measure of size data were complete. During the third stage of sampling (patient sampling), participants will be randomly selected from among all eligible patients. The sample size will be greater than 10,000 persons per year.	CDC will conduct validation and evaluation studies of the implementation of data systems that monitor medical care among persons diagnosed with HIV.

Long-term Objective 2.2, Performance Measure 1

The target population for this measure is adults and adolescents (over 13 years of age). The ability to monitor the national HIV transmission rate is a fundamental indicator of the impact of HIV prevention activities in the U.S. Until recently, CDC was not able to monitor transmission rates because HIV incidence estimates were not available. However, new laboratory methods now enable CDC to conduct

HIV incidence surveillance. Today, CDC provides funding and technical assistance to selected state and local health departments to conduct HIV incidence surveillance. This surveillance system uses the STARHS methodology, (Serologic Testing Algorithm for Recent HIV Seroconversion), which was developed by CDC staff to measure HIV incidence. Using residual serum specimens from standard HIV antibody testing, STARHS uses a less sensitive EIA to determine whether the person has been infected with HIV for less than six months (recent infection) or longer than six months (long-standing infection). Ongoing population-based data from funded areas are adjusted to impute annual national HIV incidence estimates. The first estimates from this new surveillance system were generated in 2008 for CY 2006. Estimates for 2007 will be available in early 2010 and will inform target setting for future years. Baseline data for three years are necessary for target setting.

In the era of more effective therapies for HIV, Americans with HIV are living longer and the total number of Americans living with HIV is increasing. CDC estimates that more than 1.1 million people were living with HIV infection in the United States at the end of 2006. This measure takes into account the increasing number of persons who are living with HIV, and who are at risk of transmitting the virus as a result of the new, life-prolonging treatments. CDC is working to decrease transmission rates by increasing the number of people who know they are infected, and by providing prevention services to those living with HIV.

Long-term Objective 2.2, Performance Measure 2

CDC provides a variety of evidence-based prevention services for persons who are HIV-infected to help reduce their risk of transmitting the virus to their partners. CDC will be able to monitor changes in risk behaviors among persons living with HIV through the Medical Monitoring Project (MMP), a second generation surveillance system which was implemented in the field in FY 2007. MMP is a nationally representative, population-based surveillance system assessing clinical outcomes, behaviors, and quality of care among HIV-infected persons who are in medical care. HIV-infected persons are interviewed about sexual and drug-using behaviors that may put them at risk for transmitting HIV. MMP replaced CDC's Supplemental HIV/AIDS Surveillance (SHAS), a convenience sample surveillance system which had provided data on HIV-infected persons in care in 16 areas.

Data analyses for this new surveillance system were delayed due to the challenges developing and implementing a new system. Data for 2007 are currently being analyzed and finalized.

LONG TERM OBJECTIVE 2.3: DECREASE RISKY SEXUAL AND DRUG USING BEHAVIORS AMONG PERSONS AT RISK FOR ACQUIRING HIV.

Measure	FY	Target	Result
2.3.1a: Decrease risky sexual and drug-using behaviors among persons at risk for acquiring HIV. MSM *(Outcome)*	*2011*	47%	Jun 30, 2012
	2008	47%	Jun 30, 2010
	2006	Baseline	N/A
2.3.1b: Decrease risky sexual and drug-using behaviors among persons at risk for acquiring HIV. HRH *(Outcome)*	*2010*	TBD	Dec 31, 2012
	2007	Baseline	86%
2.3.1c: Decrease risky sexual and drug-using behaviors among persons at risk for acquiring HIV. IDU *(Outcome)*	*2009*	TBD	Jun 30, 2011
	2006	Baseline	N/A
2.3.2a: Increase the	*2011*	20%	Nov 30, 2012

Measure	FY	Target	Result
proportion of persons at risk for HIV who received HIV prevention interventions. MSM *(Outcome)*	*2008*	20%	Jun 30, 2010
	2006	Baseline	N/A
2.3.2b: Increase the proportion of persons at risk for HIV who received HIV prevention interventions. HRH *(Outcome)*	*2010*	TBD	Nov 30, 2011
	2007	Baseline	12.5%
2.3.2c: Increase the proportion of persons at risk for HIV who received HIV prevention interventions. IDU *(Outcome)*	*2009*	TBD	Jun 30, 2011
	2006	Baseline	N/A

Unique Identifier	Data Source	Data Validation
2.3.1	National HIV Behavior Surveillance (NHBS) System. This system is a nationally representative behavioral surveillance system that collects risk behavior data from three populations at risk for acquiring HIV: men who have sex with men (MSM), injection drug users (IDU), and high risk heterosexuals in areas where HIV is prevalent (HRH). It utilizes survey sampling techniques developed in the past few years to reach representative samples of at-risk populations. NHBS was initiated in 2004, is conducted on an annual basis, and is limited during each cycle to one of these three study groups. Because of delays in implementing the IDU and HRH modules of NHBS, data reporting has been delayed for all three populations.	NHBS is a new surveillance system for monitoring HIV risk behaviors among persons at risk for HIV infection. NHBS surveillance methodology is being evaluated and fine-tuned throughout its first three-year cycle.
2.3.2	National HIV Behavior Surveillance (NHBS) System. This system is a national behavioral surveillance system that collects risk behavior data from three populations at risk for acquiring HIV infection: men who have sex with men (MSM), injection drug users (IDU), and high risk heterosexuals in areas where HIV is prevalent (HRH). NHBS utilizes survey sampling techniques developed in the past few years to reach representative samples of at-risk populations. NHBS was initiated in 2004, is conducted on an annual basis, and is limited during each cycle to one of these three study groups.	NHBS is a new surveillance system for monitoring HIV risk behaviors among persons at risk for HIV infection. NHBS surveillance methodology is being evaluated and fine-tuned throughout its first three-year cycle.

Long-term Objective 2.3, Performance Measure 1

This measure addresses persons who are at increased risk of acquiring HIV due to risky sexual or drug-using behaviors. CDC supports prevention activities for persons who are uninfected and at behavioral risk of infection. The baseline for MSM was established at 47 percent for FY 2004, targets were set, and data for this submeasure will next be reported for FY 2008. The baseline for IDU was established at 73 percent for FY 2005, but targets have not yet been set. This submeasure will next be reported for FY 2009 and targets will be set in mid-2010. The baseline for HRH was 86 percent for FY 2007, but targets have not yet been set.

New, effective treatments for HIV have resulted in increased risk-taking behavior among MSM. This result is reflected in increased self-reported risk behavior, STD infections, and increased HIV diagnoses. Other factors have also combined to increase risk among MSM, such as methamphetamine use, use of the Internet to meet new sexual partners, and beliefs regarding the severity of HIV disease.

Long-term Objective 2.3, Performance Measure 2

This measure addresses the extent to which at-risk individuals have received HIV prevention interventions (participation in an individual or small group prevention intervention). A number of interventions, conducted at both the individual and group levels, have been shown to be effective in reducing risk behaviors. CDC supports such interventions for persons who are at risk of infection. This measure addresses persons who had recently (within the past 12 months) received an intervention and does not measure the cumulative effect of evidence-based HIV prevention efforts.

CDC has requested funds in 2011 to expand prevention programming for MSM in several jurisdictions with high burdens of AIDS among MSM. This effort is expected to increase the number of MSM reached with testing and other effective prevention services in these jurisdictions.

The baseline for MSM was established at 18.9 percent for FY 2004, targets were set, and data for this submeasure will next be reported for FY 2008. The baseline for IDU was established at 27.4 percent for FY 2005, but targets have not yet been set. This submeasure will next be reported for FY 2009. The baseline for HRH was established at 12.5 percent for FY 2007, but targets have not yet been set.

LONG TERM OBJECTIVE 2.4: INCREASE THE PROPORTION OF HIV-INFECTED PEOPLE IN THE UNITED STATES WHO KNOW THEY ARE INFECTED.

Measure	FY	Target	Result
2.4.1: Increase the proportion of HIV-infected people in the United States who know they are infected. *(Outcome)*	*Out-Year Target*	80% (2015)	Nov 30, 2016
	2006	74.5%	79% (Target Exceeded)
2.4.2: Increase the proportion of persons with HIV-positive test results from publicly funded counseling and testing sites who receive their test results. *(Outcome)*	*2011*	90%	Oct 31, 2013
	2010	90%	Oct 31, 2012
	2009	90%	Oct 31, 2011
	2008	88%	Oct 31, 2010
	2007	87%	Mar 31, 2010
	2006	86%	86% (Target Met)
2.4.3: Increase the proportion of people with HIV diagnosed before progression to AIDS.	*2011*	80%	Nov 30, 2012
	2010	80%	Nov 30, 2011
	2009	80%	Nov 30, 2010
	2008	79%	Mar 31, 2010

Measure	FY	Target	Result
(Outcome)	*2007*	79%	82.2% (Target Exceeded)
	2006	78%	79.7% (Target Exceeded)

Unique Identifier	Data Source	Data Validation
2.4.1	Special studies using eHARS	CDC conducts validation and evaluation studies of the data systems which monitor HIV/AIDS to determine the quality of data generated by them. The methodology for assessing this measure has been vetted at professional conferences and will be published in a peer-reviewed journal.
2.4.2	Counseling, Testing, and Referral System (CTR) and Program Evaluation and Monitoring System (PEMS).CDC developed PEMS in response to the need to strengthen the monitoring and evaluation of HIV prevention programs nationwide. PEMS is a secure, Internet browser-based software program for data entry and reporting. When fully implemented, PEMS will be used by all health departments and CBOs funded through CDC HIV prevention cooperative agreements and PEMS will provide quantitative data to show program progress toward meeting implementation goals and program effectiveness.	CDC evaluates the data systems used to report prevention program activity and develops guidelines for implementation, data entry, and program monitoring to determine the quality of data generated by the systems.
2.4.3	HIV Reporting System(eHARS)	CDC conducts validation and evaluation studies of the data systems which monitor HIV/AIDS to determine the quality of data generated by them. Data for 2007 are from 33 states with mature, confidential name-based HIV surveillance systems. These states are: Alabama, Alaska, Arizona, Arkansas, Colorado, Florida, Idaho, Iowa, Indiana, Kansas, Louisiana, Michigan, Minnesota, Mississippi, Missouri, Nebraska, Nevada, New Jersey, New Mexico, New York, North Carolina, North Dakota, Ohio, Oklahoma, South Carolina, South Dakota, Tennessee, Texas, Utah, Virginia, West Virginia, Wisconsin, and Wyoming. The period of time between a diagnosis of HIV or AIDS and the arrival of a case report at CDC is called the "reporting delay". In order to provide the best estimates of recent trends, HIV and AIDS surveillance data are analyzed by date

Unique Identifier	Data Source	Data Validation
		of diagnosis and are statistically adjusted for reporting delays and incomplete information on some cases. CDC requires a minimum of 12 months after the end of a calendar year to provide accurate trend data.

Long-term Objective 2.4, Performance Measure 1

Decreasing the prevalence of undiagnosed HIV infection has been a key prevention priority for CDC. CDC has facilitated HIV testing through publicly funded HIV counseling and testing, targeted distribution of rapid HIV tests, social marketing campaigns, and revised recommendations promoting routine HIV screening in healthcare settings. CDC estimates that approximately 79 percent of the approximately 1.1 million persons living with HIV are aware that they are infected. However, increasing the proportion of people who know their HIV status is an ongoing prevention challenge.

Some persons with undiagnosed HIV infection (particularly those with recent infection) may not seek testing because they do not believe that they are at risk for HIV infection. Others are aware that they may be at risk but avoid testing (or being re-tested) because of fear of learning that they are HIV-infected. HIV-infected persons who are unaware of their HIV status are more likely to transmit HIV and are estimated to account for more than half of HIV transmissions in the United States. In September 2006, CDC issued Revised *Recommendations for HIV Screening of Adults, Adolescents, and Pregnant Women in Health-Care Settings*. CDC is addressing challenges to implementation of HIV screening in health-care settings through a multidisciplinary approach that includes: policy diffusion strategies; partnerships with organizations of healthcare professionals; coordination with other federal agencies; implementation guidance; professional education materials; monitoring and evaluation strategies; social marketing; and strategies to ensure follow-up care for HIV-infected persons. To help increase the adoption of the recommendations, CDC has developed implementation guidance for use in specific settings. Since 2007, CDC has funded a special initiative to increase HIV testing among those most affected by the disease, particularly African Americans. With additional funding received in 2010, CDC is expanding the focus of this initiative to also reach Hispanics and MSM and IDU of all races. Data for this measure are derived from special analyses of HIV case surveillance data.

Long-term Objective 2.4, Performance Measure 2

This measure addresses persons tested for HIV in publicly-funded HIV testing and counseling sites. Historically, a large proportion (up to 50 percent in some settings) of persons tested for HIV did not return to the clinic to receive their test results. This represented considerable lost opportunities for HIV prevention. Consequently, emphasis is placed on providing test results to those persons with HIV positive test results. These data were captured by Counseling, Testing, and Referral System (CTR), and are now being incorporated into PEMS. The proportion of HIV-infected persons who received their HIV positive test results increased from 81 percent in 2001 to 86 percent in 2006.

Data for 2007 are not yet available, as the report from publicly-funded counseling and testing sites has not yet been finalized.

Long-term Objective 2.4, Performance Measure 3

Since the mid-1990s, effective medical therapies for HIV infection and associated opportunistic infections have dramatically reduced death rates associated with HIV infection. Age-adjusted mortality due to HIV disease has declined from 17.0 per 100,000 population in 1995 to 4.0 per 100,000 population in 2006. In order to take advantage of more effective therapies and prevent transmission to others, individuals should be aware of their infection early in the course of the disease before progression to AIDS. The proportion

of persons with HIV infection diagnosed before progression to AIDS has increased from 77.9 percent in 2002 to 82.2 percent in 2007. CDC aims to increase early diagnosis by promoting HIV testing.

CDC provides funding and technical assistance to 65 state and local health departments to conduct HIV/AIDS prevention programs aimed at increasing HIV testing and early diagnosis; CDC also works with the private sector and public providers to support routine HIV testing in those settings. Data are from a system which includes both the HIV diagnosis and AIDS diagnosis dates. Data for 2007 are from 33 states with mature, confidential name-based HIV surveillance systems.

Data for 2008 are not yet available, as the 2008 surveillance report has not yet been finalized.

LONG TERM OBJECTIVE 2.5: INCREASE THE PROPORTION OF HIV-INFECTED PERSONS WHO ARE LINKED TO PREVENTION AND CARE SERVICES.

Measure	FY	Target	Result
2.5.1: Increase the percentage of HIV-infected persons in publicly funded counseling and testing sites who were referred to Prevention Counseling and Referral Services (PCRS). *(Outcome)*	*Out-Year Target*	TBD (2015)	Nov 30, 2016
	2008	Baseline	Mar 31, 2010
2.5.2: Increase the percentage of HIV-infected persons in publicly funded counseling and testing sites who were referred to medical care and attended their first appointment. *(Outcome)*	*2011*	TBD	Nov 30, 2012
	2010	TBD	Nov 30, 2011
	2009	TBD	Nov 30, 2010
	2008	Baseline	Mar 31, 2010
2.5.3: Increase the percentage of HIV-infected persons in publicly funded counseling and testing sites who were referred to HIV prevention services. *(Outcome)*	*2011*	TBD	Nov 30, 2012
	2010	TBD	Nov 30, 2011
	2009	TBD	Nov 30, 2010
	2008	Baseline	Mar 31, 2010
2.5.4: Increase the percentage of HIV-infected persons in medical care who initiated medical care within three months of diagnosis. *(Outcome)*	*2011*	TBD	Nov 30, 2013
	2010	TBD	Nov 30, 2012
	2009	N/A	Nov 30, 2011
	2008	N/A	Nov 30, 2010
	2007	Baseline	Mar 31, 2010

Unique Identifier	Data Source	Data Validation
2.5.1	The Program Evaluation and Monitoring System (PEMS)is a secure Internet browser-based software program for data entry and reporting. CDC developed PEMS in response to the need to strengthen the monitoring and evaluation of HIV prevention programs nationwide. Currently, more than 1,250 agencies, including health	CDC evaluates the data systems used to report prevention program activity and develops guidelines for implementation, data entry and program monitoring to determine the quality of data generated by them.

Unique Identifier	Data Source	Data Validation
	departments and community-based organizations across the country, have access to PEMS. When fully implemented, PEMS will be used by all health departments and CBOs funded through CDC HIV prevention cooperative agreements and will provide quantitative data to show program progress toward meeting implementation goals and program effectiveness.	
2.5.2	The Program Evaluation and Monitoring System (PEMS)is a secure Internet browser-based software program for data entry and reporting. CDC developed PEMS in response to the need to strengthen the monitoring and evaluation of HIV prevention programs nationwide. Currently, more than 1,250 agencies, including health departments and community-based organizations across the country, have access to PEMS. When fully implemented, PEMS will be used by all health departments and CBOs funded through CDC HIV prevention cooperative agreements and will provide quantitative data to show program progress toward meeting implementation goals and program effectiveness.	CDC evaluates the data systems used to report prevention program activity and develops guidelines for implementation, data entry and program monitoring to determine the quality of data generated by them.
2.5.3	The Program Evaluation and Monitoring System (PEMS) is a secure Internet browser-based software program for data entry and reporting. CDC developed PEMS in response to the need to strengthen the monitoring and evaluation of HIV prevention programs nationwide. Currently, more than 1,250 agencies, including health departments and community-based organizations across the country, have access to PEMS. When fully implemented, PEMS will be used by all health departments and CBOs funded through CDC HIV prevention cooperative agreements and will provide quantitative data to show program progress toward meeting implementation goals and program effectiveness.	CDC evaluates the data systems used to report prevention program activity and develops guidelines for implementation, data entry and program monitoring to determine the quality of data generated by them.
2.5.4	Medical Monitoring Project (MMP)is being conducted in 19 states, 1 U.S. territory and 6 cities. MMP uses a three-stage sampling design which will result in annual cross-sectional	CDC will conduct validation and evaluation studies of the implementation of data systems that monitor medical care among persons diagnosed with HIV.

Unique Identifier	Data Source	Data Validation
	probability samples of adults in medical care for HIV infection in the United States. During the first stage of sampling (state sampling), 20 geographic primary sampling units (PSUs) were selected from the 50 U.S. states and Puerto Rico using probability proportional to size (PPS) sampling based on AIDS prevalence at the end of 2002. During the second stage (provider sampling), a sample of facilities providing HIV care in each of the project areas was selected. The measure of size for PPS sampling of facilities was the number of HIV-infected patients who received care at the facility during the most recent reporting year for which measure of size data were complete. During the third stage of sampling (patient sampling), participants will be randomly selected from among all eligible patients. The sample size will be greater than 10,000 persons per year.	

Long-term Objective 2.5, Performance Measure 1

This long-term measure addresses persons tested for HIV in publicly-funded HIV testing and counseling sites. Partner services (PS), formerly known as prevention counseling and referral services, are a key component of CDC's HIV prevention activities. Through PS, infected persons are counseled about the importance of notifying their partners and are either provided with the skills to do so themselves, or given the opportunity to have a public health professional (usually a Disease Intervention Specialist) make the notification for them. Notified partners can choose whether to be tested, and receive relevant counseling and prevention services.

Data for 2008 are not yet available, as the report from publicly funded counseling and testing sites has not yet been finalized.

Long-term Objective 2.5, Performance Measure 2

This measure addresses persons tested for HIV in publicly-funded HIV testing and counseling sites and found to be HIV-infected. Referral to appropriate medical care is a key HIV prevention activity. Early medical intervention can reduce the likelihood of developing AIDS and offers an important opportunity for HIV prevention. Baseline data for this measure are expected to be available in early 2010.

Data for 2008 are not yet available, as the report from publicly funded counseling and testing sites has not yet been finalized.

Long-term Objective 2.5, Performance Measure 3

This measure addresses persons tested for HIV in publicly-funded HIV testing and counseling sites and who were found to be HIV-infected. CDC supports prevention services among HIV-infected individuals to reduce risk of transmission. These services are not necessarily offered at the testing and counseling facility. Therefore, HIV-infected individuals may need referral to another organization or facility. Baseline data for this measure are expected to be available in early 2010.

Data for 2008 are not yet available, as the report from publicly funded counseling and testing sites has not yet been finalized.

Long-term Objective 2.5, Performance Measure 4

This measure addresses initiation of medical care for those recently diagnosed with HIV. CDC will be able to monitor changes in risk behaviors and provision of care among persons living with HIV through the Medical Monitoring Project (MMP), a second generation surveillance system which was implemented in the field in 2007. When fully implemented, MMP will be a nationally representative, population-based surveillance system assessing clinical outcomes, behaviors, and quality of care among HIV-infected persons who are in medical care. HIV-infected persons are interviewed about sexual and drug-using behaviors that may put them at risk for transmitting HIV. It is vitally important that HIV-infected persons initiate medical care in a timely fashion.

Data analyses for this new surveillance system were delayed due to the challenges of developing and implementing a new system. 2007 data are currently being analyzed and finalized.

VIRAL HEPATITIS

LONG TERM OBJECTIVE 2.6: REDUCE THE RATES OF VIRAL HEPATITIS IN THE UNITED STATES.

Measure	FY	Target	Result
2.6.1: Reduce the rate of new cases of hepatitis A (per 100,000 population). *(Outcome)*	*Out-Year Target*	0.5/100,000 (2015)	May 31, 2017
	2011	0.9/100,000	May 31, 2013
	2010	0.9/100,000	May 31, 2012
	2009	2.4/100,000	May 31, 2011
	2008	2.4/100,000	May 31, 2010
	2007	2.5/100,000	1.0/100,000 (Target Exceeded)
	2006	2.6/100,000	1.2/100,000 (Target Exceeded)
2.6.2: Reduce the rate of new cases of hepatitis B (per 100,000 population). *(Outcome)*	*Out-Year Target*	1.5/100,000 (2015)	May 31, 2017
	2011	1.7/100,000	May 31, 2013
	2010	1.7/1000,000	May 31, 2012
	2009	1.8/100,000	May 31, 2011
	2008	1.8/100,000	May 31, 2010
	2007	1.9/100,000	1.5/100,000 (Target Exceeded)
	2006	N/A	1.6/100,000
2.6.3: Increase the proportion of individuals knowing their hepatitis C virus infection status. *(Outcome)*	*Out-Year Target*	65% (2015)	Dec 31, 2016
2.6.4: Increase the number of areas reporting chronic hepatitis C virus infections to CDC to 50 states and New York City and District of Columbia. *(Output)*	*Out-Year Target*	37 (2015)	Dec 31, 2016
	2011	37	Dec 31, 2012
	2010	37	Dec 31, 2011
	2009	35	Dec 31, 2010
	2008	33	33 (Target Met)
	2007	N/A	33
	2006	N/A	34

Unique Identifier	Data Source	Data Validation
2.6.1	The National Notifiable Diseases Surveillance System (NNDSS)	NNDSS data are received from state health departments weekly and are reviewed. Reports are checked and any pre-specified data are verified by contacting the appropriate state health department. All data are once again checked and verified with state health departments at the end of the year.
2.6.2	The National Notifiable Diseases Surveillance System (NNDSS)	NNDSS data are received from state health departments weekly and are reviewed. Reports are checked and any pre-specified data are verified by contacting the appropriate state health department. All data are once again

Unique Identifier	Data Source	Data Validation
		checked and verified with state health departments at the end of the year.
2.6.3	The National Health and Nutrition Examination Survey (NHANES)	NHANES relies on both passive and active monitoring systems for operational and content-related quality control. Passive quality control uses automated computer procedures for detecting data anomalies. After careful analysis, appropriate activities can be undertaken to resolve any data collection issues. Active quality control relies on examiner feedback to identify and evaluate problems and select remedies. NHANES primarily relies on physical measurements from well-established biomedical procedures.
2.6.4	The National Notifiable Diseases Surveillance System (NNDSS)	NNDSS data are received from state health departments weekly and are reviewed. Reports are checked and any pre-specified data are verified by contacting the appropriate state health department. All data are once again checked and verified with state health departments at the end of the year.

Long-term Objective 2.6, Performance Measure 1

HAV is spread by close contact with infected persons or ingestion of contaminated food. Vaccination, outbreak response, and food safety programs are the primary interventions used to prevent HAV.

HAV incidence has decreased by approximately 88 percent nationwide since the mid-1990s, when HAV vaccine became available and the first vaccination recommendations were released. From a baseline of 11.3 cases per 100,000 population, incidence has declined to 1.0 case per 100,000 in 2007. Targets for 2010 and future years have been adjusted to reflect previous performance.

HAV incidence has declined by 99 percent among Alaska Natives and American Indians, populations with the highest disease rates in the pre-vaccine era. This reduction has effectively eliminated this racial disparity in health. The rate of new cases suggests the long term targets will be met, as the 2007 rate is the lowest rate ever recorded. The Advisory Committee for Immunization Practices (ACIP) recommendations for use of hepatitis A vaccine were updated in 2006 to create the foundation for eliminating indigenous transmission of HAV in the U.S. Now, routine vaccination is recommended for all children aged 13-23 months.

In addition, a new strategy for treating individuals once they are exposed to HAV, approved by the ACIP in 2007, involves using hepatitis A vaccine rather than immune globulin in post exposure situations. Post exposure use of hepatitis A vaccine offers several advantages over immune globulin, including long-term protection, ease of administration, and widespread availability. With the number of hepatitis A cases now at a record low, a greater proportion of cases arise from food borne outbreaks. Sometimes these outbreaks involve hundreds or thousands of persons who require post exposure prophylaxis which until recently consisted of administering immune globulin.

The overall rate of HAV is determined based on reports of acute disease received by state health departments and reported to CDC. Because it incorporates data from all 50 states and the District of Columbia, this measure, which is also included in the Healthy People 2010 initiative, provides a

representative method to assess national trends in this disease. Surveillance data are published approximately 17 months after data collection ends for the calendar year. This measure serves as both a long-term and annual measure.

Long-term Objective 2.6, Performance Measure 2

HBV is spread by exposure to infectious blood or body fluids or through sexual contact. HBV infection can become chronic in some persons and lead to death from cirrhosis or liver cancer. Approximately 1.0 to 1.25 million Americans have chronic HBV infection, and 3,000 to 5,000 die each year. Key components of CDC efforts to prevent HBV-related morbidity and mortality are 1) vaccination of newborns, infants, and children and of adults at increased risk of infection; and 2) identification and referral of HBV-infected persons for public health management and treatment, with a focus on persons from HBV-endemic countries and others with high prevalence of chronic HBV infection.

Rates of HBV infection have declined consistently over the past decade and are linked to the successful implementation of vaccination strategies as well as progress in screening and awareness. More than 95 percent of pregnant U.S. women are now screened for HBV infection during pregnancy, reducing the risk for perinatal transmission. As a result of the national HBV elimination strategy, the 2007 rate surpasses the Healthy People 2010 goal of 4.5 cases per 100,000 people, and is the lowest rate of new cases recorded to date.

The overall rate of hepatitis B is determined based on reports of acute disease received by state health departments and reported to CDC. Because it incorporates data from all 50 states and the District of Columbia, this measure provides a representative method to assess national trends in this disease and track the progress toward elimination of HBV transmission in the U.S. Surveillance data are published approximately 17 months after data collection ends for the calendar year. This measure serves as both a long-term and annual measure.

Hepatitis B is vaccine preventable and routine childhood vaccination is recommended. The Immunization and Respiratory Disease performance narrative offers annual rates of childhood immunization coverage.

Long-term Objective 2.6, Performance Measure 3

HCV is the most common bloodborne viral infection in the U.S. and is a leading cause of death from liver cancer. Approximately three million persons in the U.S. have chronic HCV, many of whom were infected in the past. Most HCV-infected persons are unaware of their infection, increasing the risk that they will transmit the virus to others and suffer poor health outcomes themselves. In the absence of an HCV vaccine, the goals of HCV prevention are early identification of infection, behavior modification to avoid HCV exposure and transmission, and referral for treatment. Prevention also requires the identification and implementation of strategies that prevent transmission in healthcare settings. Knowledge of chronic HCV infection status is a critical determinant of whether patients receive treatment and adopt preventative health behaviors. Data collected from The National Health and Nutrition Examination Survey (NHANES) can be used to estimate the proportion of HCV-infected persons in the U.S. who know their HCV status. Due to the ongoing nature of NHANES, CDC can assess trends in this knowledge over time.

Long-term Objective 2.6, Performance Measure 4

Chronic HCV infection became a nationally notifiable disease in 2003. Surveillance for chronic HCV infection is critical for planning public health prevention activities, determining unmet healthcare needs and evaluating ongoing prevention programs. However, national surveillance for chronic HCV infection remains incomplete in large part due to a high volume of reports and inadequate staff resources at the state and local levels. Efforts to increase jurisdictions that report cases of chronic HCV infection to CDC will substantially improve our ability accurately to describe the prevalence and epidemiologic characteristics of these cases nationally. The number of jurisdictions reporting cases of chronic HCV

infection has increased over time. In FY 2008, data were reported by 33 jurisdictions, consistent with FY 2007 results.

SEXUALLY TRANSMITTED DISEASES

LONG TERM OBJECTIVE 2.7: REDUCE THE RATES OF NON-HIV SEXUALLY TRANSMITTED DISEASES (STDS) IN THE UNITED STATES.

Measure	FY	Target	Result
2.7.1: Reduce pelvic inflammatory disease in the U.S. *(Outcome)*	*Out-Year Target*	73,000 (2015)	Oct 31, 2016
	2011	89,000	Oct 31, 2012
	2010	94,000	Oct 31, 2011
	2009	N/A	Oct 31, 2010
	2008	N/A	104,000
	2007	N/A	146,000
	2006	N/A	106,000
2.7.2: Reduce the prevalence of chlamydia among high-risk women under age 25. *(Outcome)*	*Out-Year Target*	10.3% (2015)	Oct 31, 2016
	2011	11.7%	Oct 31, 2012
	2010	12.0%	Oct 31, 2011
	2009	14.1%	Oct 31, 2010
	2008	9.0%	12.8% (Target Not Met but Improved)
	2007	9.3%	13.2% (Target Not Met)
	2006	9.3%	13.1% (Target Not Met)
2.7.3: Reduce the prevalence of chlamydia among women under age 25, in publicly funded family planning clinics. *(Outcome)*	*Out-Year Target*	9.2% (2015)	Oct 31, 2016
	2011	8.1%	Oct 31, 2012
	2010	7.9%	Oct 31, 2011
	2009	7.0%	Oct 31, 2010
	2008	6.3%	7.4% (Target Not Met)
	2007	6.3%	6.9% (Target Not Met)
	2006	6.3%	6.7%
2.7.4: Reduce the incidence of gonorrhea in women aged 15 to 44 (per 100,000 population). *(Outcome)*	*Out-Year Target*	<311/100,000 (2015)	Oct 31, 2016
	2011	288/100,000	Oct 31, 2012
	2010	288/100,000	Oct 31, 2011
	2009	293/100,000	Oct 31, 2010
	2008	276/100,000	285/100,000 (Target Not Met but Improved)
	2007	278/100,000	290/100,000 (Target Not Met)
	2006	278/100,000	290/100,000 (Target Not Met)
2.7.5: Eliminate syphilis in the U.S. *(Outcome)*	*Out-Year Target*	7.6/100,000 (2015)	Oct 31, 2016
	2011	**2.2/100,000**	Oct 31, 2012
	2010	2.2/100,000	Oct 31, 2011
	2009	N/A	Oct 31, 2010
	2008	N/A	4.5/100,000
	2007	N/A	3.8/100,000
	2006	N/A	3.3/100,000
2.7.6a: Reduce the	*2011*	10.2/100,000	Oct 31, 2012

Measure	FY	Target	Result
incidence of P&S syphilis: in men (per 100,000 population). *(Outcome)[1]*	*2010*	9.4/100,000	Oct 31, 2011
	2009	6.4/100,000	Oct 31, 2010
	2008	5.5/100,000	7.6/100,000 (Target Not Met)
	2007	4.5/100,000	6.6/100,000 (Target Not Met)
	2006	New baseline	5.6/100,000
2.7.6b: Reduce the incidence of P&S syphilis: in women (per 100,000 population). *(Outcome)*	*2011*	2.1/100,000	Oct 31, 2012
	2010	2.0/100,000	Oct 31, 2011
	2009	1.1/100,000	Oct 31, 2010
	2008	0.9/100,000	1.5/100,000 (Target Not Met)
	2007	0.8/100,000	1.1/100,000 (Target Not Met)
	2006	0.58/100,000	1.0/100,000 (Target Not Met)
2.7.7: Reduce the incidence of congenital syphilis per 100,000 live births. *(Outcome)*	*Out-Year Target*	19.1/100,000 (2015)	Oct 31, 2016
	2011	17.7/100,000	Oct 31, 2012
	2010	16.2/100,000	Oct 31, 2011
	2009	8.9/100,000	Oct 31, 2010
	2008	8.5/100,000	10.1/100,000 (Target Not Met but Improved)
	2007	8.8/100,000	10.5/100,000 (Target Not Met)
	2006	8.8/100,000	9.3/100,000 (Target Not Met)
2.7.8: Reduce the racial disparity of P&S syphilis (reported ratio is black:white). *(Outcome)*	*Out-Year Target*	11.5:1 (2015)	Oct 31, 2016
	2011	9.5:1	Oct 31, 2012
	2010	9.0:1	Oct 31, 2011
	2009	6.3:1	Oct 31, 2010
	2008	5.5:1	8.1:1 (Target Not Met)
	2007	5.6:1	7.1:1 (Target Not Met)
	2006	5.6:1	5.9:1 (Target Not Met)

[1] In FY 2002, the incidence of P&S syphilis in men was 3.8 per 100,000 (initial 2002 baseline). However, because after 2002, an outbreak of syphilis among men who have sex with men drove up the male syphilis rates, CDC reported a new baseline for 2006. The goal for 2015 for P&S syphilis takes into account the outbreak, and expectations for controlling and reversing the trend. The annual targets for 2008 through 2010 also take these increases into account.

Unique Identifier	Data Source	Data Validation
2.7.1	The National Disease and Therapeutic Index (NDTI) (IMS Health)	The National Disease and Therapeutic Index (NDTI), an information product of IMS Health, is a continuing compilation of statistical information about the patterns and treatment of disease encountered by office-based physicians in the continental United States. Data reported via the web have numerous validations and edits applied as they are being entered. At each of the patient, diagnosis, and product levels, key data elements have been

Unique Identifier	Data Source	Data Validation
		identified that will not permit the physician to exit the page without completing the data element. All data go thru a pre-edit process prior to coding. Any outliers are identified and the physician is contacted for clarification. During the coding cycle, edits and validation routines are visible. Approximately 8% of the data coded is sampled for correct application of coding business rules.
2.7.2	The U.S. Department of Labor, National Job Training Program; CDC, IPP Chlamydia Prevalence Monitoring Project	Data submitted annually by the contracting laboratory providing testing services for the National Job Training Program undergo verification and validation procedures including edit checks, review of the data for outliers by state, and regular communications with the testing laboratory are conducted to verify potential data irregularities. Corrected data may be resubmitted by the laboratory following their correction. Data submitted quarterly by Regional Infertility Prevention Programs undergo verification and validation procedures including edit checks, review of the data for outliers by screening site and jurisdiction, and regular communications with the Regional Programs are conducted to verify potential data irregularities. Corrected data may be resubmitted by the Regional Programs following their correction.
2.7.3	CDC, IPP Chlamydia Prevalence Monitoring Project	Data submitted quarterly by Regional Infertility Prevention Programs undergo verification and validation procedures including edit checks, review of the data for outliers by screening site and jurisdiction, and regular communications with the Regional Programs are conducted to verify potential data irregularities. Corrected data may be resubmitted by the Regional Programs following their correction.
2.7.4	STD Morbidity Surveillance System, CDC	Data from STD Morbidity Surveillance System undergo verification and validation procedures including reports back to project areas concerning quarterly and yearly data, trend information, and percentage unknowns for demographic and clinical fields, edit checks and updates,

Unique Identifier	Data Source	Data Validation
		as well as regular communications via fax, phone and e-mail with project staff.
2.7.5	STD Morbidity Surveillance System, CDC	Data from STD Morbidity Surveillance System undergo verification and validation procedures including reports back to project areas concerning quarterly and yearly data, trend information, and percentage unknowns for demographic and clinical fields, edit checks and updates, as well as regular communications via fax, phone and e-mail with project staff.
2.7.6	STD Morbidity Surveillance System, CDC	Data from STD Morbidity Surveillance System undergo verification and validation procedures including reports back to project areas concerning quarterly and yearly data, trend information, and percentage unknowns for demographic and clinical fields, edit checks and updates, as well as regular communications via fax, phone and e-mail with project staff.
2.7.7	STD Morbidity Surveillance System, CDC	Data from STD Morbidity Surveillance System undergo verification and validation procedures including reports back to project areas concerning quarterly and yearly data, trend information, and percentage unknowns for demographic and clinical fields, edit checks and updates, as well as regular communications via fax, phone and e-mail with project staff.
2.7.8	STD Morbidity Surveillance System, CDC	Data from STD Morbidity Surveillance System undergo verification and validation procedures including reports back to project areas concerning quarterly and yearly data, trend information, and percentage unknowns for demographic and clinical fields, edit checks and updates, as well as regular communications via fax, phone and e-mail with project staff.

Long-term Objective 2.7, Performance Measure 1

More than 50 percent of all preventable infertility among women is a result of STDs, primarily chlamydia and gonorrhea. Because most infected women and at least one half of infected men have no symptoms or have such mild symptoms that they do not seek medical care, many infections go undetected and are not reported or counted. Untreated chlamydia and gonorrhea infections can cause severe and costly reproductive and other adverse health consequences, including pelvic inflammatory disease (PID), which

can lead to infertility. An estimated 10 to 40 percent of women with untreated chlamydia or gonorrhea will develop PID which can result in ectopic pregnancy, chronic pelvic pain, and infertility.

This is a long-term measure. The actual performance for this measure in 2008 was 104,000 visits to the physician for PID by women 15-44 years of age compared to the 2002 baseline of 197,000 visits.

It is challenging to monitor trends in the incidence of PID for several reasons. First, diagnosis is based on clinical criteria that are often vague (symptoms of lower abdominal pain and pelvic tenderness), so making a diagnosis is imprecise, with both under- and over-diagnosis possible. Second, given this imprecision, it is not a nationally notifiable condition. Thus, measuring national PID trends has been based on the use of National Disease and Therapeutic Index (NDTI), proprietary data obtained by survey among samples of providers that contains information on the number of initial visits to physicians for PID by women 15 to 44 years of age. These data have limitations, including small sample sizes and limited representation; clinical facilities included only serve part of the U.S. population. From a 2002 baseline of 197,000 visits, the number has fluctuated significantly on a yearly basis. Because national estimates of the prevalence and incidence of gonorrhea and chlamydia have been stable, these significant fluctuations in PID seem unlikely. CDC researchers are investigating potential use of additional national medical care survey data for PID trends to develop more robust and stable measures. And, while the large fluctuations are problematic, the general trend downward from the baseline has been evaluated by CDC, and target for 2015 reset.

Long-term Objective 2.7, Performance Measure 2

CDC monitors trends in prevalence among women enrolled in the U.S. Department of Labor National Job Training Program (NJTP) for economically disadvantaged women aged 16 to 24. This measure reflects the prevalence of chlamydia infection in a population of high-risk young women who are not seeking health care. They are routinely screened as part of their enrollment in the program.

The actual performance in 2008 was 12.8 percent of women entering the National Job Training Program who tested positive for Chlamydia compared to the target of 9.0 percent. The performance target for this measure was set at an approximate target level; however the deviation from that level is significant and material. Chlamydia prevalence in women entering the NJTP has substantially increased from 9.9 percent in 2003 to 13.2 percent in 2007, but this increase does not likely represent a true increase in disease burden. In 2005, among women entering the program, chlamydia prevalence was 9.2 percent. Chlamydia prevalence among women entering the program decreased steadily from 2003 (9.9 percent) to 2005 (9.2 percent) until the introduction of a more sensitive test in 2006, at which point Chlamydia prevalence sharply increased to 13.1 percent. Among men entering the program in 2006, chlamydia prevalence was 7.9 percent, which is little changed from the chlamydia prevalence of 8.1 percent in 2005. There was no change in the test types used among men. CDC analyzed prevalence data from 2006, 2007, and 2008 and determined that prevalence is again moving in a downward direction now that use of the more sensitive test is completely integrated in the program. Target rates for future years and the long-term target were adjusted to reflect a continued decrease in prevalence, but at a higher level than in 2002 to 2005 because of the increased sensitivity of the test now being used.

Long-term Objective 2.7, Performance Measure 3

This measure reflects prevalence of Chlamydia in a population of young, sexually-active women seeking reproductive health care. CDCs Infertility Prevention Program (IPP) provides funding to Title X Family Planning Clinics to screen women for chlamydia in accordance with CDCs recommendation that all sexually-active women under age 26 be screened annually for chlamydia.

The actual performance for this measure in 2008 was 7.4 percent of women under age 25 who tested positive for Chlamydia in funded family planning clinics compared to the target of 6.3 percent. The performance target for this measure was set at an approximate target level, and the deviation from that

level is slight. There was no effect on overall programs or activity performance. Chlamydia prevalence in women under age 25 in publicly-funded family planning clinics increased from 5.9 percent in 2003 to 7.4 percent in 2008. CDC advises IPP programs to use their limited funds to support clinics with higher prevalence of Chlamydia, and away from clinics with lower prevalence. If this advice is followed, there will be more screening in higher prevalence populations and less screening in lower prevalence populations, driving the overall reported prevalence upward. CDC reset targets to reflect these realities.

In addition to the above data, reported chlamydial infections have increased in the United States to over 1.2 million infections in 2008, reflecting the expansion of screening activities, increased use of the most sensitive diagnostic tests, an emphasis on case reporting from providers and laboratories, and improvements in reporting systems. Increases in reported chlamydial infections are likely to continue as screening expands to more public and private medical settings. In 2000, the Health Plan Employer Data and Information Set (HEDIS) introduced a measure for chlamydia screening of sexually active women, 16 through 25 years of age, who receive their medical care through managed care organizations. The promulgation of, and adherence to, this measure are also likely to increase screening and reporting practices in the private sector.

Long-term Objective 2.7, Performance Measure 4

It is estimated that more than 50 percent of all preventable infertility among women is a result of STDs, primarily chlamydial infection and gonorrhea. Because most infected women, and at least one half of infected men, have no symptoms or have such mild symptoms that they do not seek medical care, many infections go undetected and are not reported or counted. In fact, it is estimated that 2.8 million new chlamydial infections and 700,000 gonorrheal infections occur each year in the United States. In women, untreated gonorrhea can cause severe and costly reproductive and other adverse health consequences, including pelvic inflammatory disease (PID), which can lead to infertility, ectopic pregnancy, and chronic pelvic pain.

The actual performance for this measure in 2008 was 285 cases of gonorrhea per 100,000 women aged 15 to 44 compared to the target of 276 per 100,000 women aged 15 to 44. The performance target for this measure was set at an approximate target level, and the deviation from that level is slight. There was no effect on overall programs or activity performance. This measure provides the best national data on gonorrhea incidence among women of reproductive age. Gonorrhea prevalence in women aged 15 to 44 has increased from 279 per 100,000 in 2002 to 285 per 100,000 in 2008.

The gonorrhea incidence for FY 2010 and FY 2011 is expected to be stable. Reported rates of cases of gonorrhea have been essentially flat over the past several years. However, CDC surveillance scientists believe that since diagnostic tests with improved sensitivity are increasingly being used for gonorrhea testing, true population morbidity may actually be decreasing, with the two trends offsetting each other and resulting in apparently stable morbidity. While the greatest shift to more sensitive tests has already occurred (potentially giving us an opportunity to see true population decreases in the future), an additional trend---more gonorrhea testing occurring as a result of increased chlamydia testing (since the two tests are increasingly run as a dual test package)---may again provide an offset that could mask falling population morbidity. Thus, given this constellation of factors, a stable incidence rate is expected.

Long-term Objective 2.7, Performance Measure 5

Persistence of syphilis is a sentinel public health event with important social and historical significance. Syphilis is preventable and curable. Syphilis increases efficiency of HIV transmission two to five-fold and is associated with serious morbidity on its own (e.g., strokes, other neurologic disease, and serious illness in babies). These data provide the best national data on the incidence of the early, symptomatic stages of syphilis (i.e., primary and secondary syphilis). CDC will work to achieve interim indicators progressing toward the long-term goal of elimination.

The actual performance for this measure was in 2008 was 4.5 cases of primary and secondary (P&S) syphilis per 100,000 population compared to the long-term target of less than 3.2 cases per 100,000 population. Primary and secondary syphilis cases increased from 2.5 cases per 100,000 in 2003 to 4.5 cases per 100,000 in 2008. CDC aims to slow the rate of the increases by strengthening prevention for MSM while supporting effective interventions to sustain prevention and control among heterosexual men and women. To better ensure that syphilis prevention and control interventions are evidence-based and targeted to populations with greatest needs, CDC, in October 2008, instituted the Syphilis Elimination Evidence-based Action Planning process for all project areas receiving Syphilis Elimination funds. This monitoring process is designed to improve program monitoring by promoting better analysis of local surveillance data and program performance indicators. CDC carefully reviews each of the submitted action plans and provides guidance and technical assistance as warranted to ensure the appropriateness and effectiveness of intervention activities.

Long-term Objective 2.7, Performance Measure 6

Measure 6a:

Beginning in 2001, syphilis rates among men began to rise, after declining since 1991. Between 2005 through 2008, the national P&S syphilis rate increased from 3.0 to 4.5 cases per 100,000 population. The overall increase in syphilis rates from 2005 to 2008 was driven primarily by increases among males, but the rate among females increased for the fourth year in a row, following a decade of declines.

The actual performance for this measure in FY 2008 was 7.6 cases of P&S syphilis per 100,000 population in males. In FY 2002, the incidence of P&S syphilis in men was 3.8 per 100,000 (initial 2002 baseline). However, because after 2002, an outbreak of syphilis among men who have sex with men (MSM) drove up the male syphilis rates, CDC reported a new baseline for 2006. The goal for 2015 for P&S syphilis takes into account the outbreak, and expectations for controlling and reversing the trend. The annual targets for P&S syphilis in men for 2008 through 2010 also take these increases into account. Primary and secondary syphilis cases in men increased from 4.2 cases per 100,000 in 2003 to 7.6 cases per 100,000 in 2008.

Data suggested, and additional studies confirmed, that the great majority of cases in men were attributable to transmission among MSM, many of whom are at high-risk for transmitting or acquiring HIV infection. Traditional approaches to syphilis prevention are less effective in this population, and reducing syphilis among MSM requires different approaches from those used with women. CDC is also ensuring the increased application of evidence-based approaches to this target group through the use of the Syphilis Elimination Evidence-based Action Planning process and by facilitating peer-to-peer technology transfer through organized monthly web-based seminars during which lessons learned and emerging best practices are shared and discussed.

Measure 6b:

While the overall increase in syphilis rates from 2005 to 2008 was driven primarily by increases among males, the rate among females increased for the third year in a row, following a decade of declines (from 0.9 per 100,000 in 2005 to 1.5 in 2008). As mentioned above, the prevention approaches used with women are different from those used with MSM and the complications of infection are also different (risk of transmission to babies). With this measure, CDC monitors its progress in addressing syphilis among women and continues to substantively support syphilis and STD prevention services to women aimed at reducing adverse outcomes of pregnancy.

Long-term Objective 2.7, Performance Measure 7

When a woman has a syphilis infection during pregnancy, she may transmit the infection to the fetus in utero. This transmission often results in fetal death or an infant born with physical and mental

developmental disabilities. Most cases of congenital syphilis are easily preventable if women are screened for syphilis and treated early during prenatal care, as recommended by CDC and other professional health organizations and required in all 50 states. CDC is an actively engaged partner in the WHO initiative to eliminate congenital syphilis.

The actual performance for this measure in 2008 was 10.1 cases of congenital syphilis per 100,000 live births compared to the target of 8.5 cases per 100,000 live births. Congenital syphilis cases decreased from 10.6 cases per 100,000 in 2003 to 8.2 cases per 100,000 in 2005, but have risen slightly each year since 2005. Increases in congenital syphilis follow increases in syphilis rates in women. CDC has reset targets to reflect the expected continued increases.

Long-term Objective 2.7, Performance Measure 8

Syphilis remains an example of racial disparity in health, with historical and sociological significance. In 1997, prior to initiation of the National Plan to Eliminate Syphilis from the United States, the Black:White rate ratio was 43:1 and by 2008 had dropped to 8.1:1. With this measure, CDC monitors its progress in reducing this important historic disparity while addressing the new epidemic in syphilis among MSM.

The actual performance for this measure in FY 2008 was the Black:White ratio of P&S syphilis of 8.1:1 compared to the target of 5.5:1. There was no effect on overall programs or activity performance. After achieving significant decreases through 2005, the Black:White ratio has increased each year. CDC reset its targets on this measure to reflect the expected continued increases. Targets are less than the expected increases in the absence of CDC intervention.

TUBERCULOSIS

LONG TERM OBJECTIVE 2.8: DECREASE THE RATE OF CASES OF TB AMONG U.S.-BORN PERSONS IN THE UNITED STATES.

Measure	FY	Target	Result
2.8.1: Decrease the rate of cases of TB among U.S.-born persons (per 100,000 population). *(Outcome)*	*Out-Year Target*	<2.0 (2015)	Sep 30, 2016
	2011	1.9	Sep 30, 2012
	2010	1.9	Sep 30, 2011
	2009	1.8	Sep 30, 2010
	2008	1.9	2.0 (Target Not Met but Improved)
	2007	2.1	2.1 (Target Met)
	2006	N/A	2.3
2.8.2: Increase the percentage of TB patients who complete a course of curative TB treatment within 12 months of initiation of treatment (some patients require more than 12 months). *(Outcome)*	*Out-Year Target*	(2015)	Sep 30, 2016
	2011	>87.5%	Sep 30, 2014
	2010	>87.5%	Sep 30, 2013
	2009	>88.0%	Sep 30, 2012
	2008	>87.5%	Sep 30, 2011
	2007	87.3%	Sep 30, 2010
	2006	86.2%	83.5% (Target Not Met but Improved)
2.8.3: Increase the percentage of TB patients with initial positive cultures who also have drug susceptibility results. *(Outcome)*	*Out-Year Target*	>95% (2015)	Sep 30, 2016
	2011	>95%	Sep 30, 2012
	2010	>95%	Sep 30, 2011
	2009	>95%	Sep 30, 2010
	2008	95%	93.4% (Target Not Met)
	2007	95%	94.6% (Target Not Met but Improved)
	2006	N/A	92.2%
2.8.4: Increase the percentage of contacts of infectious (Acid-Fast Bacillus (AFB) smear-positive) cases that are placed on treatment for latent TB infection and complete a treatment regimen. *(Outcome)*	*Out-Year Target*	>or = 43% (2015)	Dec 31, 2018
	2011	>or = 43%	Dec 31, 2014
	2010	>or = 43%	Dec 31, 2013
	2009	>or = 43%	Dec 31, 2012
	2008	>or = 43%	Dec 31, 2011
	2007	43%	Dec 31, 2010
	2006	59%	47.2% (Target Not Met but Improved)

Unique Identifier	Data Source	Data Validation
2.8.1	The National TB Surveillance System	TB morbidity data and related information submitted via the national TB Surveillance System are entered locally or at the state level into CDC-developed software which contains numerous data validation checks. Data received at CDC are reviewed to confirm their integrity and evaluate completeness. Routine data quality reports are generated to assess data

Unique Identifier	Data Source	Data Validation
		completeness and identify inconsistencies. Data submitted via the national Aggregate Reports for TB Program Evaluation are checked for accuracy and inconsistencies. Problems are resolved by CDC staff working with state and local TB program staff. During regular visits to state, local, and territorial health departments, CDC staff review TB registers and other records and data systems and compare records for verification and accuracy. At the end of each year, data are again reviewed before data and counts are finalized and published.
2.8.2	The National TB Surveillance System	TB morbidity data and related information submitted via the national TB Surveillance System are entered locally or at the state level into CDC-developed software which contains numerous data validation checks. Data received at CDC are reviewed to confirm their integrity and evaluate completeness. Routine data quality reports are generated to assess data completeness and identify inconsistencies. Data submitted via the national Aggregate Reports for TB Program Evaluation are checked for accuracy and inconsistencies. Problems are resolved by CDC staff working with state and local TB program staff. During regular visits to state, local, and territorial health departments, CDC staff review TB registers and other records and data systems and compare records for verification and accuracy. At the end of each year, data are again reviewed before data and counts are finalized and published.
2.8.3	The National TB Surveillance System	TB morbidity data and related information submitted via the national TB Surveillance System are entered locally or at the state level into CDC-developed software which contains numerous data validation checks. Data received at CDC are reviewed to confirm their integrity and evaluate completeness. Routine data quality reports are generated to assess data completeness and identify inconsistencies. Data submitted via the national Aggregate Reports for TB

Unique Identifier	Data Source	Data Validation
		Program Evaluation are checked for accuracy and inconsistencies. Problems are resolved by CDC staff working with state and local TB program staff. During regular visits to state, local, and territorial health departments, CDC staff review TB registers and other records and data systems and compare records for verification and accuracy. At the end of each year, data are again reviewed before data and counts are finalized and published.
2.8.4	The National TB Surveillance System and the national Aggregate Reports for TB Program Evaluation	TB morbidity data and related information submitted via the national TB Surveillance System are entered locally or at the state level into CDC-developed software which contains numerous data validation checks. Data received at CDC are reviewed to confirm their integrity and evaluate completeness. Routine data quality reports are generated to assess data completeness and identify inconsistencies. Data submitted via the national Aggregate Reports for TB Program Evaluation are checked for accuracy and inconsistencies. Problems are resolved by CDC staff working with state and local TB program staff. During regular visits to state, local, and territorial health departments, CDC staff review TB registers and other records and data systems and compare records for verification and accuracy. At the end of each year, data are again reviewed before data and counts are finalized and published.

Long-term Objective 2.8, Performance Measure 1

Despite the global epidemic, rates of TB have been declining for 14 years in the U.S. due to successful control measures begun in the early 1990s. Most of this decline is attributable to declines among U.S.-born persons. An estimated nine to 14 million U.S. citizens have latent TB infection, and about 10 percent of these individuals will develop TB at some point in their lives. Those who are infected with HIV have a greater chance of developing TB. The decline in rates among U.S. born persons is due to successful control measures begun in the early 1990s and supported by CDC in cooperation with state partners. The result has been a consistent decline over the past 14 years in the rate of TB among U.S.-born persons. Rates in 2008 were the lowest rate since reporting began at 2.0/100,000 persons.

Persons born outside the U.S. account for 59 percent of all U.S. TB cases, constituting a majority of cases for the third year in a row. Ensuring future declines in TB in the U.S. is dependent upon reducing TB among foreign-born persons who enter the U.S. This measure serves as both a long-term and annual measure.

Long-term Objective 2.8, Performance Measure 2

Because completion of TB treatment is the most effective way to reduce the spread of TB and prevent its complications, this objective is the highest priority for CDC's TB program. Its achievement is vital to reduce TB cases and eventually to eliminate TB. Patients who do not complete therapy within 12 months are often difficult to treat and require numerous interventions. CDC supports workers from cultural and ethnic groups with high TB incidence to provide outreach to others in their community. Outreach workers help patients complete treatment through directly observed therapy incentives and other adherence strategies. CDC and the CDC-funded Regional Training and Medical Consultation Centers also design and implement training and educational aids for health department and healthcare providers to improve the skills needed to help achieve this objective. Over the past 14 years, substantial progress has been made in achieving completion of therapy and in 2006, 83.5 percent of patients received a curative course of treatment, a substantial increase over the 1994 baseline of 67.6 percent. The performance target for the following measures was set at an approximate target level, and the deviation from that level is slight. There was no effect on overall program or activity performance. CDC will continue to work with its partners to increase performance annually in this area.

Long-term Objective 2.8, Performance Measure 3

Healthcare providers must know if a newly diagnosed infectious patient is infected with drug-sensitive or drug-resistant organisms so that appropriate drug therapy can be initiated. If this information is unknown, patients may receive inadequate treatment leading to the spread of drug-resistant organisms, resulting in increased morbidity, and mortality. In FY 2008, drug susceptibility results were documented for over 93 percent of TB patients with initial positive cultures. Performance appears to have decreased from FY 2007 to FY 2008, due in part to several states' (including one high morbidity state) reported decrease in the percentage of TB patients with initial positive cultures who also have drug susceptibility results, impacting the national percentage for this indicator. However, since this indicator is reported on a follow-up form and not the initial Report of a Verified Case of Tuberculosis (RVCT) form submitted to CDC, there is a lag in reporting for cases, especially for those diagnosed late in the year. It is possible, though not definite, that a higher percentage of cases were diagnosed later in the year for FY 2008 compared to FY 2007, potentially explaining decreased performance in FY 2008.

Progress toward this measure is attributable to increased efforts of state and local health departments and hospital infection-control practitioners to address the resurgence of TB, as well as increased funding for health department laboratories to purchase state-of-the-art equipment needed to perform more accurate and rapid laboratory testing and confirmation for TB and multi drug-resistant TB. The performance target for the following measures was set at an approximate target level, and the deviation from that level is slight. There was no effect on overall program or activity performance. CDC will continue to work with state partners to improve performance in this area.

Long-term Objective 2.8, Performance Measure 4

Completion of treatment for latent TB infection among contacts of infectious TB cases is a cornerstone of U.S. efforts to reduce TB and eliminate the disease, second only to ensuring that those with active TB complete treatment with appropriate drugs. Contacts of smear-positive TB patients are at high risk of developing TB and therefore must be screened for infection. If infected, these contacts should be offered complete treatment for latent infection. CDC supports identifying and examining contacts of persons with active TB, as well as completing treatment for contacts who have latent TB infection, through cooperative agreements with state and local health departments.

Performance on this indicator has improved by approximately 6 percent from FY 2002 to FY 2006, but much progress is needed. Potential steps to increase the percentage of infected contacts of infectious cases who are placed on treatment for LTBI and complete treatment include: 1) assess local challenges with or

barriers to conducting contact investigations of infectious TB cases to improve identification of infected contacts; 2) improve program monitoring and evaluation efforts involving infectious contacts in order to highlight effective strategies; 3) review National Tuberculosis Indicators Project (NTIP) reports on contact investigation to assess performance by local reporting jurisdiction; and 4) share best-practices for improving treatment initiation and completion of treatment for infected contacts of infectious TB cases among jurisdictions.

EMERGING ZOONOTIC INFECTIOUS DISEASES

Measure	FY	Target	Result
3.E.1: Enhance detection and control of foodborne outbreaks by increasing the number of foodborne isolates identified, fingerprinted, and electronically submitted to CDC's computerized national database networks with annual level funding. *(Efficiency)*	*2011*	35,276 isolates	Dec 31, 2011
	2010	35,276 isolates	Dec 31, 2010
	2009	35,276 isolates	37,679 (Target Exceeded)
	2008	32,069 isolates	39,888 (Target Exceeded)
	2007	28,633 isolates	32,665 (Target Exceeded)
	2006	24,866 isolates	27,618 (Target Exceeded)

Unique Identifier	Data Source	Data Validation
3.E.1	PulseNet USA national databases established and maintained at CDC	Pattern submissions to PulseNet national databases are assessed and reviewed on a daily basis at CDC. Submitters to PulseNet databases are certified for competency before they are given access to the national databases. They are required to complete proficiency testing on an annual basis. Pattern and serotype statistics for all of the PulseNet databases are compiled, verified and reported on a quarterly and annual basis.

Efficiency Measure 3.E.1:

PulseNet, an early warning system for outbreaks of foodborne disease, is a national network of public health laboratories that performs DNA fingerprinting on bacteria that may be foodborne. In FY 2009, PulseNet exceeded its target of 35,276 isolates identified, fingerprinted and electronically submitted to CDC's computerized national databases with annual level funding, by submitting 37,679 isolates total. The submissions enable PulseNet to detect more and smaller clusters of foodborne infections than ever before. Exceeding this target is related to ongoing CDC support for capacity building activities in state and local public health laboratories and increased coordination, education, and submissions from state and local partner laboratories as well as a very busy year with increased submissions from large multi-state outbreaks of E. coli O157 from ground beef and cookie dough; salmonella infections from among others ground pepper, peanut butter and paste, and contact with amphibians. In FY 2004 to FY 2008, CDC exceeded its target for this measure by five to eleven percent, indicating the enthusiasm and commitment of the participants in the network. The target was exceeded in FY 2008 by more than 15 percent due to increased participation as well as an increased general volume of submissions. CDC will continue to increase the number of individuals at the participating laboratories who are certified to electronically submit pulsed-field gel electrophoresis (PFGE) patterns directly to the database. CDC also provides funds to state and local laboratories to upgrade the instruments and equipment needed to conduct PFGE.

The targets for this measure were initially developed during the OMB Program Assessment review of the former Infectious Disease program in 2004. Ambitious targets were set to more than double the number of annual isolates identified, fingerprinted, and electronically submitted from the baseline of 14,864 to 35,726. The overall target was met in 2009. Now that the FY 2009 target of isolates has been met, CDC will discuss the possibility of retiring this measure, and developing a new measure for improving the food

safety system. The PulseNet system may have reached a maximum annual capacity of isolates submitted and attention will be focused on gaining efficiencies and improving other aspects of the food safety program. The increased number of isolates annually submitted enables PulseNet to detect more and smaller outbreaks of foodborne infections, and once identified, concerted state and local control measures in concert with the Food and Drug Administration (FDA) and the US Department of Agriculture's Food Safety Inspection Service (USDA/FSIS) have avoided potential illness.

LONG TERM OBJECTIVE 3.1: PROTECT AMERICANS FROM INFECTIOUS DISEASES – FOODBORNE ILLNESSES.

Measure	FY	Target	Result
3.1.1a: By 2010, reduce the incidence of infection with four key foodborne pathogens by 50%. Campylobacter *(Outcome)*	2011	12.18	May 31, 2012
	2010	12.30	May 31, 2011
	2009	13.25	May 31, 2010
	2008	14.20	12.68 (Target Exceeded)
	2007	15.14	12.79 (Target Exceeded)
	2006	16.10	12.71 (Target Exceeded)
3.1.1b: By 2010, reduce the incidence of infection with four key foodborne pathogens by 50%. Escherichia coli O157:H7 *(Outcome)*	2011	1.00	May 31, 2012
	2010	1.00	May 31, 2011
	2009	1.08	May 31, 2010
	2008	1.15	1.12 (Target Exceeded)
	2007	1.22	1.20 (Target Exceeded)
	2006	1.30	1.31 (Target Not Met)
3.1.1c: By 2010, reduce the incidence of infection with four key foodborne pathogens by 50%. Listeria monocytogenes *(Outcome)*	2011	0.23	May 31, 2012
	2010	0.23	May 31, 2011
	2009	0.27	May 31, 2010
	2008	0.29	0.29 (Target Met)
	2007	0.31	0.27 (Target Exceeded)
	2006	0.33	0.31 (Target Exceeded)
3.1.1d: By 2010, reduce the incidence of infection with four key foodborne pathogens by 50%. Salmonella species *(Outcome)*	2011	6.80	May 31, 2012
	2010	6.80	May 31, 2011
	2009	7.31	May 31, 2010
	2008	7.84	16.20 (Target Not Met)
	2007	8.39	14.92 (Target Not Met)
	2006	8.90	14.81 (Target Not Met)

Unique Identifier	Data Source	Data Validation
3.1.1	FoodNet (The Foodborne Diseases Active Surveillance Network) Data	FoodNet data are transmitted, updated, and reviewed monthly. Incomplete data are reviewed with sites on a monthly basis, as are cross checks comparing local data with national

Unique Identifier	Data Source	Data Validation
		data for data validity. Data are closed out and summarized on an annual cycle to produce preliminary reports, published in MMWR in spring of the following year, and a final report, later that year, once the updated population denominator data are available from the US Bureau of Census.

Long-term Objective 3.1, Performance Measure 1

Foodborne illness is recognized as a significant public health problem in the U.S. It is estimated that foodborne pathogens cause millions of illnesses, over 300,000 hospitalizations, and 5,000 deaths annually. This measure supports tracking new and total cases of the most common foodborne diseases and was established as part of the Healthy People 2010 (HP2010) process. HP2010 focuses on the most significant preventable threats to health and monitors progress toward national objectives aimed at reducing these threats. The objective of the HP 2010 food safety focus area is to reduce foodborne illness. The Food and Drug Administration (FDA) and the United States Department of Agriculture's Food Safety and Inspections Service (USDA/FSIS) are co-leads for the HP 2010 food safety focus area; however, CDC monitors and investigates human illness resulting from contaminated food and provides independent information on foodborne illnesses and outbreaks to the regulatory agencies so they can develop and implement effective control measures.

Campylobacter

From FY 2005 - FY 2008, the target for Campylobacter has been exceeded. Targets were set based upon historical baselines as part of the HP 2010 process. Preventive measures implemented by the FDA, FSIS, and others have achieved significant public health outcomes since the baseline measure, however progress has plateaued in the last four years. CDC, FDA, FSIS and other partners are still working on reaching the HP 2010 goal, and have begun discussions about setting ambitious goals as part of the Healthy People 2020 (HP 2020) process. FSIS completed a baseline study of levels of contamination of poultry. The results of this study were posted on the FSIS Website at http://www.fsis.usda.gov/PDF/Baseline_Data_Young_Chicken_2007-2008.pdf and will be the basis for development of new risk management strategies. FDA is actively promoting the consumption of pasteurized milk. The renewed interest among some members of the public for raw milk consumption is a serious problem. CDC is reviewing and summarizing raw milk outbreak data to highlight the hazards of raw milk consumption.

E. coli

The target for infections with E.coli O157:H7 was exceeded for FY 2008. After the incidence of E.coli O157 infections declined to a low in 2004, exceeding the 2010 target, incidence increased again in the next two years returning to previous levels, declined slightly in 2007, and then increased slightly in 2008. This recent increase is unlikely to be related to contamination of ground beef alone, and may be related to contamination of fresh produce and other foods. Interagency dialogue is underway with our regulatory partners and with industry to increase the development and application of effective prevention strategies for E. coli O157 in meats, produce, and other foods to decrease these rates in the future.

Listeria

The target for Listeria was exceeded from FY 2005 through FY 2007, and met in FY 2008. The progress that has been made thus far has been the result of major efforts in the processed meat/hot dog industry to reduce contamination. In collaboration with FDA and FSIS, CDC continues broad implementation of a

national Listeria Action Plan to further reduce Listeria cases through efficient risk management, empowering consumers, and improving consumer safety to achieve future targets.

Salmonella

The targets for Salmonella have not been met FY 2005 through FY 2008. Rates of infection with Salmonella have decreased only moderately since 1996. This may reflect continuing Salmonella contamination of poultry, meat, and the environment in which produce is grown and processed and yet to be defined infections caused by non-food sources. New and continuing interagency efforts in research and interventions to improve the effectiveness of food safety measures for Salmonella are now underway. Additionally FSIS announced a major salmonella initiative in February 2006 that included several components including focusing testing on the establishments with the most difficulty in controlling salmonella. FDA, FSIS, and CDC will be looking at revising these targets as plans are initiated for Healthy People 2020.

CDC and FDA jointly developed an HHS High Priority Goal for Salmonella Enteritidis (SE) focused on decreasing the rate of sproadic SE illnesses, the number of SE outbreaks, and the number of SE cases associated with outbreaks. FDA is the lead for the goal. In 2009, FDA published a final rule, Prevention of Salmonella Enteritidis in Shell Eggs During Production, Transportation, and Storage, that is expected to reduce SE-associated illnesses and deaths by reducing the risk that shell eggs are contaminated with SE. For the High Priority Goal, CDC will provide the data essential for determining the impact of the new FDA regulation.

LONG TERM OBJECTIVE 4.1: REDUCE THE SPREAD OF ANTIMICROBIAL RESISTANCE.

Measure	FY	Target	Result
4.1.1: Decrease the number of antibiotic courses prescribed for ear infections in children under 5 years of age per 100 children. *(Outcome)*	*2011*	49 courses	Aug 31, 2013
	2010	50 courses	Dec 31, 2012
	2009	55 courses	Dec 31, 2011
	2008	57 courses	Feb 28, 2010
	2007	60 courses	47.5 (Exceeded)
	2006	60 courses	51 (Exceeded)

Unique Identifier	Data Source	Data Validation
4.1.1	National Ambulatory Medical Care Survey (NAMCS), CDC, NCHS; and National Hospital Ambulatory Medical Care Survey (NHAMCS), CDC, NCHS	A 10% quality control sample of survey records was independently keyed and coded.

Long-term Objective 4.1, Performance Measure 1

CDC's public health campaign "Get Smart: Know When Antibiotics Work" is the focus of this measure. The campaign involves an alliance of partners working to reduce inappropriate antibiotic use and reduce the spread of resistance to antibiotics. Today, more than 85 campaign partners and 16 funded state-based programs collaborate with the "Get Smart" campaign on projects, such as developing educational curricula for medical students, multicultural outreach, developing guidelines for appropriate antibiotic use, widely disseminating educational materials and media campaign resources and implementing innovative community initiatives. The Get Smart program also provides funding to states to develop, implement, and evaluate local campaigns. In addition, the National Committee for Quality Assurance's Health Plan Employer Data and Information Set (HEDIS) now includes four performance measures on appropriate antibiotic use, developed and promoted through the campaign. CDC exceeded the FY 2007 target with an actual of 47.5 antimicrobial courses in children under five years of age per 100 children.

The benefit of antibiotics for acute otitis media (ear infection) is small and there are potential adverse events associated with antibiotic therapy. About 15 percent of children who take antibiotics suffer from diarrhea or vomiting and up to five percent have allergic reactions, which can be serious or life threatening. In addition, each unnecessary course of antibiotic given to a child can make future infections more difficult to treat. Greater resistance among many of the pathogens that cause ear infections has fueled an increase in the use of broader-spectrum and generally more expensive antibacterial agents. By reducing the number of courses of antibiotics for ear infections for children less than five years there will be a reduction in unnecessary antibiotic use leading to improved healthcare quality, cost savings and reduction in the development of antibiotic resistance.

This measure is based on a Healthy People (HP 2010) goal for which targets were established in 2000 based on a baseline rate of 108 antibiotic courses for otitis media per 100 children less than 5 years prescribed during 1996-1997, and a target of 88 prescribed courses for otitis media by 2010. Because performance in reducing antibiotic prescriptions for otitis media exceeded the previous 2010 target of 57 courses, the targeted number of antibiotic courses for otitis media has been revised more than once; most recently, the target was revised to 50 courses. Introduction of pneumococcal conjugate vaccine for children which also reduced pneumococcal otitis media has contributed to these successes.

Introduction of pneumococcal conjugate vaccine for children, which reduces pneumococcal otitis media, has contributed to these successes. However, a concerning increase in strains of bacteria not covered by the currently licensed pneumococcal conjugate vaccine has been detected, and one strain shows high levels of antimicrobial resistance which will present new challenges. Antimicrobial resistance was previously represented by three performance measures but now is covered by this one measure of prescriptions for otitis media in young children. Although the measure was reworded, the targets were not reset significantly. As the program sets forth goals for the next decade through the Healthy People 2020 process, the performance measure for reducing antibiotic resistance will be revisited to ensure that is it appropriately representative of the full scope of efforts to reduce antimicrobial resistance and targets are appropriately ambitious.

The Get Smart program is also forming new partnerships to address changing trends in healthcare (such as retail clinics, free and low-cost antibiotic program at chain pharmacies, employer-based health clinics). In 2008, CDC and its partners (including programs funded through the Epidemiology and Laboratory Capacity for Infectious Diseases Cooperative Agreement) hosted the first annual Get Smart about Antibiotics week which was designed and implemented raise awareness about antibiotic resistance and appropriate antibiotics use in the community.

LONG TERM OBJECTIVE 4.2: PROTECT AMERICANS FROM DEATH AND SERIOUS HARM CAUSED BY MEDICAL ERRORS AND PREVENTABLE COMPLICATIONS OF HEALTHCARE.

Measure	FY	Target	Result
4.2.1: Reduce the rate of central line associated bloodstream infections in medical/surgical ICU patients. *(Outcome)*	*2011*	0.5	May 31, 2012
	2010	0.5	May 31, 2011
	2009	1.0	May 31, 2010
	2008	3.19	1.4 (Target Exceeded)
	2007	3.54	1.8 (Target Exceeded)
	2006	3.58	2.2 (Target Exceeded)
4.2.2: The estimated number of cases of invasive MRSA infection. *(Outcome)*	*Out-Year Target*	92,272 (2011)	Sep 30, 2013
	2010	92,272	Sep 30, 2012
	2009	95,126	Sep 30, 2011
	2008	98,068	Sep 30, 2010
	2007	101,101	94,897 cases (Target Exceeded)
	2006	Baseline	104,228 cases
4.2.3: Reduce the CLABSI standardized infection ratio (SIR) by 70% from baseline. *(Outcome)*	*2011*	TBD	TBD
	2009	Baseline	SIR 1.0

Unique Identifier	Data Source	Data Validation
4.2.1, 4.2.3	National Healthcare Safety Network (NHSN)	Extensive cross-field edit checks are used for validation and incomplete records cannot be reported. Detailed instructions for completion of report forms ensure consistency across sites. Process and quality improvements occur through email updates and annual meetings.
4.2.2	Emerging Infections Program / Active Bacterial Core Surveillance/Emerging Infections Program Surveillance for Invasive MRSA Infections	Surveillance Site personnel trained in methodology, updates annually; laboratory audits performed by Site staff

Long-term Objective 4.2, Performance Measure 1

CDC's efforts to reduce and eliminate healthcare-associated infections are the focus of this measure. CDC has provided leadership in preventing central-line bloodstream infections by developing guidelines for the prevention of these infections, through technical assistance to organizations and state health agencies to implement these guidelines, and in working with CMS to implement Hospital Acquired Conditions rules related to bloodstream infections. CDC oversees the National Healthcare Safety Network (NHSN), the source of the data provided and a surveillance system currently being collecting data from approximately 2,200 hospitals and other healthcare facilities across 50 states.

Of those 50 states, 19 states are using or planning to use NHSN for the mandatory reporting of healthcare-associated infections (HAIs) from all hospitals. Additional states have legislation pending regarding public reporting, including several that are considering using NHSN specifically for public reporting of HAIs. Through this network, CDC is monitoring infections (including central-line associated bloodstream infections), antimicrobial resistance, and other adverse events in hospitals around the country.

Results for FY 2006 and FY 2007 show that CDC exceeded its target significantly. CDC believes that the reason it has exceeded its targets for this measure is the increased focus on preventing HAIs for NHSN users. There is now substantial evidence identifying effective methods to prevent central line-associated blood stream infections, and there have been successful efforts in increasing adherence to recommendations. Between April 2007 and October 2008, NHSN expanded from 491 to 1,953 sites and is currently at approximately 2,500 sites.

CDC's FY 2008 target of 3.19 infections per 1,000 central line days is consistent with previous plans to decrease the target by 10 percent (or 0.35) each year. However, CDC has undertaken efforts to more accurately and quantitatively determine appropriate targets. In January 2008, CDC implemented use of a new definition for CLABSI in NHSN, which modified the criteria for reporting of central line-associated bloodstream infections (CLABSIs) to the National Healthcare Safety Network (NHSN). The revision was implemented to reduce variability and subjectivity that previously existed due to variations in medical treatment practices. By removing the inclusion of subjective practice decisions, and narrowing the criteria to focus on laboratory verified data, the scientific rigor of data submitted has improved, resulting in a more accurate reporting of CLABSIs. Based on a recalculation of historical data using the new criteria, it is anticipated that actual reports of CLABSIs will drop by approximately 19 percent beginning in 2008 due to the new criteria.

For FY 2009, CDC significantly reduced the target to 1.0 to reflect additional investments in NHSN and HAIs through FY 2009 base appropriations and American Reinvestment and Recovery Act HAI funding for state health departments. These investments will continue to reduce HAIs due to CLABSIs in FY 2010 and, as a result, CDC's target for FY 2010 is 0.5. While CDC anticipates substantial reductions in

CLABSIs and other HAIs to result from the increased investments over the next few years, several challenges to identifying an appropriate target remain. CDC's Healthcare Infection Control Practices Advisory Committee (HICPAC) is currently working to develop scientific assessments of the preventability of various HAIs, which will allow for better assessment of reasonable targets. Additionally, although it was originally a voluntary system, NHSN is increasingly being required for use at the state level for mandatory reporting of HAIs, and many new healthcare facilities will soon be added as members due to these legislative mandates. Because the effectiveness of these facilities in reducing HAIs is unknown, it will create additional challenges for NHSN in the rapid expansion of the program. Regarding data integrity, state-led assessments in 2009 identified several variables for which sites inconsistently applied proper methods. Efforts to clarify or remove these variables have been implemented.

Long-term Objective 4.2, Performance Measure 2

Methicillin-resistant *Staphylococcus aureus* (MRSA) is an antibiotic resistant bacterium that causes emerging infections of national and international importance. Staph infections, including MRSA, occur most frequently among persons in hospitals and healthcare facilities (such as nursing homes and dialysis centers) and are known as healthcare-associated MRSA. MRSA infections that are acquired by persons who have not been recently hospitalized (within the past year) or have had a medical procedure not requiring hospitalization (such as dialysis, surgery, catheter insertion or removal) are known as community-associated MRSA infections. Staph or MRSA infections in the community are usually manifested as skin infections, such as pimples and boils, and occur in otherwise healthy people.

The estimated number of people developing their first serious MRSA infection (i.e., invasive) in 2007 was approximately 94,897 persons; approximately 16,118 of those persons died during the hospital stay for these serious MRSA infections. About 84 percent of all invasive MRSA infections were associated with healthcare, and of those, about two-thirds occurred outside of the hospital, while about one third occurred during hospitalization. About 16 percent of all the infections occurred in persons without obvious exposures to healthcare.

This measure will assist in evaluating the impact of CDC's programs to prevent MRSA infections, both in healthcare and community settings. The measure is aligned with the Healthy Healthcare Settings Goal Action Plan for both Objective 2 and Objective 3 and with the Strategic Plan for the Division of Healthcare Quality Promotion (DHQP). The measure is also aligned with the aims of the HHS Steering Committee on Healthcare Associated Infections, a new effort in the Office of the Secretary, HHS.

Active Bacterial Core surveillance (ABCs) is a core component of CDCs Emerging Infections Programs Network (EIP), and is a collaborative program involving CDC, state health departments, and universities. ABCs is an active laboratory- and population-based surveillance system for invasive bacterial pathogens of public health importance. For each case of invasive disease in the surveillance population, a case report with basic demographic information is completed and bacterial isolates are sent to CDC and other reference laboratories for additional laboratory evaluation. ABCs also provides an infrastructure for further public health research, including special studies aiming at identifying risk factors for disease, post-licensure evaluation of vaccine efficacy and monitoring effectiveness of prevention policies.

ABCs surveillance for MRSA was initially established in nine states in 2005 representing a population of over almost 15 million persons. This program operates out of DHQP, in conjunction with CDCs national Center for Immunizations and Respiratory Diseases, Division of Bacterial Diseases, the Division responsible for operations of ABCs overall.

Both hospital and community data for invasive MRSA infections are included in the ABC data set. The ABC's data has been collected by health departments for over a decade for a variety of infectious pathogens, most recently including MRSA. CDC believes it is very reliable for the most serious invasive

MRSA infections, in both healthcare and community settings. Additional measures to capture community MRSA infections more broadly are being developed. For now, measures that combine information from both hospital and community data will be used, and will be useful for determining overall progress in MRSA prevention, while targeted interventions will be applied.

In December 2008, a multidrug-resistant organism module was added to the National Healthcare Safety Network (NHSN). This module will provide surveillance data from participating facilities on multidrug-resistant organisms, including MRSA and simplified measures to assess the impact of MRSA prevention in healthcare settings. In the future, data from this source has the potential for use for estimating invasive MRSA cases.

CDC provides direct support and assistance to external partners involved in MRSA prevention initiatives including: Department of Veterans Health Affairs, State and Regional initiatives, Institute for Healthcare Improvement, and other multi-center prevention collaborative efforts. CDC works in collaboration with the Healthcare Infection Control Practices Advisory Committee (HICPAC) to develop and promote evidence-based infection control strategies to reduce transmission of MRSA and other pathogens in healthcare facilities. Through the Prevention Epicenter Program, CDC provides funding and works directly with academic partners to address important scientific questions regarding the prevention of MRSA and other resistant organisms. CDC launched a national evidence-based educational Campaign to Prevent Antimicrobial Resistance in Healthcare Settings that targets healthcare providers. The Campaign focuses on preventing antimicrobial resistance in healthcare settings by promoting four strategies targeting various patient populations including: hospitalized adults, dialysis patients, surgical patients, hospitalized children, and long-term care residents. CDC has developed and published guidance for the management and prevention of MRSA in the community based on review of available information and input from clinical and public health experts (CA-MRSA Clinical Management). In the fall of 2008, CDC launched a National MRSA Education Initiative to improve knowledge about MRSA in community settings, including recognition of the signs and symptoms, diagnosis and treatment, and prevention and control measures among both the general public and clinical audiences, particularly among at-risk or high-risk groups identified through recent surveillance and research studies.

CDC collaborates with state and local health departments to develop physician and patient guidance and education materials for MRSA (MRSA education materials). CDC performs needs and knowledge assessments with public health partners, at-risk groups, and the general public to target the development of guidance and education.

The targets are ambitious because they:

- require identification of effective prevention strategies for the community settings and outpatient settings that can be incorporated into the prevention programs outlined above.

- include both community and healthcare onset MRSA. While prevention measures for healthcare onset MRSA are well established, measures for community onset MRSA are still being developed.

- are dependent on application of prevention recommendations that require behavior change interventions (e.g. hand hygiene compliance).

- focus on MRSA which is a dynamic pathogen both in terms of biological characteristics and response to antibiotic treatment.

The key strategies to achieve future targets, as articulated in the CDCs Division of Healthcare Quality Promotion (DHQP) strategic plan, are to: expand capacity to detect and monitor antimicrobial resistance, maintain and improve capacity to respond and assess new and emerging problems associated with antimicrobial resistance, improve strategies for prevention of antimicrobial-resistant infections, improve

antimicrobial use in healthcare settings, and increase involvement of the public and private sectors and healthcare researchers.

Regarding data integrity, the accuracy of "Pneumonia" reports was adversely affected due to insufficient documentation and database defects. The program has provided additional clarification on variables and plans to migrate to a new database system in 2010.

Long-term Objective 4.2, Performance Measure 3

This measure has been approved as a developmental measure to ultimately replace measure 4.2.1. The HHS Action Plan to Prevent Healthcare Associated Infections identified central line associated blood stream infections (CLABSIs) as a priority for prevention with national 5-year prevention targets and metrics proposed. Likewise, new Healthy People 2020 objectives have been proposed to address the substantial human suffering and financial burden attributable to healthcare associated infections, one of which is to reduce CLABSIs. These changes are due in part to improved science, which has allowed DHQP to revise the existing measures for CLABSIs and incorporate them in to both the HHS Action Plan and Healthy People 2020. In addition to aligning with the HHS Action Plan and Healthy People 2020, the proposed changes would also provide a better indication of DHQP activities to reduce CLABSIs.

HEALTH PROMOTION

CHRONIC DISEASE PREVENTION, HEALTH PROMOTION, AND GENOMICS

Measure	FY	Target	Result
5.E.1: Number of financial actions (such as project carryover funds requests from grantees and grantee project re-budgeting) that delay the implementation of grantee and partners' activities. *(Efficiency)*	*2011*	382	Jun 30, 2012
	2010	394	Jun 30, 2011
	2009	406	Jun 30, 2010
	2008	419	424 (Target Not Met)
	2007	443	393 (Target Exceeded)

Unique Identifier	Data Source	Data Validation
5.E.1	The Extramural Programs Management Information System (EPMIS), which is an internal system for tracking and managing all types of budget actions.	EPMIS report is run periodically and results authenticated by Division budget leads at monthly meetings with Center budget execution staff.

Efficiency Measure 5.E.1:

In FY 2008, 424 financial actions delayed the implementation of grantee and partners activities. This number was a decrease from the FY 2005 baseline but did not meet the target for FY 2008.

This improvement was due to efforts made to reduce the number of post-award actions that do not require approval from the National Center for Chronic Disease Prevention and Health Promotion (NCCDPHP). NCCDPHP and CDC's Procurement and Grants Office have worked with project officers to identify what constitutes a post-award approval, and have implemented streamlined processes that provide guidance to the partners on when to request specific actions that require post-award approval. Project officers have worked with the cooperative agreement partners educating them on regulations that allow them latitude to make revisions without approval from NCCDPHP.

In FY 2008, an increase in these types of financial actions was due to an increase in the number of Funding Opportunity Announcements (FOA). In FY 2008, NCCDPHP published and awarded 20 new FOAs to multiple organizations. Also, NCCDPHP received 68 Congressional project applications that were processed and required additional post-award actions to be revised before programs could operate. Due to the high volume of projects ending, grantees requested carryover funding to complete activities under their current announcements in order to do orderly close-out.

Efforts continue to be made to reduce the number of post-award actions that do not require approval from the National Center for Chronic Disease Prevention and Health Promotion (NCCDPHP). NCCDPHP and CDC's Procurement and Grants Office have continued to work with project officers to identify what constitutes a post-award approval, and have implemented streamlined processes that provide guidance to the partners on when to request specific actions that require post-award approval. Project officers have worked with the cooperative agreement partners educating them on regulations that allow them latitude to make revisions without approval from NCCDPHP.

In FY 2009, an increase in these types of financial actions is expected due to publication of the Collaborative FOA DP09-901. In FY 2009, NCCDPHP published a FOA that incorporated four divisions and awards were made to all 50 states. This collaborative announcement will generate a significant amount of post-award actions because each program request is treated as an individual request. Also,

NCCDPHP is expected to receive 51 Congressional project applications that will be processed and require additional post-award actions to be revised before programs can operate. Efforts continue to be made to reduce the number of post-award actions that do not require approval from the National Center for Chronic Disease Prevention and Health Promotion (NCCDPHP). NCCDPHP and CDCs Procurement and Grants Office have continued to work with project officers to identify what constitutes a post-award approval, and have implemented streamlined processes that provide guidance to the partners on when to request specific actions that require post-award approval. Project officers have worked with the cooperative agreement partners educating them on regulations that allow them latitude to make revisions without approval from NCCDPHP.

Based on recent implementation of a Project Officer training course, increased use of Management Information Systems to track these actions, and increased emphasis on technical assistance, the program will take efforts to decrease these budget actions each year.

Approximately 85 percent of CDC's National Center for Chronic Disease Prevention and Health Promotions (NCCDPHP) budget is spent on extramural funding of grantees and cooperative agreement partners, especially state health departments. These grantees and partners utilize funding to conduct interventions that directly impact the health of the nation. Any delay in receipt of funding results in reduction of the number or duration of the interventions, which, in turn, affects the health impact of our grantees activities. Therefore, improving this measure positively impacts the implementation of public health interventions which lead to positive health outcomes.

CANCER PREVENTION AND CONTROL

LONG TERM OBJECTIVE 5.1: REDUCE DEATH AND DISABILITY DUE TO CANCER.

Measure	FY	Target	Result
5.1.1: Reduce the age-adjusted annual rate of breast cancer mortality per 100,000 female population. *(Outcome)*	*Out-Year Target*	21.3 (2015)	Apr 30, 2018
	1999	Baseline	26.6
5.1.2: Increase the percentage of women age 40+ who have had a mammogram within the previous two years. *(Outcome)*	*2010*	78%	Feb 23, 2012
	2008	77%	76.7% (Target Met)
	2006	N/A	76.6%
5.1.3: Percent of women 40 years of age and older diagnosed with breast cancer whose cancer was diagnosed at in situ or localized stage. *(Output)*	*Out-Year Target*	69% (2015)	Jun 30, 2018
	2011	68%	Jun 30, 2014
	2010	68%	Jun 30, 2013
	2009	68%	Jun 30, 2012
	2008	N/A	Jun 30, 2011
	2007	N/A	Jun 30, 2010
	2006	N/A	69%
5.1.4: Decrease the age-adjusted rate of invasive cervical cancer per 100,000 women ages 20+ screened through the NBCCEDP (excludes invasive cervical cancer diagnosed on the initial program screen). *(Outcome)*	*Out-Year Target*	12 (2013)	Feb 23, 2015
	2011	13	Feb 23, 2013
	2010	13	Feb 23, 2011
	2009	14	Feb 23, 2011
	2008	14	Feb 23, 2010
	2007	14	14 (Target Met)
	2006	N/A	15

Unique Identifier	Data Source	Data Validation
5.1.1	National Vital Statistics System, NCHS	Data from the NCHS, a nationally recognized public health information source, undergo statistical computation by the Data Analysis Support Team within CDCs Division of Cancer Prevention and Control to prepare measures based on definitions used within the cancer community.
5.1.2	Behavioral Risk Factor Surveillance System (BRFSS)	BRFSS is a state-based health survey system. Data are submitted to CDC on a monthly basis, where the data undergo rigorous quality checks. CDC also verifies performance through quarterly state reports and periodic site visits.
5.1.3	Data are from the CDC's National Program of Cancer Registries (NPCR) and the NCI's Surveillance, Epidemiology, and End Results (SEER) cancer registries that met data-quality criteria for all invasive cancer	Central cancer registries submit electronically to CDC on an annual basis. CDC compiles the data, performs rigorous quality checks, and generates data evaluation reports for the central cancer registries. All data

Unique Identifier	Data Source	Data Validation
	sites combined according the United States Cancer Statistics. States not meeting these criteria were excluded.	have indicators to assess data quality.
5.1.4	National Breast and Cervical Cancer Early Detection Program (NBCCEDP) Minimum Data Elements (MDE)	Grantees submit MDEs electronically to a data management contractor, who analyzes data and submits it to CDC. All data have indicators to assess completeness. Data are also assessed against established clinical standards.

Long-term Objective 5.1, Performance Measure 1

This is a long term measure for CDC. Data from 2006 shows an age-adjusted rate of 23.4 breast cancer deaths per 100,000 female population, an improvement from the 2005 rate of 24.1 per 100,000, and a 12 percent relative improvement from the 1999 baseline rate of 26.6 breast cancer deaths per 100,000 women.

CDC's National Breast and Cervical Cancer Early Detection Program (NBCCEDP) has contributed to the notable decline, in recent years, in breast and cervical cancer deaths by providing access to screening services, increasing breast and cervical cancer awareness and education, and inherently changing health-seeking behaviors in women for whom screening services are not otherwise available or accessible.

The NBCCEDP works with national organizations, state health agencies, and other key groups to develop, implement, and promote effective cancer prevention and control practices. Currently, the NBCCEDP provides support to all 50 states, the District of Columbia, five US territories, and 12 American Indian/Alaska Native tribes or tribal organizations to help low-income, uninsured and underinsured women gain access to breast and cervical cancer screening and diagnostic services. Timely mammography screening among women aged 40 years or older is the best available method to detect breast cancer in its earliest, most treatable stage, and could reduce breast cancer mortality by approximately 16 percent to 30 percent compared to women who are not screened.

Long-term Objective 5.1, Performance Measure 2

In FY 2008, the percentage of women age 40+ who received a mammogram within the previous two years was increased from the 2004 baseline of 74.6 percent to 76.7 percent, which is not a statistically significant difference from the 2008 target of 77 percent. This achievement demonstrates considerable progress toward achieving the FY 2010 target of 78 percent.

CDC's National Breast and Cervical Cancer Early Detection Program (NBCCEDP) focuses its efforts on reaching those women who are most likely to need assistance with gaining access to, and affording screening services. In FY 2008, the most recent year for which data is reported, the NBCCEDP screened 301,209 women for breast cancers, and detected 3,782 breast cancers.

The national screening program has contributed to the notable decline, in recent years, in breast and cervical cancer deaths by providing access to screening services, increasing breast and cervical cancer awareness and education, and inherently changing health-seeking behaviors in women for whom screening services are not otherwise available or accessible. In November 2008, the NBCCEDP began reimbursement for digital mammography the community standard of breast cancer screening. Though this is likely to increase the number of local providers serving underserved women, digital mammography is also more expensive than conventional mammography. With increased cost per screening, it is possible that the NBCCEDP will not be able to screen the same number of women with existing resources, which may reduce the NBCCEDP's capacity to increase or even maintain breast cancer screening rates.

Timely mammography screening among women aged 40 years or older is the best available method to detect breast cancer in its earliest, most treatable stage, and could reduce breast cancer mortality by approximately 16 percent to 30 percent compared with women who are not screened.

Long-term Objective 5.1, Performance Measure 3

Breast cancer is the most commonly diagnosed cancer and second leading cause of cancer death among women in the United States. Morbidity and mortality from breast cancer are reduced when women are diagnosed at in situ or localized stages. Breast cancer diagnosed at an early stage requires less aggressive treatment and the survival rates are significantly higher than for women diagnosed at later stages of the disease. Between 1996 and 2004, five-year survival for women diagnosed with in situ breast cancer was estimated to be 100 percent, and survival for women with localized disease was 98 percent. In contrast, 5-year survival for women diagnosed with regional disease was approximately 84 percent and survival for women with distant disease was 27 percent. The regular use of mammography improves the chances of a woman being diagnosed at an earlier stage of disease. Early diagnosis and the chance for longer survival are clearly aligned with the adult and older adult goals related to helping women live longer, high-quality, productive, and independent lives.

Stage at diagnosis strongly influences survival and reflects the use of mammography. By assessing the percent of women diagnosed at an in situ or localized stage, we can measure the effect of mammography use. The numerator is the number of women diagnosed with breast cancer at an in situ or localized stage. The denominator is the total number of women diagnosed with breast cancer at any stage. These percentages are not age adjusted.

In the baseline year for this measure, 2002, 68 percent of new breast cancer cases were diagnosed as in situ or localized; this rate remained relatively stable through 2006. The desired trend is an increase in in situ or localized breast cancers. This stability most likely reflects the saturation of mammography use among the majority of the population. The harder to reach women and women not previously regular users of mammography must be reached to increase the percent of women diagnosed with breast cancer at an early stage. Over this same period, researchers at the National Cancer Institute and CDC have been monitoring an apparent reduction in the proportion of women 40 years and older who have had a mammogram within the last two years. While this may be a coincidence, it underscores the need to assertively encourage participation in breast cancer screening through patient and provider education and through programs which support breast cancer screening for women who do not have insurance, such as the National Breast and Cervical Cancer Early Detection Program (NBCCEDP). In FY 2008, the most recent year for which data is reported, the NBCCEDP screened 301,209 women for breast cancer with mammography, and detected 3,782 breast cancers.

Two strategies that we believe are critical to making progress on this measure are increasing the proportion of women in the United States who regularly participate in breast cancer screening and improving the quality and accuracy of cancer staging data collected in the United States. The Comprehensive Cancer Control Program (CCCP) and the National Breast and Cervical Cancer Early Detection Program (NBCCEDP) both support program activities through our State program partners which will encourage women to begin and maintain regular breast cancer screening. Both programs place particular emphasis on trying to identify women who are "hard to reach" or who have never yet participated in breast cancer screening. CDC, as part of the consultation to state programs, strongly encourages the establishment of strong, active case management programs and conducts at least annual training for outreach and recruitment coordinators from each of the state programs. In addition, the National Program of Cancer Registries (which, in combination with NCI's SEER program provides cancer surveillance data for virtually 100 percent of the United States) has data quality assurance as one of the principal objectives for their program consultation activities (see milestone 2). Similarly, CDC maintains a record of the results of each cancer screening provided with program funds.

Long-term Objective 5.1, Performance Measure 4

Cervical cancer is highly preventable if precancerous changes are identified and it is highly treatable if cancer is detected early. One way to prevent cervical cancer is screening to find precancers before they turn into invasive cancer. The Pap test is the most common way to do this. Regular Pap tests decreases a woman's risk of cervical cancer by detecting precancerous cervical lesions, which can be treated effectively. If a precancer is found and treated, it can stop cervical cancer before it starts. Most invasive cervical cancers are found in women who have not had regular Pap tests.

This measure continues to improve from the FY 2004 baseline and meets the FY 2007 target of 14 per 100,000. This measure applies only to women screened through CDC's National Breast and Cervical Cancer Early Detection Program (NBCCEDP). The measure's improvement is likely due to the success of the NBCCEDP to meet and exceed program policies and goals, including prioritizing outreach to screen women rarely or never screened for cervical cancer and initiating timely and complete treatment for women diagnosed with precancerous cervical lesions. The NBCCEDP currently screens an estimated 8.7 percent of all American women age 18-64 eligible to participate in the NBCCEDP for cervical cancer.

In the past 12 months, the NBCCEDP screened 321,750 women for cervical cancer using the Pap test, and found 5,386 cervical cancers and high-grade and invasive cervical lesions. According to the *Annual Report to the Nation on the State of Cancer in the US*, incidence rates of invasive cervical cancer have declined since 1975, with an average 3.7 percent decline each year since 1996. This decline has occurred in all racial and ethnic groups, including white, black, Asian and Pacific Islander, and Hispanic women.

TOBACCO

LONG TERM OBJECTIVE 5.2: REDUCE DEATH AND DISABILITY AMONG ADULTS DUE TO TOBACCO USE.

Measure	FY	Target	Result
5.2.1: Reduce the age-adjusted annual rate of trachea, bronchus, and lung cancer mortality per 100,000 population. *(Outcome)*	*Out-Year Target*	43.3 (2013)	Jun 30, 2015
	2003	Baseline	54.1
5.2.2: Reduce per capita cigarette consumption in the U.S. per adult age 18+. *(Outcome)*	*2010*	1,511	No data source – see data validation below
	2009	1,558	
	2008	1,606	
	2007	1,656	

Unique Identifier	Data Source	Data Validation
5.2.1	National Vital Statistics System, NCHS	Data are validated by NCHS.
5.2.2	USDA, Economic Research Service, Tobacco Outlook Reports (TBS-263Oct 2007, Table 2)	The USDA Economic Research Service discontinued its twice annual data updates as of October 2007. The last USDA data are preliminary 2006. CDC conducted a feasibility study to replace the per capita consumption data source; the tobacco community is reviewing the results and considering possibilities for a new data source. As of yet, the new data source has not been identified. CDC is working with HHS, USDA, and the Department of the Treasury to reinstate the previous data source. The planned resolution date for this issue is the fourth quarter of FY 2010.

Long-term Objective 5.2, Performance Measure 1

This is a long term measure for CDC. The age-adjusted trachea, bronchus, and lung cancer mortality rate per 100,000 people dropped from 54.1 in 2003 to 53.2 in 2004, 52.6 in 2005, and 51.5 in 2006. Prior to the baseline year of FY 2003, mortality rates from lung cancer were decreasing steadily.

A substantial body of research demonstrates that comprehensive state tobacco control programs reduce smoking-attributable mortality, smoking prevalence, smoking initiation, and cigarette consumption. Recent research shows that the more states spend on comprehensive tobacco control programs, the greater the reductions in smoking, and that the longer states invest in such programs, the greater and faster the impact.

CDC directs and manages the National Tobacco Control Program and other extramural activities to address tobacco use. CDC also provides and supports training and technical assistance to all 50 states, the District of Columbia, territories, national networks, and tribal support centers. CDC will continue to link science and practice and provide leadership to build and sustain tobacco control capacity.

To this end, CDC prepared Best Practices for Comprehensive Tobacco Control Programs 2007. This guidance document, which updates the 1999 original, describes an integrated state budget structure for implementing interventions proven to be effective. CDC continues to support Best Practices for Comprehensive Tobacco Control Programs 2007, reflecting additional state experiences in implementing comprehensive programs and new scientific literature since its original release in 1999.

CDC will continue to advance the science base of tobacco control by conducting and coordinating research, surveillance, and evaluation activities related to tobacco and its impact on health. CDC synthesizes and translates research into practice; disseminates scientific findings; and provides technical assistance to states, territories, national networks, tribal support centers, and the general public.

Long-term Objective 5.2, Performance Measure 2

Per capita cigarette consumption for adults age 18+ has fallen from the baseline 1,814 in 2004 to 1,716 in 2005 (the last year in which data is available). The original baseline for this measure was 1,770. In a subsequent Tobacco Outlook Report, the U.S. Department of Agriculture revised the data for 2004 because of Census adjustments. Therefore, CDC's tobacco program revised its baseline and targets accordingly.

CDC supports the National Tobacco Prevention and Control (NTCP) program in 50 states and the District of Columbia. NTCP grants support state, local and territorial health department efforts to prevent initiation of tobacco use among youth and young adults, promote tobacco use cessation among adults and youth, eliminate exposure to secondhand smoke, and identify and eliminate tobacco-related disparities.

CDC supports the National Network of Tobacco Use Cessation Quitlines, a collaborative effort between CDC, the National Cancer Institute's (NCI) Cancer Information Service (CIS), the North American Quitline Consortium (NAQC), and state tobacco control programs through 1-800-QUIT-NOW.

CDC provides technical assistance and training to help states plan, establish, and evaluate its own tobacco control programs. CDC responds to approximately 50,000 scientific, technical and public inquiries on tobacco use each year. The program also provides advertising materials to states through the Media Campaign Resource Center.

Since 1964, the U.S. Surgeon General's reports on smoking and health have concluded that smoking is a primary cause of lung cancer. Achieving the targets of this measure therefore supports the goal of reducing death and disability due to lung cancer.

The USDA Economic Research Service discontinued its twice annual data updates as of October 2007. The last USDA data are preliminary 2006. CDC conducted a feasibility study to replace the per capita consumption data source; the tobacco community is reviewing the results and considering possibilities for a new data source. As of yet, the new data source has not been identified. CDC is working with HHS, USDA, and the Department of the Treasury to reinstate the previous data source. The planned resolution date for this issue is the fourth quarter of FY 2010.

DIABETES

LONG TERM OBJECTIVE 5.3: PREVENT DIABETES AND ITS COMPLICATIONS.

Measure	FY	Target	Result
5.3.1: Maintain the age-adjusted rate of incidence of End-Stage Renal Disease (ESRD) per 100,000 diabetic population at no higher than its current rate. *(Outcome)*	*Out-Year Target*	231.7 (2013)	Dec 31, 2014
	2002	Baseline	231.7
5.3.2: Increase the age-adjusted percentage of persons with diabetes age 18+ who receive an A1C test at least two times per year. *(Outcome)*	*2011*	75%	Dec 31, 2012
	2010	75%	Dec 31, 2011
	2009	74%	Dec 31, 2010
	2008	73%	68.5% (Target Not Met)
	2007	72%	69.6% (Target Not Met but Improved)
	2006	N/A	68.0%

Unique Identifier	Data Source	Data Validation
5.3.1	US Renal Data System	The USRDS is under the administrative oversight of the National Institutes of Health and the Centers for Medicare and Medicaid Services, whose Steering Committees responsibilities include data validation.
5.3.2	Behavioral Risk Factor Surveillance System (BRFSS)	BRFSS is a state-based health survey system. Data are submitted to CDC on a monthly basis, where the data undergo rigorous quality checks. CDC also verifies performance through quarterly state reports and periodic site visits.

Long-term Objective 5.3, Performance Measure 1

This is a long term measure for CDC.

End Stage Renal Disease (ESRD) is a complicated and disabling condition and one of the most expensive conditions for which the federal government provides financial coverage. Diabetes mellitus is presently the most common cause of ESRD in the U.S., accounting for approximately 44 percent of all new cases of ESRD.

For decades, ESRD incidence was increasing. However, since the late 1990s, the rates have declined. The 2002 baseline rate is 231.7 per 100,000 people with diabetes. As those with diabetes live longer, the incidence of ESRD is likely to increase. Therefore, CDC aims to maintain the current baseline rate.

In 2006, the age-adjusted incidence of ESRD was 205.7 per 100,000 diabetic population. This is based on three-year averages of the diabetic population, a continued improvement.

CDC's diabetes program works to eliminate the preventable burden of diabetes through leadership, research, programs, and policies that translate science into practice. CDC's diabetes activities are based on the prevailing science for diabetes prevention and control which demonstrates that many of the serious diabetes-related complications, including ESRD, may be prevented.

Long-term Objective 5.3, Performance Measure 2

Since the baseline year 2004, the percentage of receiving two or more A1C tests in this population has fluctuated from 68.8 percent in 2004 to 64.3 percent in 2005, back up to 69.6 percent in 2007, and down again to 68.5 percent in 2008.

For FY 2008, the actual rate of 68.5 percent is below the 73 percent target. Overall the rates for two or m ore A1c tests demonstrated a modest decrease compared to the FY 2007 rate of 69.6 percent. As the number of people with diabetes continues to increase, and as those with diabetes live longer, the targets for this measure will be increasingly challenging to meet.

Glucose control is one important pathophysiologic factor in the genesis of End Stage Renal Disease (ESRD) and other complications from diabetes. As A1C measurement is the best indicator of glucose control, the annual measure of A1C relates closely to the likelihood of achieving the long term measure of controlling the rate of ESRD and other complications among persons with diabetes.

CDC aims to increase the age-adjusted proportion of persons with diabetes who receive two or more A1C tests by one percentage point every year.

CDCs Diabetes program works to eliminate the preventable burden of diabetes through leadership, research, programs, and policies that translate science into practice. CDCs diabetes activities are based on the prevailing science for diabetes prevention and control which demonstrates that many of the serious diabetes-related complications, including ESRD, may be prevented.

HEART DISEASE AND STROKE

LONG TERM OBJECTIVE 5.4: REDUCE DEATH AND DISABILITY DUE TO HEART DISEASE AND STROKE.

Measure	FY	Target	Result
5.4.1a: Reduce the age-adjusted annual rate per 100,000 population of: coronary heart disease deaths *(Outcome)*	*Out-Year Target*	166 (*2015*)	Dec 31, 2017
	2000	Baseline	187
5.4.1b: Reduce the age-adjusted annual rate per 100,000 population of: stroke-related deaths *(Outcome)*	*Out-Year Target*	50 (*2015*)	Dec 31, 2017
	2000	Baseline	61
5.4.2: Increase the age-adjusted proportion of persons age 18+ with high blood pressure who have it controlled (<140/90). *(Outcome)*	*Out-Year Target*	59% (2010)	Dec 31, 2012
	2008	50%	Dec 31, 2010
	2006	41%	44% (Target Exceeded)
5.4.3: Maintain the age-adjusted proportion of persons age 20+ with high total cholesterol (>=240mg/dL) at no higher than its current rate. *(Outcome)*	*Out-Year Target*	17% (2010)	Dec 31, 2012
	2008	17%	Dec 31, 2010
	2006	17%	16% (Target Exceeded)

Unique Identifier	Data Source	Data Validation
5.4.1-5.4.3	National Health and Nutrition Examination Survey (NHANES) - biennial	Data are validated by NCHS.

Long-term Objective 5.4, Performance Measure 1

This is a long term measure for CDC. Coronary heart disease (CHD) and stroke death rates have been decreasing steadily since the 1970s and 1900, respectively. Rates for 2006 were 135 per 100,000 population for heart disease deaths, and 44 per 100,000 population for stroke-related deaths. These are improvements from the 2000 baselines of 187 and 61, and show the out-year targets exceeded for both CHD and stroke-related deaths. Improvements in population levels of blood pressure, cholesterol, and smoking as well as wider use of effective treatments have been shown to explain the recent declines in CHD deaths and can also be assumed to have contributed to those in stroke deaths.

Long-term Objective 5.4, Performance Measure 2

In 2006, 44 percent of adults age 18+ with high blood pressure had it controlled. Data for this measure have been collected since 1960-62. Since this became a performance measure for CDC, rates increased from the baseline of 32 percent in 2002 to 44 percent in 2006. Continuing emphasis on this measure should improve performance even further. Factors contributing to this trend include lifestyle modifications, improved diagnosis and treatment, and programmatic efforts.

The relationship between blood pressure and the risk of cardiovascular disease (CVD) events is consistent and independent of other factors. The higher the blood pressure, the greater the chance of heart attack, heart failure, stroke, and kidney disease. About 69 percent of people who have a first heart attack, 77

percent who have a first stroke, and 74 percent who have congestive heart failure also have high blood pressure. In FY 2010, CDC will fund forty-one states and the District of Columbia to conduct heart disease and stroke prevention programs. CDCs Heart Disease and Stroke Prevention Program has identified high-impact points of intervention to stem the tide of cardiovascular disease. Current priorities include the ABCs of CVD prevention and control: appropriate Aspirin therapy for eligible groups; Blood pressure control; and Cholesterol control, as well as improving the tracking (surveillance) of CVD in the U.S.

Almost 90 percent of middle-age Americans will develop high blood pressure in their lifetime, unless effective public health measures are applied on a large scale. Controlling high blood pressure is very important, as a 12 to 13 point drop in high blood pressure can reduce cardiovascular disease deaths by 25 percent. Control of high blood pressure appears to be improving, with 44 percent of all hypertensive American adults controlling their blood pressure in 2005-2006, up from 32 percent at the 2002 baseline. However, this indicates that the majority of persons with high blood pressure still did not have it under control by 2006.

Sodium (salt) content of the American diet far exceeds recommended limits and contributes very substantially to the national burden, disparities, and costs of high blood pressure. For this reason, Congress directed CDC to address this problem, working with food manufacturers and chain restaurants to reduce the sodium content of their products. CDC is partnering with related agencies and organizations to meet this goal and will report to Congress annually on progress made.

Long-term Objective 5.4, Performance Measure 3

Since the baseline for this measure, the proportion of adults with serum total cholesterol levels of 240 mg/dL or greater, was established at 17 percent (actually 17.3 percent) for the period 1999 to 2002, the rate for 2004 rose slightly to 17.6 percent, rounded to 18 percent and then dropped to 16 percent in 2005 to 2006. Factors contributing to this trend include lifestyle modifications, improved diagnosis and treatment, and programmatic efforts.

Approximately 38 million American adults have blood cholesterol levels of 240 mg/dL or higher, which is considered high risk. Lowering cholesterol can reduce the risk for developing heart disease, including heart attacks, and, among those with heart disease, the need for heart bypass surgery or angioplasty. Recent studies show that high levels of LDL (low-density lipoprotein) cholesterol and triglycerides increase the risk of stroke in people with previous coronary heart disease, ischemic stroke or transient ischemic attacks. Low levels of HDL (high-density lipoprotein) cholesterol may also raise stroke risk.

In FY 2011, CDC will fund 41 states and the District of Columbia to conduct heart disease and stroke prevention programs. CDC's Heart Disease and Stroke Prevention Program has identified high-impact points of intervention to stem the tide of cardiovascular disease. Current priorities include the ABCs of cardiovascular disease (CVD) prevention and control: appropriate low-dose Aspirin therapy for eligible groups; high Blood pressure prevention and control; and high Cholesterol prevention and control, as well as improving the tracking (surveillance) of CVD in the U.S.

While encouraged by the recent slight decline, the estimate for this measure is expected to increase with the emerging epidemic of obesity. Therefore, it will be challenging for CDC to maintain this rate.

NUTRITION AND PHYSICAL ACTIVITY

LONG TERM OBJECTIVE 5.5: REDUCE THE RATE OF GROWTH OF OBESITY THROUGH NUTRITION AND PHYSICAL ACTIVITY INTERVENTIONS.

Measure	FY	Target	Result
5.5.1: Reduce the age-adjusted percentage of adults age 18+ who engage in no leisure-time physical activity. *(Outcome)*	*Out-Year Target*	21.5% (2014)	Jun 30, 2016
	2004	Baseline	24.36%
5.5.2: Slow the estimated average age-adjusted annual rate of increase in obesity rates among adults age 18+. *(Outcome)*	*Out-Year Target*	+0.16 average increase per year (2014)	Jun 30, 2016
	2004	Baseline	+0.64 average increase per year

Unique Identifier	Data Source	Data Validation
5.5.1 - 5.5.2	Behavioral Risk Factor Surveillance System (BRFSS)	BRFSS is a state-based health survey system. Data are submitted to CDC on a monthly basis, where the data undergo rigorous data quality checks. CDC also verifies performance through quarterly state reports and periodic site visits.

Long-term Objective 5.5, Performance Measure 1

This is a long term measure for CDC. In FY 2004, the baseline year, CDC reported that 24.36 percent of adults age 18+ engage in no leisure-time physical activity. In the ten years prior to the baseline, there was an absolute decline from 29 to 24 percent. The rate of decrease is expected to lessen over the next ten years. In FY 2007, the rate declined only slightly, to 24.06 percent.

There are challenges in accomplishing this goal, such as the complexity of issues related to physical activity practices at the individual level without substantial environmental and policy supports. Furthermore, CDC's ability to influence the desired changes is in competition with factors from other sectors of society.

The national Nutrition, Physical Activity and Obesity Program (NPAO) supports state efforts to work with communities to develop, implement, and evaluate strategies that address behaviors related to the following six principal target areas:

- Increase physical activity

- Increase consumption of fruits and vegetables

- Decrease the consumption of sugar-sweetened beverages

- Reduce the consumption of high-energy-dense foods

- Increase breastfeeding initiation and duration

- Decrease television viewing

The program objectives will be accomplished by promoting and assisting states with the following strategies to address the target area of increased physical activity:

- Community-wide campaigns

- Point-of-decision prompts for stairwells

- Individually adapted health behavior change programs

- Enhanced physical education in schools

- Social support in community settings

- Create or enhance access to places for physical activity combined with information outreach activities

- Street-scale urban design and land-use policies and practices

- Community-scale urban design and land-use policies and practices

- Safe routes to school

The program will accomplish its impact objectives through increases in the number of strategies implemented and evaluated in funded states. Policy promotion and environmental changes are of strategic importance because of the power that these approaches have not only in changing individual health behaviors, but also in creating healthy environments and norms that can support these behaviors.

Major causes of morbidity and mortality in the U.S. are related to physical inactivity and poor diet. In particular, CVD, type two diabetes, hypertension, and certain cancers are linked to poor diet and a sedentary lifestyle.

Long-term Objective 5.5, Performance Measure 2

This is a long term measure for CDC. The average annual increase in the prevalence of obesity from 2001-2003 was 0.87 percent. From 2002 to 2004, the baseline period, the average annual increase was 0.64 percent. Though obesity rates have been increasing, the rate of increase has been slowing since the 2001-2003 timeframe. CDC plans to slow the rate of increase from 0.64 percent per year to 0.16 percent per year in the 2010 to 2014 timeframe.

There are challenges in accomplishing this goal, such as the complexity of issues related to food consumption patterns and physical activity practices at the individual level without substantial environmental and policy supports. Furthermore, CDC's ability to influence the desired changes are in competition with factors from other sectors of society.

CDC intends to reduce the rate of growth of obesity through nutrition and physical activity interventions. CDC's national Nutrition, Physical Activity and Obesity Program (NPAO) supports state efforts to work with communities to develop, implement, and evaluate strategies that address behaviors related to the following six principal target areas:

- Increase physical activity

- Increase consumption of fruits and vegetables

- Decrease the consumption of sugar-sweetened beverages

- Reduce the consumption of high-energy-dense foods

- Increase breastfeeding initiation and duration

- Decrease television viewing

The program objectives which support this OMB program assessment measure will be accomplished by assisting states and communities with implementing environmental and policy strategies to address the six target areas and partnering with other national funders of similar community efforts.

The program will accomplish its impact objectives through increases in the number of strategies implemented and evaluated in funded states. Policy promotion and environmental changes are of strategic importance because of the power that these approaches have not only in changing individual health behaviors, but also in creating healthy environments and norms that can support these behaviors.

About 60 million adults, or 30 percent of the adult population, are now obese. Obesity is related to two-thirds of diabetes cases and heart disease cases, 20 percent of cancers in women and 15 percent of cancers in men. Additionally, it causes or exacerbates many other serious chronic diseases and conditions, including hypertension and stroke.

SCHOOL HEALTH

LONG TERM OBJECTIVE 5.6: IMPROVE YOUTH AND ADOLESCENT HEALTH BY HELPING COMMUNITIES CREATE AND ENVIRONMENT THAT FOSTERS A CULTURE OF WELLNESS AND ENCOURAGES HEALTHY CHOICES.

Measure	FY	Target	Result
5.6.1: Achieve and maintain the percentage of high school students who are taught about HIV/AIDS prevention in school at 90% or greater. *(Outcome)*	2011	90%	Jun 30, 2012
	2009	90%	Jun 30, 2010
	2007	90%	89.5% (Target Met)
5.6.2: Increase the proportion of adolescents (grades 9-12) who abstain from sexual intercourse or use condoms if currently sexually active. *(Outcome)*	2011	89%	Jun 30, 2012
	2009	89%	Jun 30, 2010
	2007	89%	86.7% (Target Not Met)
5.6.3: Reduce the proportion of children aged 3 to 11 who are exposed to second-hand smoke. *(Outcome)*	2010	45%	Dec 31, 2011
	2008	45%	Dec 31, 2009
	2006	Baseline	50.8%
5.6.4: Percentage of youth (grades 9-12) who were active for at least 60 minutes per day for at least five of the preceding seven days. *(Outcome)*	2011	35.8%	Jun 30, 2012
	2009	35.8%	Jun 30, 2010
	2007	35.8%	34.7% (Target Not Met)

Unique Identifier	Data Source	Data Validation
5.6.1	Youth Risk Behavior Surveillance System (YBRSS)	Validity and reliability studies of YRBSS attest to the quality of the data. CDC conducts quality control checks and logical edit checks on each record.
5.6.2	Youth Risk Behavior Surveillance System (YBRSS)	Validity and reliability studies of YRBSS attest to the quality of the data. CDC conducts quality control checks and logical edit checks on each record.
5.6.3	National Health and Nutrition Examination Survey (NHANES)	Data are validated by NCHS.
5.6.4	Youth Risk Behavior Surveillance System (YBRSS)	Validity and reliability studies of YRBSS attest to the quality of the data. CDC conducts quality control checks and logical edit checks on each record.

Long-term Objective 5.6, Performance Measure 1

In FY 2007, 89.5 percent of high school students were taught about HIV/AIDS prevention in school. The performance target was set at an approximate target level of 90 percent, and deviation from that level was not statistically significant. Performance in FY 2007 was a great improvement over the previous

performance, which was 87.9 percent in both FY 2003 and FY 2005.Targets for future years remain at 90 percent due to the constantly changing population of high school students.

CDC strategies to improve performance for this measure focus on school health programs which play a unique and important role in the lives of young people by improving their health knowledge, attitudes and skills, health behaviors and outcomes, educational outcomes, and social outcomes. CDC emphasizes a coordinated, comprehensive, and collaborative approach to school health. It focuses on strengthening the health infrastructure of state and local education agencies and schools to address critical health issues including HIV/AIDS, STDs, and teen pregnancy prevention, and obesity prevention and asthma control by building the capacity of funded partners to support science-based, cost-effective health programming. In the long term, the program aims to increase the number of high school students who are taught HIV/AIDS prevention in at school by:

- Funding education agencies in 49 states and the District of Columbia, 1 tribal government, 16 large urban school districts, and 6 territorial education agencies to implement school-based HIV prevention activities;

- Funding more than 25 National Nongovernmental Organizations to assist national, state, and local efforts to prevent HIV infection and other priority health problems among large populations of youth in schools, youth in high-risk situations and postsecondary students. These NGOs work with CDC's adolescent and school health programs to develop model policies, guidelines, and training to assist schools and other youth serving agencies implement high quality programming;

- Monitoring priority health risk behaviors and school health programs and policies through systems such as the Youth Risk Behavior Surveillance System, the School Health Policies and Programs Study, and School Health Profiles; and

- Developing guidelines and tools for schools to address priority health risk behaviors, such as the School Health Index: A Self-Assessment and Planning Guide, to help schools implement these guidelines;

A cost effectiveness study revealed that for every dollar invested in school HIV, STD, and pregnancy prevention efforts, $1.33 in medical costs were saved.

Long-term Objective 5.6, Performance Measure 2

In FY 2007, 86.7 percent of adolescents in grades 9 to 12 abstained from sexual intercourse or used condoms if currently sexually active. This performance did not meet the target. Performance in the past has been fairly stable at 86 percent in FY 2001, and 87.5 percent in both FY 2003 and FY 2005.Because of the constantly changing population of high school students, and because of the limited reach of CDC activities outside the school infrastructure, meeting this target every period is challenging.

CDC strategies to improve performance for this measure focus on school health programs, which play a unique and important role in the lives of young people by improving their health knowledge, attitudes and skills, health behaviors and outcomes, educational outcomes, and social outcomes. CDC emphasizes a coordinated, comprehensive, and collaborative approach to school health. It focuses on strengthening the health infrastructure of state and local education agencies and schools to address critical health issues including HIV/AIDS, STDs, and teen pregnancy prevention, as well as obesity prevention and asthma control by building the capacity of funded partners to support science-based, cost-effective health programming. In the long term, the program aims to increase the proportion of adolescents in grades 9 to 12 who abstain from sexual intercourse or use condoms if sexually active by:

- Funding education agencies in 49 states and the District of Columbia, 1 tribal government, 16 large urban school districts, and 6 territorial education agencies to implement school-based HIV prevention activities;

- Funding more than 25 National Nongovernmental Organizations to assist national, state, and local efforts to prevent HIV infection and other priority health problems among large populations of youth in schools, youth in high-risk situations and postsecondary students. These NGOs work with CDC's adolescent and school health programs to develop model policies, guidelines, and training to assist schools and other youth serving agencies implement high quality programming;

- Monitoring priority health risk behaviors and school health programs and policies through systems such as the Youth Risk Behavior Surveillance System, the School Health Policies and Programs Study, and School Health Profiles; and

- Developing guidelines and tools for schools to address priority health risk behaviors, such as the School Health Index: A Self-Assessment and Planning Guide, to help schools implement these guidelines;

A cost effectiveness study revealed that for every dollar invested in school HIV, STD, and pregnancy prevention efforts, $2.65 in medical and social costs were saved.

Long-term Objective 5.6, Performance Measure 3

In 2006, 50.8 percent of children aged three to 11 years were exposed to secondhand smoke, compared to the baseline figure of 55 percent in 2002 after an increase in 2004.

Through the National Tobacco Control Program (NTCP), CDC provides national leadership for a comprehensive, broad-based approach to reducing tobacco use which involves: preventing young people from starting to smoke; eliminating exposure to secondhand smoke; promoting quitting; and, identifying and eliminating disparities in tobacco use among population groups. It also develops health communication campaigns aimed at informing the public about the health risks associated with ETS and reducing disparities in these exposures.

On September 18, 2007, CDC, working closely with the Office of the Surgeon General, launched two major collaborative national initiatives to protect children from exposure to secondhand smoke. During the event, Acting Surgeon General Kenneth Moritsugu released an excerpt summarizing key scientific evidence on the serious health risks that secondhand smoke poses to children.

The publication, *Children and Secondhand Smoke Exposure*, is excerpted from the 2006 Surgeon Generals Report, *The Health Consequences of Involuntary Exposure to Tobacco Smoke*. In addition, the Acting Surgeon General announced a new partnership with the American Academy of Pediatrics that will mobilize pediatricians and other primary care clinicians to help parents reduce their childrens exposure to secondhand smoke.

That same day, CDC staffed a meeting of the Interagency Committee on Smoking and Health, an advisory committee chaired by the Surgeon General and intended to foster greater collaboration among federal government agencies on tobacco control initiatives. The meeting identified several areas of future collaboration including the development and dissemination of targeted materials for pediatricians as well as outreach to other primary care organizations.

CDC is working closely with EPA and ACFs Office of Head Start to support the implementation of the Care for Their Air initiative.

Secondhand smoke, also known as environmental tobacco smoke (ETS), has been determined to be a known human carcinogen. Persistent exposure to secondhand smoke is associated with an increased risk for lung cancer. Since 1986, U.S. Surgeon Generals reports have concluded that exposure to secondhand smoke causes lung cancer in nonsmokers.

The 2006 Surgeon General's *Report on The Health Consequences of Involuntary Exposure to Tobacco Smoke* concluded that secondhand smoke exposure causes heart disease and lung cancer in nonsmoking

adults and a number of health conditions in children, including sudden infant death syndrome, acute respiratory infections, middle ear disease, more severe asthma, respiratory symptoms, and slowed lung growth. The Report also concluded that secondhand smoke contains more than 50 carcinogens, and that there is no risk-free level of secondhand smoke exposure.

CDC continues to extend and maximize the impact of the 2006 Surgeon Generals *Report on The Health Consequences of Involuntary Exposure to Tobacco Smoke* by collaborating with its partners to publish and present studies expanding the science base on secondhand smoke, to work with the news media to keep secondhand smoke in the news, to provide technical assistance to states as they implement and evaluate smoke-free laws, and to disseminate information on the report and ancillary materials to a wide range of partners and stakeholders.

Long-term Objective 5.6, Performance Measure 4

In FY 2007, 34.7 percent of youth (grades 9-12) were active for at least 60 minutes per day for at least five of the preceding seven days. The performance target was set at an approximate target level of 35.8 percent, and deviation from that level was not statistically significant. Prior to 2005, this data was not collected by the Youth Risk Behavior Surveillance System (YRBSS) for this measure. Because of this, the program had no history upon which to base its targets. The program will conduct further analysis of this measure to determine whether the targets are reasonable and achievable, and may reset targets based upon that analysis.

Many high schools do not offer daily physical activity opportunities. A substantial percentage of a student's (grades 9-12) recommended amount of physical activity could be provided through a comprehensive school-based activity program. Comprehensive school-based physical activity programs consist of physical education and other physical activity opportunities including physical activity breaks, intramurals, interscholastic sports, and bike to school initiatives. According to CDC's School Health Policies and Programs Study, many changes have occurred between 2000 and 2006 in state-and district-level policies and practices related to physical education and physical activity. While progress is being made, schools need to provide daily physical education and physical activity before, during and after school and to establish health-promoting environments that support physical activity.

CDC strategies to improve performance for this measure focus on school health programs, which play a unique and important role in the lives of young people by improving their health knowledge, attitude and skills, health behaviors and outcomes, educational outcomes, and social outcomes. CDC emphasizes a coordinated approach to school health, which focuses on strengthening the health infrastructure of state education agencies to address physical activity, nutrition, obesity, asthma, HIV/AIDS, STDs, and teen pregnancy prevention by building the capacity of funded partners to support science-based, cost-effective health programming. In the long term, the program aims to increase the percentage of youth (grades 9-12) who were active for at least 60 minutes per day for at least five of the preceding seven days, by:

- Funding education agencies in 22 states and 1 tribal government to establish a partnership with their state health agencies to focus on reducing chronic disease risk factors such as physical inactivity, poor nutrition, and tobacco use;

- Funding more than 25 National Non-Governmental Organizations (NGOs) to build the capacity of states, territories, tribal governments, and cities to implement effective school health programs;

- Monitoring priority health risk behaviors and school health programs and policies through the following systems: The Youth Risk Behavior Surveillance System (YRBSS) provides national, state, and local level data on the prevalence of six categories of priority health risk behaviors; School Health Profiles helps state and local education and health agencies monitor the current status of school health education and policies; and the School Health Policies and Programs Study

(SHPPS) is a national survey conducted every six years to assess school health policies and programs at the state, district, school, and classroom levels; and

- Applying research findings to develop guidelines for addressing priority health risk behaviors among students and developing tools such as the School Health Index: A Self-Assessment and Planning Guide; Fit, Healthy and Ready to Learn: A School Health Policy Guide: and the Physical Education Curriculum Analysis Tool to help schools implement these guidelines.

Regular physical activity in childhood and adolescence improves strength and endurance, helps build healthy bones and muscles, helps control weight, reduces anxiety and stress, increases self-esteem, and may improve blood pressure and cholesterol levels. Positive experiences with physical activity at a young age help lay the basis for being regularly active throughout life.

BIRTH DEFECTS, DEVELOPMENTAL DISABILITIES, DISABILITY AND HEALTH

Measure	FY	Target	Result
6.E.2: Increase the percentage of cost savings for CCHP as a result of the Public Health Integrated Business Services HPO. *(Outcome)*	*Out-Year Target*	39.0% (2011)	Dec 31, 2011
	2010	38.0%	Dec 31, 2010
	2009	36.8%	65% (Target Exceeded)
	2008	37.7%	39.3% (Target Exceeded)
	2007	37.6%	28.4% (Target Not Met but Improved)
	2006	Baseline	0% Savings

Unique Identifier	Data Source	Data Validation
6.E.2	CDCs Management Analysis and Services Office, COMPARE data system	CDCs Financial Management Office validates the data against FTE database information for the Management Analysis and Services Office.

Efficiency Measure 6.E.2:

CDC is undergoing an agency-wide process to achieve significant efficiencies through the Public Health Integrated Business Services High Performing Organization (PHIBS HPO). The PHIBS HPO was approved by OMB in March of 2007. The focus of the PHIBS HPO is to systematically improve and modernize 16 different business support services reaching optimal efficiencies in service quality and at the same time reducing staff resource costs that perform the services by 2011. The HPO affects 2,000 FTEs agency-wide, almost 22 percent of CDCs workforce.

The HPO effort is focused moving personnel from 16 different business services and creating or rewriting standard operating procedures. Processing personnel actions challenges the Human Resources system, which is already fully engaged in its routine efforts of hiring, etc. Thus far, CCHP has rewritten or created 77 Standard Operating Procedures (SOPs) for its Business Services Unit (BSU), which have been shared with the greater PHIBS HPO group for use in subsequent phases.

HPO accomplishments to date are:

- Reduced Manpower- the HPO has significantly reduced the amount of labor required to perform our mission support functions.

- Increased workforce skills - through continual learning we have a multi-skilled workforce which has improved organizational flexibility and depth.

- Increased customer service - customer service is the focus of the HPO; the customer satisfaction survey results have improved drastically since the inception of the HPO concept.

- Reduced cycle times and costs - Standard Operating Procedures have been developed for all functions. This has resulted in reduced cycle time and costs.

In FY 2008, the target of 37.7 percent was exceeded with an actual cost savings of 39.3 percent due to strategic staff reductions and additional efficiencies realized from the implementation of Standard Operating Procedures. Because 2007 was the first year of the HPO, it was spent on achieving reorganization efforts which entailed modification of new administrative codes to personnel and task orders for contractors. Not all reorganization efforts could be achieved in the first year due to the large volume of personnel changes required, therefore the savings did not meet the target set for FY 2007.

In FY 2009, the target of 36.8 percent was exceeded with an actual cost savings of 65 percent due to strategic staff reductions and additional efficiencies realized from the implementation of Standard Operating Procedures. During FY 2009, CCHP also restructured some administrative positions so that the levels of accountability are clearly defined. The most critical business processes were streamlined and the implementation of an automated reporting tool led to greater efficiencies as well. The FY 2009 to FY 2011 targets the inclusion of two business services that were not included in Phase I of the PHIBS HPO Secretarial Support Services and Business Information Services.

LONG TERM OBJECTIVE 6.1: PREVENT BIRTH DEFECTS AND DEVELOPMENTAL DISABILITIES.

Measure	FY	Target	Result
6.1.2: Identify and evaluate the role of at least five new factors for birth defects and developmental disabilities. *(Output)*	*2011*	Complete data collection for developmental disabilities research sample	Dec 31, 2011
	2010	Establish large statistically powerful sample for developmental disabilities research	Dec 31, 2010
	2009	Publish findings on occupational exposures	No (Target Not Met)
	2008	Publish findings on maternal medications	Yes (Target Met)
	2007	Publish findings on alcohol, caffeine use, and nutrition	Yes (Target Met)
	2006	Finalize research agenda for birth defects and publish findings on smoking, obesity, and other exposures with high potential impact	Yes (Target Met)
6.1.3: Reduce health disparities in the occurrence of folic acid-preventable spina bifida and anencephaly by reducing the birth prevalence of these conditions among Hispanics. *(Outcome)*	*2011*	4.5	Feb 23, 2015
	2010	4.6	Feb 23, 2014
	2009	4.7	Feb 23, 2013
	2008	4.8	Feb 23, 2012
	2007	4.9	5.7/10,000 (Target Not Met)
	2006	5.0	5.5/10,000 (Target Not Met but Improved)
6.1.4: Increase the percentage of health providers who screen women of childbearing age for risk of an alcohol-exposed pregnancy and provide appropriate, evidence-based interventions for those at risk. *(Outcome)*	*2011*	Increase provider-based screening and intervention by 2.5% from baseline.	Dec 31, 2011
	2010	Increase provider-based screening and intervention by 2% from baseline	Dec 31, 2010
	2009	Increase provider-based screening and intervention by 1% from baseline.	Yes (Target Met)
	2008	Implement ongoing provider education programs and establish baseline rates of provider-based screening and intervention.	Yes (Target Met)
	2007	Assess the screening and intervention practices of nationally representative samples of provider groups.	Yes (Target Met)

Measure	FY	Target	Result
	2006	Develop and disseminate screening and intervention tools for health care providers serving women of childbearing age.	Yes (Target Met)
6.1.5: Improve the quality and usability of birth defects surveillance data. (*Outcome*)	*Out-Year Target*	(2015) Publish results from 3 collaborative projects related to birth defects surveillance, research, and public health interventions.	12/2015
	2011	a) Disseminate guidelines for incorporating surveillance of stillbirth into birth defects monitoring systems. b) Evaluate the feasibility of conducting population-based surveillance for fetal alcohol syndrome	12/2011
	2010	a) Estimate the prevalence of spina bifida by race and sex among children and adolescents in 10 regions of the U.S. b) Publish results of collaborative research projects on clubfoot and pyloric stenosis.	12/2010
	2009	Use a new data linkage software tool developed at CDC to evaluate the association of childhood cancer and birth defects.	Mar 31, 2010
	2008	a) Complete a collaborative multi-state study on the association of birth defects with preterm delivery. c) Evaluate the association of maternal diabetes and birth defects using a multi-site case control study based on surveillance data.	Yes (Target Met)
	2007	Estimate the prevalence of Down syndrome by race and sex among children and adolescents in metropolitan Atlanta.	Yes (Target Met)

Unique Identifier	Data Source	Data Validation
6.1.2	Data is collected from the National Birth Defects Prevention Study, a collaboration between the eight funded Centers for Birth Defects Research and Prevention and a ninth site in Georgia at CDC. Developmental disabilities data are collected by the Centers for Autism and Developmental Disabilities Research and Epidemiology (CADDRE), a collaboration between the five funded CADDRE sites and a sixth site in Georgia at CDC.	Birth defects publications are made possible by analyses of NBDPS pooled data sets. Each site participating in NBDPS has implemented the uniform study protocol, and data is collected at a coordinating center. Each site participating in CADDRE is implementing the uniform study protocol, and data are also collected at a coordinating center.
6.1.3	Data are taken from the National Birth Defects Prevention Network (NBDPN), a collaborative effort of state-based birth defects surveillance programs around the United States. These	Data from NBDPN are used to estimate rates of spina bifida and anencephaly among Hispanics.

Unique Identifier	Data Source	Data Validation
	programs, which all meet certain data quality standards, contribute to a pooled data set, which represents the most comprehensive population-based estimate of birth defects in the country.	
6.1.4	Findings for the 20032005 measures are from Project CHOICES, a CDC-funded randomized controlled trial of provider-based interventions for women of childbearing age who are at risk for having an alcohol-exposed pregnancy, and also from the recommendations of the U.S. Preventive Services Task Force on the effectiveness of alcohol screening and behavioral counseling interventions in primary care. Data and benchmarks for 20062008 are from work with ACOG in the development of clinician tools for screening and brief intervention and through an ACOG-conducted survey of obstetrician-gynecologists. Data for 2008 and beyond are from DocStyles.	Results of the randomized controlled trial from Project CHOICES were published in the American Journal of Preventive Medicine in 2007. The recommendations of the U.S. Preventive Services Task Force on the effectiveness of alcohol screening and behavioral counseling interventions in primary care settings were published in the Annuals of Internal Medicine in 2004. Results from the ACOG survey of obstetricians-gynecologists is in press with the Journal of Addiction Medicine. DocStyles is a Web-based survey with a main sample of primary care physicians and additional samples of other specialties. The physician samples are drawn from Epocrates Honors Panel, an opt-in, verified panel of over 156,000 medical practitioners. The sample is drawn to match the American Medical Association master file proportions for age, gender, and region.
6.1.5	The data for the birth defects measure come from the Metropolitan Atlanta Congenital Defects Program (MACDP), and the data for the developmental disabilities measure come from the Metropolitan Atlanta Developmental Disabilities Surveillance Program (MADDSP).	Data from the Metropolitan Atlanta Congenital Birth Defects Program (MACDP) and the Metropolitan Atlanta Developmental Disabilities Surveillance Program (MADDSP) are updated annually.

Long-term Objective 6.1, Performance Measure 2

Increasing understanding of modifiable risk and preventive factors for birth defects and developmental disabilities can provide important opportunities for prevention. This understanding is supported by the research infrastructure for birth defects, autism, and other developmental disabilities. As these systems develop, annual performance measures focus on publication of research findings to expand the knowledge base and disseminate key findings.

To date, CDC's birth defects study has collected data on nearly 35,000 individuals in order to examine the association between selected risk factors and birth defects. While the project met its objectives for FY 2008, the first paper examining occupational exposures is still pending. Although the occupational exposure assessment has taken longer than anticipated, several ongoing analyses are expected to be published in 2010.

Notable recent study publications include:

- Antibiotics and birth defects. This study found that use of the most common antibacterials such as penicillins, erythromycin, and cephalosporins does not appear to be associated with birth defects. Some risks were observed for nitrofurantoins and sulfonamides. This information can help women and their health care providers make informed treatment decisions.

- Body mass index and congenital heart defects. This study confirmed previous findings of a risk of heart defects among overweight and obese mothers. It also identified previously unknown associations between body mass index and other specific birth defects.

- Assisted reproduction and birth defects. Use of IVF has increased over time, and this study compared the risk of birth defects in pregnancies conceived with and without IVF. Among singleton births, IVF was associated with increased risks for septal heart defects, cleft lip with or without cleft palate, and intestinal atresias.

- Antihypertensives and congenital heart defects. This study found that use of antihypertensives in the first trimester was associated with some congenital heart defects. It is not clear whether it is the treatment or the underlying hypertension that could be responsible for these associations.

Long-term Objective 6.1, Performance Measure 3

Neural tube defects (NTDs), which include spina bifida and anencephaly, have profound effects on children, their families, and their communities. Since folic acid food fortification began in 1998, thousands of cases of these serious birth defects have been prevented. However, analyses show that while fortification significantly lowered NTD rates among all racial and ethnic groups, Hispanics continue to have the highest rates overall.

For FY 2001-2005, targets were set for an 18 percent reduction in the occurrence of NTDs, Targets for the subsequent five years (FY 2006-2010) were set for an additional nine percent reduction from FY 2005. A leveling off was expected in the rate of folic acid preventable NTDs because fortification was already widely implemented. At this time, targeted efforts are needed to reach the last few groups of women primarily Hispanics-- who could reduce their risk of preventable NTDs by consuming folic acid, either via fortification or by supplementation.

Data for FY 2005, which is to be reported by FY 2009, show that the rate of NTDs among the Hispanic population remained similar to that seen in FY 2003. These rates deviate significantly from the target rates, and indicate that there has not been a material change in the rate of NTDs since the establishment of a baseline using FY 2000 data. The reason for this lack of significant reduction is unknown, particularly after many of the NTD prevention messages have been disseminated. However, research is planned to examine the uptake of the folic acid messages and any resulting behavior change among Hispanic women of childbearing age.

CDC's folic acid program recently completed formative research with Hispanic women of childbearing age in order to develop new folic acid educational materials and radio public service announcement messages that address the unique needs of this audience. These materials and messages are available to our partners and to the public free of charge on the NCBDDD website. Furthermore, CDC currently has projects underway in two counties in North Carolina in partnership with the North Carolina March of Dimes and the North Carolina Folic Acid Council. These projects involves utilizing promotoras, or lay health outreach workers, to conduct grassroots education related to folic acid consumption for Spanish-speaking women in these areas. CDC is currently working to expand these efforts in four more states. There is also a promotora project, currently in its third and final year, being conducted through a partnership with Migrant Health Promotion. This project aims to increase folic acid awareness, knowledge, and consumption among Spanish-speaking women living in migrant health communities in three Texas border counties.

Long-term Objective 6.1, Performance Measure 4

Despite public health advisories and subsequent outreach efforts, recent data indicate that significant number of women continue to drink during pregnancy. Implementing interventions to reduce alcohol consumption during pregnancy is an important strategy to reducing the occurrence of alcohol-related birth

defects and developmental disabilities, including fetal alcohol syndrome (FAS) and other fetal alcohol spectrum disorder (FASDs). Research shows that provider-based screenings and interventions for women of childbearing age at risk of having an alcohol-exposed pregnancy are effective at reducing risk.

These findings have prompted CDC to place an emphasis on developing health care provider-based interventions. CDC supports a variety of provider education initiatives geared toward the prevention, identification, and treatment of FASDs. This has included working with the American Congress of Obstetricians and Gynecologists (ACOG) to develop a quick-reference clinician tool to facilitate screening and intervening, and supporting five FASD Regional Training Centers, which train medical and allied health students and professionals in the prevention, identification, and treatment of FASDs. Through these efforts, and in collaboration with other agencies and organizations, CDC aimed to show improvement in the percentage of health care providers who screen women of childbearing age for risk of alcohol-exposed pregnancy, and provide appropriate interventions for those at risk. To date, the performance targets for this measure have been met.

Initially, CDC considered obtaining baseline rates of alcohol screening from a nationally representative sample of obstetrician-gynecologists. However, due to an inability to conduct this survey on an annual basis, CDC sought out other data sources that could be used to estimate physician participation in screening and intervening with women of child-bearing age. The health marketing survey *DocStyles* contained CDC-supported items that queried physicians regarding alcohol screening and brief intervention practices with women of childbearing age (pregnant, not pregnant, and not trying but at risk of pregnancy) for the 2006, 2008, and 2009 survey years. This information will also be collected in future versions of *DocStyles* and can provide a consistent, ongoing source for monitoring progress made on this performance measure.

Comparisons between 2008 (baseline) and 2009 *DocStyles* data indicated the proportion of physicians (N=1,250) who reported they always screen women of childbearing age who are or may become pregnant increased for all provider types; all rate increases were more than 1%. The percentage of providers who reported always screening pregnant women, women trying to get pregnant, and women not trying but at risk of pregnancy increased from 50.8 to 55.9, 37.4 to 40.7, and 19.7 to 23.0, respectively. These changes were found to be statistically significant.

Comparisons were also made between 2008 (baseline) and 2009 data to assess alcohol brief intervention rates. The proportion of physicians (N=1,250) who reported they always conduct brief interventions among women of childbearing age who are or may become pregnant increased for all provider types; all rate increases were more than 1%. The percentage of providers who reported always conducting brief interventions among pregnant women, women trying to get pregnant, and women not trying but at risk of pregnancy increased from 34.6 to 43.0, 22.2 to 28.9, and 11.6 to 17.8, respectively. These changes were found to be statistically significant.

Results from analyses of *DocStyles* data show that there are clear trends of increases in screening and brief intervention practices for all physician specialties represented in the survey sample and for all of the groups of women of childbearing age (pregnant, not pregnant, not trying but at risk of pregnancy). Among other efforts, CDC's commitment to educating providers and improving their skills in the prevention, identification, and treatment of FASDs has contributed to the increase in rates of screening for alcohol use and providing appropriate interventions for women at risk of an alcohol-exposed pregnancy.

Long-term Objective 6.1, Performance Measure 5

This measure was recently approved to replace former measure 6.1.1. Surveillance data provide information necessary for public health decision-making. Birth defects surveillance data are essential for a) determining the population prevalence of, and morbidity and mortality associated with, birth defects; b) understanding the socio-demographic factors that influence prevalence, morbidity, and mortality to better

address disparities across racial, ethnic, and socioeconomic groups; c) developing data-driven prevention programs and health services for children with birth defects; d) evaluating the effectiveness of intervention and prevention efforts; e) examining trends in occurrence of birth defects and morbidity and mortality over time; and f) supporting and stimulating research. By employing new data analysis methods and utilizing data linkages to enhance the basic birth defects surveillance dataset, the quality and usability of birth defects surveillance data will increase.

The priority areas for improving surveillance data in this performance measure are based on the National Center on Birth Defects and Developmental Disabilities' strategic plan. Since 1968, CDC has administered the Metropolitan Atlanta Congenital Defects Program (MACDP), a birth defects surveillance program in the five central counties of Atlanta, GA, that has served as a model for state and international birth defects surveillance programs and a training ground for public health professionals. In addition to serving as a reference by providing comprehensive prevalence data for a wide range of birth defects, MACDP focuses on the development of new surveillance methods and innovative analytic uses of surveillance data, and in providing assistance to state birth defects surveillance programs in the implementations of such methods. CDC currently funds 15 state-based birth defects surveillance programs across the U.S. as well as supports the National Birth Defects Prevention Network, which strives to improve the quality of birth defects tracking data by sharing information and developing uniform methods of data collection. The Network also promotes collaborative research projects and the pooling of data in order to better understand patterns of birth defects prevalence on a national level.

LONG TERM OBJECTIVE 6.2: IMPROVE THE HEALTH AND QUALITY OF LIFE OF AMERICANS WITH DISABILITIES.

Measure	FY	Target	Result
6.2.1: Increase the number of people with blood disorders who participate in the monitoring system by 10%. *(Outcome)*	*2011*	26,119	Dec 31, 2011
	2010	25,607	Dec 31, 2010
	2009	22,195	25,104 (Target Exceeded)
	2008	18,948	23,347 (Target Exceeded)
	2007	18,590	21,760 (Target Exceeded)
	2006	18,232	19,889 (Target Exceeded)
6.2.2: Identify an effective public health intervention to ameliorate the effects of poverty on the health and well-being of children. *(Outcome)*	*2011*	Data collection and analysis for age 5 year	Dec 31, 2011
	2010	Data collection and analysis for age 5 year	Dec 31, 2010
	2009	Data collection and analysis for age 4 year	Yes (Target Met)
	2008	Data collection and analysis for age 3 year	Yes (Target Met)
	2007	Data collection and analysis for age 2 year	Yes (Target Met)
	2006	Data collection and analysis for age 1 year	Yes (Target Met)
6.2.3: Ensure that 95% of all infants are screened for hearing loss by 1 month of age. *(Outcome)*	*2011*	95%	Jan 31, 2014
	2010	95%	Jan 31, 2013
	2009	94%	Jan 31, 2012
	2008	93%	Jan 31, 2011
	2007	92%	Jan 31, 2010

Measure	FY	Target	Result
	2006	91%	92% (Target Exceeded)
6.2.4: Increase the mean lifespan of patients with Duchenne and Becker Muscular Dystrophy (DBMD) by 10% as measured by the Muscular Dystrophy Surveillance, Tracking and Research Network. *(Outcome)*	*2011*	Increase the percentage of patients with DBMD who have access to treatments based on national standards of care to 80% as measured by MD STARnet and national or nationally representative data collection methods	Feb 23, 2012
	2010	Increase the percentage of patients with DBMD who have access to treatments based on national standards of care to 80% as measured by MD STARnet and national or nationally representative data collection methods	Feb 23, 2011
	2009	Identify and report on (1) the trends on incidence and prevalence of secondary complications related to DBMD annually based on MDSTARnet data and (2) the trends of service utilization by people with DBMD and their families based on MD STARnet data.	Feb 23, 2010
	2008	Report on the impact of clinic use on morbidity and mortality in DBMD using MD STARnet data	Yes (Target Met)
	2007	Identify and report on (1) the incidence and prevalence of DBMD in the United States based on MD STARnet data (2) early signs and symptoms of DBMD based on MD STARnet and (3) cost of health care of people with DBMD.	Yes (Target Met)
	2006	Conduct data analysis on MD STARnet data collected in the 4 current sites and include one additional state.	Yes (Target Met)
6.2.5: Reduce the number of infants not passing the hearing screening that are lost to follow up.	*Out-Year Target*	25% (2014)	12/2016
	2011	33%	12/2013
	2010	37%	12/2012
	2009	40%	12/2011
	2008	43%	12/2010
	2007	N/A	44.8%
	2006	N/A	46.3%
	2005	Baseline	59.9%

Unique Identifier	Data Source	Data Validation
6.2.1	Data are from the CDC Universal Data Collection System, which collects data from yearly patient visits conducted through the 135 CDC funded Hemophilia Treatment Centers (HTCs).	HTCs can choose to submit their data either electronically or via paper data collection form. For those grantees that participate in electronic form submission, the data are abstracted from a patient's medical record, updated in real time. For all others CDC verifies the data quarterly by comparing the data inputted with the original data collection forms.
6.2.2	Data are from the CDC's Legacy for Children(TM) study, a longitudinal, randomized multi-site, controlled study which collects data from birth to age 5 from children and families who are enrolled in the study.	Results of the study will be published in peer-reviewed journals.
6.2.3, 6.2.5	Data for 2004 and prior years are from the Directors of Speech and Hearing Programs for State Health and Welfare Agencies (DSHPSHWA).Data for 2005 and beyond are from CDCs Hearing Screening and Follow-up Survey (HSFS).	The program collaborated with partners to develop a new web-based survey to gather aggregate level data for2005 and beyond. This voluntary response survey, referred to as the CDC's HSFS, is designed to gather standardized data about the screening, diagnostic and intervention status of every birth reported on the survey. To date this survey has been used to gather data for years 2005 and 2006 and is now the primary national source for Early Hearing Detection Intervention -related data.
6.2.4	Data are from MD STARnet.2001-2004datafromtheMartketScan Commercial Claims and Encounters Database.	There are several quality control checks in the data collection and analysis process such as ongoing training and testing of abstractors to maintain quality of data entered, and independent data analysis by a second site when analyzing data to be used for publication. Other methods include: 1. Abstracted data reviewed in a step-wise manner by a local reviewer, local clinical reviewer, clinical review committee, and assigned case status. 2. Abstraction instrument that has built-in checks. 3. Interviewer training and quality control activities.

Long-term Objective 6.2, Performance Measure 1

CDC monitors blood safety concerns related to bleeding disorders by collecting data from and testing blood samples of individuals seen at a network of 135 Hemophilia Treatment Centers (HTCs) across the country. Patients are monitored for presence of any blood-borne infections, as well as any complications due to their underlying blood disorder, such as joint disease or the development of antibodies against blood transfusions.

The Universal Data Collection System (UDC) collects data from yearly patient visits conducted through the HTCs. UDC provides information on joint mobility and function, bleeding occurrences, treatments, and vaccinations.

Increasing the number of patients enrolled is important to ensure that the majority of patients with bleeding disorders are monitored so that complications and other risk factors may be assessed on a population level. Over the past few years, patient enrollment has consistently exceeded expectations. Since the baseline was established in FY 2005, over 5,000 new patients have enrolled in the blood disorder monitoring system. This exceptional enrollment may be for a number of possible reasons, including:

- A lower than anticipated refusal rate (about 9 percent) compared to other national studies of this type and size;

- Increased marketing through consumer groups to promote the HTCs;

- Recognition by patients recognize that the coordinated care approach has demonstrated decreased mortality and hospitalizations among patients visiting HTCs; and

- The broad extent of the HTC network, which reaches both urban and rural areas, allows catchment of patients in all areas of the country.

Despite its success, there is still potential for loss during follow-up, which would decrease the overall number of enrollees in the system. Data are collected based on yearly visits to HTCs, and patients may either elect not to visit each year or be lost due to geographic relocation. Although increased marketing may be a reason for high UDC enrollment, rare blood disorders, such as hemophilia, affect a relatively small portion of the population. We anticipate enrollment to level-off, making it more difficult to capture a significant number of additional new patients. Current targets represent an increase enrollment of two percent per year over the actual enrollment for FY 2007.

Long-term Objective 6.2, Performance Measure 2

Development plays a critical role in the biological and behavioral processes that impact health and well-being throughout the lifespan, but has increased importance for immediate and long-term health outcomes during infancy, early childhood, and adolescence. Children who grow up in environments where developmental needs are not met are at an increased risk for compromised health, safety, and learning. Measuring children's outcomes at critical developmental time points will assist CDC in developing an innovative public health intervention to promote protective factors and ameliorate risk factors that affect developmental outcomes.

The target program goals were based on rigorous research, designed to measure the impact of the intervention on children's outcomes. The Legacy for Children(TM) program has successfully met its milestones to date, including study initiation, establishment of a baseline, data collection and analysis for children from birth to 5 years of age, as well as initiation of a follow-up study. Methodological papers on the Legacy intervention are planned for 2010, while analysis of program effects continues. Additionally, a publication of preliminary findings (at 2 years) was submitted and is currently under revision.

Long-term Objective 6.2, Performance Measure 3

CDC's activities to support early hearing detection are important for ensuring timely diagnosis and referral to follow-up early intervention services for all infants with hearing loss. CDC supports state-based efforts to promote and ensure that all children receive a hearing screening before one month of age. This is important to ensure that children with a hearing loss develop appropriate communication skills that are commensurate with their cognitive abilities, allowing them to succeed both academically and socially.

CDC has surpassed the established targets for the past three reported years (FY 2004, FY 2005, and FY 2006). FY2007 data will be available shortly, and it is fully anticipated that this trend will continue. The performance target for this measure was set at an approximate target level, and the deviation from that level is slight. There was no effect on overall program or activity performance. Given the national focus on children's health and the existence of newborn hearing screening programs in all 50 states, continued success with this measure is an achievable goal. However, this continues to be an ambitious endeavor, because it may be difficult to identify and screen, within a month of birth, those children born outside of a traditional hospital. More specific, targeted, and often more time-consuming efforts are needed to ensure all infants are screened. CDC efforts are directed at working with states to ensure consistency and quality of reporting is maintained at these high levels while, at the same time, more attention is dedicated to loss to documented follow-up.

Long-term Objective 6.2, Performance Measure 4

Treatment for Duchenne and Becker muscular dystrophies (DBMD) is complex and varied. In order to acquire more information on treatment and intervention for these conditions, CDC is engaged in the development of a population-based monitoring system designed to ascertain key health information for people with muscular dystrophy (MD). Through this system, MD STARnet, CDC is obtaining population-based data on the medical care and outcomes of persons with DBMD. These data will provide evidence-based information to better understand the natural history of the disorder and current treatment practices. Additionally, CDC is sponsoring the development of care considerations for Duchenne muscular dystrophy (DMD). Upon dissemination of the data from MD STARnet, and from the care considerations, health care providers will have information to make more informed decisions about the medical care for boys with DBMD. With over 4 million births in the United States each year, about 400 to 600 boys with DBMD are born every year. Girls rarely have DBMD.

The performance of this system has met all milestones to date. The system was initially established in four states, and preliminary data analysis was completed in FY 2005. An additional data collection site - Georgia- was added in FY 2006. In FY 2007 incidence and prevalence data were analyzed for four originial states, with available data incorporated from the fifth state (Georgia). Presentation on early signs and symptoms of DBMD was given at the American Academy of Neurology meeting. Cost analysis of health care for people with muscular dystrophy was completed. Analysis of 2001-2004 data from the MarketScan Commercial Claims and Encounters Database showed that individuals with muscular dystrophy had average medical expenditures 10 to 20 times greater than those without muscular dystrophy.

In FY 2008, a cost analysis manuscript was published for people who have muscular dystrophy. Reports on the impact of clinical use on morbidity and mortality in DBMD (regarding corticosteroid use and cardiovascular issues) was presented at national and international meetings, including the American Academy of Neurology and the annual meeting of the Association for European Paediatric Cardiology. Data analysis was completed for the frequency and type of diagnostic testing, and for changes in testing methods over time. The DMD mutations were identified in the first population-based cohort.

In FY 2009, overall prevalence numbers for the four original states were provided in a congressional report, and Hawaii was added as an additional surveillance state for a total of six sites, increasing the racial/ethnic diversity of the study population. Manuscripts were published regarding genetic testing and diagnostic delay, and a needs assessment survey was completed. Both papers analyzed trends in diagnosis and clinical care for the population.

In FY 2010, state-specific prevalence data were published in the Morbidity and Mortality Weekly Report (MMWR) and the Duchenne muscular dystrophy Care Considerations were published in The Lancet Neurology. Manuscripts are in preparation regarding trends in service utilization.

Emerging trends indicate that, for a cohort of boys born from 1982 through 2000, the average age of definitive diagnosis of Duchenne Muscular Dystrophy was 4.9 years. This cohort had a trend toward a younger age at definite diagnosis, but the trend was not statistically significant. Moreover, for a cohort of 470 boys whose symptoms were consistent with a clinical diagnosis of Duchenne or Becker Muscular Dystrophy and were ascertained from 1982 through 2004, 18 percent were not tested for genetic mutations. During these years, the percentage of boys in the cohort whose diagnosis was established by testing for genetic abnormalities increased to over 80 percent, enabling more boys to have a definitive diagnosis.

Long-term Objective 6.2, Performance Measure 5

This newly approved measure complements measure 6.2.3, "Ensure that 95 percent of all infants are screened for hearing loss by 1 month of age." CDC actively works to ensure timely diagnosis and referral to intervention services for all infants with hearing loss. CDC's support of state and territorial-based early hearing detection and intervention (EHDI) programs is important for ensuring and documenting that infants not passing the hearing screening receive timely follow-up diagnostic tests. These tests are needed to confirm if an infant has a hearing loss. Early diagnosis is important to ensure that infants with a hearing loss develop appropriate communication skills that are commensurate with their cognitive abilities, allowing them to do well both academically and socially.

Due in part to CDC's efforts, early hearing screening rates have increased from 46 percent in 1999 to 94 percent in 2007. However, screening newborns for hearing loss is only the first critical step. Making sure that infants who do not pass the screening receive early diagnostic tests, and if recommended appropriate early intervention are the next vital steps. Efforts are currently underway at the national, state, and local levels to reduce loss to follow-up (LFU). To respond to this challenge CDC is actively supporting the development of tracking and standardized procedures for data management. These systems and procedures can help ensure all infants are screened for hearing loss and receive recommended follow-up diagnostic and intervention services.

The two key strategies that have been identified by multiple state teams to reduce the number of infants lost to follow up are related to enhancing reporting systems and improving communication with primary care providers and families. In order to meet its EHDI target goals and evaluate the effectiveness of these two strategies, CDC needs to continue to support and provide technical assistance to state and territorial EHDI programs. This support includes activities to 1) promote the coordinated use of accepted and useful newborn hearing screening standards 2) enhance tracking and surveillance systems to accurately identify, match, and collect unduplicated individual identifiable data, 3) improve the capacity of state and territorial programs to accurately report the status of every current birth throughout the EHDI process, and 4) develop and enhance the integration of the EHDI system with other State/territorial child health information systems.

HEALTH INFORMATION AND SERVICE

HEALTH STATISTICS

Measure	FY	Target	Result
7.E.1: The number of months for release of data as measured by the time from end of data collection to data release on internet. *(Outcome)*	*2011*	9.5	Jan 31, 2014
	2010	9.6	Jan 31, 2013
	2009	9.7	Jan 31, 2012
	2008	9.8	Jan 31, 2011
	2007	9.9	May 31, 2010
	2006	10.0	9.6 (Target Exceeded)

Unique Identifier	Data Source	Data Validation
7.E.1	National Health and Nutrition Examination Survey (NHANES), National Vital Statistics System (NVSS), National Health Interview Survey (NHIS) and the National Health Care Survey (NHCS)	Review internal information on end of data collection and release of data for NHANES, NVSS, NHIS and NHCS.

Efficiency Measure 7.E.1:

This efficiency measure was developed in 2005 and is also serving as a long term outcome measure. Through this measure, CDC tracks improvement in the timeliness of data provided to the nations health decision makers. In 2003, data was released in 14.5 months and serves as the baseline. The measure will address Health Statistics data in the aggregate; the unit of measurement is months.

CDC has reduced the number of months from the end of data collection to data release on the internet from 14.5 months (baseline) in 2003 to 9.6 months in 2006. CDC took several steps to improve timeliness. The general strategy to reduce the processing time for the two national household surveys, National Health and Nutrition Examination Survey (NHANES) and the National Health Interview Survey (NHIS), was to move as much processing into the front end, and to do as much processing as possible in real time. These changes have resulted in NHANES reducing the number of months from end of data collection to publication on the internet from 16 months in 2003, to 9 months in 2007. The NHIS was reduced from 12 months in 2003 to 6 months in 2007

This involved:

- Development of electronic data collection programs that include extensive built-in editing to correct data at the time of collection;

- Data transmission that occurs soon after data collection;

- Real-time processing systems reconfigured and redesigned to speed up data preparation; and

- Electronic collection and rapid transmission to allow for editing to be done in real time and error correction done as close to the data collection ad possible.

Once the data are collected, the following back end factors were developed:

- Data processing systems were reconfigured and redesigned to prepare data for release; and

- Inputs to process final weighting were developed prior to the end of data collection.

The methodology for calculating the data were changed in 2006 to appropriately consider the process by which vital records were received from the 57 registration areas. The original method involved

calculating the end of data collection as the January following the year that the event occurred. However, all records for the calendar year are not received by this timeframe. The revised method is now based on the interval between the date that all records have been received from all 57 registration areas, and the date of publication on the web.

The reporting date for 2007 will be delayed until May 2010 due to the timing of receipt of all vital statistics records. The system re-engineering of the National Vital Statistics System will be completed this year to more efficiently process the natality and mortality records in 2010. In addition the following measures have been taken to address timeliness with all jurisdictions:

- National Association for Public Health Statistics and Information Systems and CDC have instituted a joint taskforce to develop specific strategies to improve the timeliness and quality of the records. These strategies include the targeting of poorly performing states and requiring them to submit a Plan of Correction. Site visits will be made to assist states and letters to state health officers from key figures in CDC will be send to encourage performance improvement.

Another joint project focuses on efforts to actively encourage states that have not yet adopted the 2003 revised certificates.

LONG TERM OBJECTIVE 7.1: MONITOR TRENDS IN THE NATION'S HEALTH THROUGH HIGH-QUALITY DATA SYSTEMS AND DELIVER TIMELY DATA TO THE NATION'S HEALTH DECISION-MAKERS.

Measure	FY	Target	Result
7.1.1a: Percentage of key data users and policy makers, including reimbursable collaborators, that are satisfied with data quality and relevance. web survey *(Outcome)*	2011	Increase from 72.2% to 77.2%	Dec 31, 2011
	2010	Increase Satisfied from 67.2% to 72.2% (Agree or Strongly Agree)	Mar 31, 2010
	2009	conduct survey/report results 2010	Survey was delayed (November) due to CDC conducting their own web-based customer satisfaction survey. The results will be reported in May, 2010.
	2008	Baseline	67.2% Satisfied (Agree or Strongly Agree)
7.1.1b: Percentage of key data users and policy makers, including reimbursable collaborators, that are satisfied with data quality and relevance. federal power users *(Outcome)*	2011	Maintain 100% Good or Excellent	Dec 31, 2011
	2010	Maintain 100% Good or Excellent	Dec 31, 2010
	2009	conduct survey, maintain 100% Good or Excellent	100% Good or Excellent (Target Met)
	2007	Baseline	100% Good or Excellent
7.1.1c: Percentage of key data users and policy makers, including reimbursable collaborators, that are satisfied with data quality and relevance. reimbursable customers *(Outcome)*	2011	Increase Excellent from 56% to 61%	Dec 31, 2011
	2010	NA	Dec 31, 2010
	2007	Baseline	91% (56% Excellent/35% Good)
7.1.1d: Percentage of key data users and policy	2010	Conduct survey/increase Excellent from 38% to 43%	Dec 31, 2010

Measure	FY	Target	Result
makers, including reimbursable collaborators, that are satisfied with data quality and relevance. data users conference attendees *(Outcome)*	*2007*	Baseline	91% (38% Excellent/53% Good)
7.1.2: The number of new or revised charts and tables and methodological changes in Health, United States, as a proxy for continuous improvement and innovation in the scope and detail of information. *(Output)*	*2011*	15	Dec 31, 2011
	2010	15	Dec 31, 2010
	2009	15	Jan 31, 2010
	2008	15	4 new detailed trend tables and 26 new charts (Target Exceeded)
	2007	15	5 new detailed trend tables and 21 new charts (Target Exceeded)
	2006	15	5 new detailed trend tables and 19 new charts (Target Exceeded)
7.1.3a: Number of improved user tools and technologies and web visits as a proxy for the use of NCHS data. Number of improved user tools and technologies *(Output)*	*2011*	5	Dec 31, 2011
	2010	5	Dec 31, 2010
	2009	5	6 (Target Exceeded)
	2008	5	6 (Target Exceeded)
	2007	5	5 (Target Met)
	2006	5	5 (Target Met)
7.1.3b: Number of improved user tools and technologies and web visits as a proxy for the use of NCHS data. Number of web visits *(Output)*	*2011*	7.5 M	Dec 31, 2011
	2010	7.5 M	Dec 31, 2010
	2009	7.5 M	7.7M (Target Exceeded)
	2008	7.1 M	6.8 M (Target Not Met)
	2007	6.8 M	6.9 M (Target Exceeded)
	2006	6.45 M	6.8 M (Target Exceeded)

Unique Identifier	Data Source	Data Validation
7.1.1	Health Statistics Board of Scientific Counselors and other independent groups	NCHS plans to implement a systematic approach and tool for assessing the satisfaction of key data users and policy makers.
7.1.2	*Health, United States*	Improvement and innovation in *Health, United States* can be assessed through four components: a) new charts in the Chartbook; b) new trend tables; c) tables substantially revised; and d) major methodological changes. The published archived volumes can be inspected yearly and compared to their predecessors to measure the continuous improvement and innovation.
7.1.3	CDC/NCHS Website	Internal checks of data.

Long-term Objective 7.1, Performance Measure 1

This measure addresses the performance element of quality and relevance. CDC will implement a systematic approach and tool for assessing the satisfaction of key data users and policy makers (e.g., reimbursable collaborators, Assistant Secretary for Planning and Evaluation, OMB, Congressional Research Service, and others) relative to data quality and scope. The Health Statistics Board of Scientific Counselors has identified the list of key data users and policy makers to be surveyed, along with those organizations that directly work with CDC through interagency agreements. NCHS will survey the following on an intermittent basis: Reimbursable customers, Data User Conference attendees, Federal Power Users, and Web-based Users. Performance results will be used by CDC managers to drive program improvements.

The data reported for the satisfaction survey are from four groups: Federal Power Users, Reimbursable collaborators, Web-based users, and Data User Conference attendees.

The survey of Federal Power Users, Reimbursable Collaborators and Data User Conference attendees are conducted in-person and are qualitative. Using a core set of questions, participants are asked to rank their overall experiences with NCHS products and services (re: data quality, ease of use of data, professionalism of staff, relevance to major health issues, relevance to user needs), and to provide details relative to their specific data needs.

The web-based survey was conducted in FY 2008 and FY 2009 and the same questions were asked both years. Although no formal cognitive testing was conducted, experts in questionnaire design reviewed the proposed survey questions. During fielding, the frequency of non-response was monitored and it appears that the questions were not too difficult to answer. Qualitative comments also appeared consistent with quantitative responses. The survey was designed to provide information from a convenience sample of key stakeholders, who by virtue of their participation indicated their interest in NCHS data. The survey, launches a pop-up window for every n(th) web visitor, giving the user a yes/no option to take the survey and requiring them to indicate that they trust the NCHS site to allow pop-ups. The survey programmer has encoded a counter, as well as length of stay and consecutive hit criteria to ensure accuracy in timing the pop-up window for each nth visitor. The survey analyzes the incoming data and provides the following information: response count (with the number of answered questions and the number of skipped questions), percentage of responses per question, and the rating average per question.

In FY 2009, CDC conducted a series of informational interviews with Federal Power Users to qualitatively assess their satisfaction with NCHS products and services including data quality, ease of data accessibility and use, professionalism of staff, relevance of data to major health issues, and relevance of data to user needs. The result of the surveys were 100 percent Good or Excellent.

The start of the web-based survey was delayed until November. The results will be reported in FY 2010.

Long-term Objective 7.1, Performance Measure 2

This measure addresses the performance element of scope. *Health, United States* (HUS), the most comprehensive publication produced by CDC, draws information from each data system, as well as data from other federal partners and collaborators. Improvements in the scope and detail of *Health, United States* are a proxy for the scope of data produced and made available by CDC. Improvement and innovation in *Health, United States* can be assessed through four components: 1) new charts in the Chartbook; 2) new trend tables; 3) tables substantially revised; and 4) major methodological changes. Published archived volumes can be inspected yearly and compared to their predecessors to measure the continuous improvement and innovation.

In FY 2008, HUS included four new trend tables and 26 new charts. In addition, the book incorporated major changes in all natality tables to account for the ongoing implementation of the new birth certificate

data that is the basis for most of our trend tables on natality. These changes, as well as modifications to selected mortality tables (notably the tables on race and ethnicity that include infant mortality data) will be ongoing.

The target of 15 new or revised charts and tables and methodological changes in *Health, United States* has been exceeded the past years due to major resources being devoted to the Special Feature, which is the source of the majority of new charts included in the publication. However, it is difficult to predict competing priorities, and methodological modifications that need to be incorporated in any given year, or new data sources that can be tapped to produce new trend tables. New trend tables are much more resource-intensive to produce than are charts, and in future years, it is possible that the Health Statistics program will include more new trend tables and fewer charts. Therefore the target of 15 new charts, trend tables, or major modifications will continue to be ambitious.

HUS 2009 is still in the clearance process; it is expected to be released in January, 2010.

Long-term Objective 7.1, Performance Measure 3

A primary objective of CDC is to maximize the use of data collected through investment of public funds. As the use of data increases, so does the return on investment. One way to increase use is to make data available in more easily accessible forms. CDC makes its data available in a variety of forms through the internet and works to improve the speed and efficiency with which people access the data by: 1) development of data input statements/programs that allow people quick access to data files; 2) development of Fast Stats and Quick Stats to quickly access data files; and 3) use of Beyond 20/20 software making it more likely that systems such as the CDC Health Data Interactive, the Data Resource Center for Child and Adolescent Health, Vital Stats and Healthy People 2010, will be found and used, thereby increasing the use of data already collected. The FY 2009 target of five new improved user tools has been exceeded; the goal of 7.5 million visits to the site was also exceeded.

During FY 2009, the following improvements were made on the CDC website:

1. Developed a new website with recent data releases to health policy requests.

2. Released 14 NCHS Data Briefs on topics of interest to policy makers.

3. Developed new content on the Research Data Center website about the proposal process.

4. Released results of the NCHS Board of Scientific Counselor reviews.

5. Improved the NDI website including upgrades to the application process.

6. Launched the Health Data Interactive site which combines the Trends in Health and Aging and Health Data for All Ages.

In 2008, CDC conducted a usability study at the Data Users Conference to ask data users for suggestions on how to modify the NCHS website to make navigation of the site easier.

Based on feedback from participants and reviewing data from Omniture on website visits, several areas commonly accessed were placed on the left navigation bar including Surveys and Data Collection Systems, Publications, and Data Access Tools. In addition the following sites were placed above the fold to increase user access: What's New, Press Room, News and Events, and FASTSTATS.

PUBLIC HEALTH INFORMATICS

LONG TERM OBJECTIVE 8.1: LOWER BARRIERS TO DATA EXCHANGE ACROSS JURISDICTIONS FOR PUBLIC HEALTH SURVEILLANCE AND RESPONSE.

Measure	FY	Target	Result
8.1.1: Increase the number of States that can send electronic messages to CDC in compliance with published standards. (Output)	*2011*	15	12/2011
	2010	10	12/2010
	2009	5	12/2009
	2008	Baseline	0

Unique Identifier	Data Source	Data Validation
8.1.1	NEDSS, PHIN Certification	HL7 messages received by CDC

Long-term Objective 8.1, Performance Measure 1

This measure assesses States' capabilities to exchange data via electronic messages with CDC consistent with established standards (e.g., PHIN requirements, message specification and mapping guides, and vocabulary and format standards). In order for States to share information for routine surveillance and outbreak response, they must be able to generate messages that use a common set of standards and specifications. This ensures that the data can be shared regardless of the State's unique systems and infrastructure. The ability to send electronic data will improve public health through more timely and complete identification of cases of notifiable diseases, sharing case reports for follow-up and management with other jurisdictions, and more coordinated emergency response across jurisdictional lines.(e.g., State to State, State to local, and State to other federal agencies).

In 2006, CDC issued new guidance that calls for the use of Health Level Seven (HL7) as the national standard for public health entities to receive electronic messages. This consensus decision was based on the goal of exchanging public health information electronically. CDC's National Center for Public Health Informatics (NCPHI) notes that this moves public health into alignment with the Health Information Technology Standards Panel (HITSP) and the Nationwide Health Information Network (NHIN). In addition to this alignment with national HIT initiatives, this work directly supports CDC's goal of increasing public health's informatics capability and the objective of increasing State and local public health agencies' informatics capability.

This indicator measures the ability to electronically exchange data between systems and across jurisdictions. A jurisdiction is defined as a state health department, or its agent. The measure supports the five core PHIN requirements, which are:

- Be able to compose electronic messages using standard protocols, formats, and terminologies. [Compose Messages]

- Be able to securely send to one or more recipients electronic messages composed using standard protocols, formats and terminologies. [Send Messages]

- Be able to securely receive, process, and interpret electronic messages sent using standard protocols, formats, and terminologies. [Receive and Process Messages]

- Be able to electronically enter, edit, and retrieve identifying and other information about persons, organizations, or other entities from an electronic directory that adheres to standard directory protocols, formats, and terminologies, and to which the department has authorized access. [Public Health Directory]

- Ensure that its electronic information systems that support PHIN requirements are secure and have the appropriate level of availability and the information contained is only accessed or used by authorized users for authorized purposes. [System Access, Security and Availability]

The results for this measure are determined by the number of States that have been awarded one instance of PHIN Certification related to the national notifiable diseases. Certification is renewed on a two-year cycle.

PHIN Certification provides an objective assessment designed to evaluate the compliance of public health information systems with the latest PHIN requirements. It is designed to provide meaningful and achievable targets, a consistent method to report capabilities and demonstrate progress. Currently, there are two certifications available that are related to the national notifiable diseases: Tuberculosis and Varicella Case Notification Message – Send (v. 2). These two certifications offer states the opportunity to demonstrate their adherence with PHIN Requirements and ensure that they can securely, effectively and efficiently exchange data. The PHIN Certification Program continues to work with other CDC programs and stakeholders in developing evaluation criteria for new certification areas which will be later incorporated into the list of available certifications.

CDC's National Center for Public Health Informatics (NCPHI) collaborates with CDC partners and external stakeholders to develop processes that use program-specific requirements for the evaluation of message structure and content, as well as security and data integrity. PHIN Certification provides an objective assessment to evaluate the compliance of public health information systems with the latest PHIN requirements. The goal of PHIN Certification is to support the development and implementation of applications and information systems that comply with PHIN requirements to ensure public health partners can securely, effectively, and efficiently exchange data. PHIN Certification is designed to provide strategic targets, report capabilities, and demonstrate progress. CDC supports States' efforts to achieve PHIN Certification through:

- Developing and maintaining PHIN Requirements which define national standards for electronic exchange of public health information;

- Developing and maintaining standards-based messaging guides;

- Developing and maintaining PHIN Certification criteria;

- Developing and maintaining PHIN-related standards-based applications and tools;

- Providing technical assistance to States to achieve PHIN Requirements;

- Reviewing, monitoring and advising awardees of PHIN-related grants and cooperative agreements;

- Providing objective assessment of States' ability to meet PHIN Certification Criteria; and

- Fostering programmatic partnerships within CDC and promoting collaboration with external stakeholders.

Investment in the technical infrastructure to achieve established targets requires health information technology to be a priority area for States. There is a need for concerted activities at federal, state, and local levels that promote the use of health information technology by enhancing existing infrastructure for greater interoperability and integration, increasing use of IT by public health departments, expanding health informatics education programs, and ensuring the privacy and security of electronic health information.

CDC will work with internal and external stakeholders to increase collaboration efforts on the development and advancement of PHIN standards, requirements and guides. Through identifying synergies across all public health programs, the needs of electronic information exchange can be further

defined and additional guidance for message specifications and criteria may be developed. CDC will also leverage existing grant and cooperative agreement requirements that pertain to PHIN compliance and work with programs to incorporate PHIN standards in future funding opportunities.

HEALTH MARKETING

LONG-TERM OBJECTIVE 9.1: IMPROVE ACCESS TO AND REACH OF CDC'S SCIENTIFIC HEALTH INFORMATION AMONG KEY AUDIENCES TO MAXIMIZE HEALTH IMPACT.

Measure	FY	Target	Result
9.1.1: Provide health information to the public in order to educate, inform and improve health outcomes. a. User satisfaction with CDC.gov.	2011	82%	12/2011
	2010	82%	12/2010
	2009	81%	81% (Target Met)
	2008	Baseline	81%
b. Percentage of inquirers making a behavior change as a result of information gained from their experience with CDC-INFO	2011	52%/ 82%	12/2011
	2010	50% / 82%	12/2010
	2009	Baseline	48% of respondents expressed the intention to change behavior; of these, 80% reported that they were already engaging in new behavior *
c. Health Behavior impact of CDC.gov	2011	70%	12/2011
	2010	69%	12/2010
	2009	Baseline	68% of users indicate they are likely or very likely to make a change based on their experience with CDC.gov
9.1.2: Provide health information to health professionals and partner organizations (e.g. state and local health departments) in order to educate, inform and improve health outcomes (system approaches to health) a. Number of subscribers to the *Morbidity and Mortality Weekly Report* (MMWR)	2011	154,341	12/2011
	2010	130,322	12/2010
	2009	104,103	96,035
	2008	Baseline	76,000
b. Number of total subscribers to CDC's Partnership Matters (biweekly email update with information on CDC partnerships, public health initiatives involving partners, personnel changes, reader feedback, and upcoming events and seminars). [1]	2011	33,880	12/2011
	2010	30,800	12/2010
	2009	12,100	28,000 (Target Exceeded)
	2008	Baseline	11,000
c. Number of Partners registered with the CDC Partner Network (formerly known as the Partners Portal database). (www.cdc.gov/partners) [1]	2011	855 subscribers	12/2011
	2010	805 subscribers	12/2010
	2009	639 subscribers	732 subscribers (Target Exceeded)
	2008	Baseline	300 subscribers

Unique Identifier	Data Source	Data Validation
9.1.1	Division of eHealth Marketing (DeHM), Division of Health Communication and Marketing, and Division of Creative Services (DCS)	Staff to collect electronic channel usage statistics on an on-going basis and monitor improvements over time. User performance and user satisfaction will be measured in user testing and other user research methods (on-line surveys, interviews, etc).
9.1.2	All Health Marketing Divisions (DPSA, DCS, DeHM, and DHCM)	Staff to collect channel usage statistics on an on-going basis and monitor improvements over time.

Long-term Objective 9.1, Performance Measure 1a – c:

CDC has initiated many successful health communication efforts to educate, inform, and improve health outcomes of the general public. Timely communication of public health information is important with regards to promoting general well-being. However, during public health emergencies, this becomes critical to maximizing understanding of actions that need to be taken and minimizing adverse impact on individual and public health. These products reflect and address the increasing diffusion of the channels through which the general public seeks information.

The Pew Internet in American Life Project estimates that more than 95 million American adults use the Internet to find health information. With a potential audience of this size and almost 700 million page views of CDC.gov in 2009, CDC must effectively and strategically use the Internet to optimize its role as CDC's primary public health communication channel to produce positive health impact by using credible information to promote positive behavior change.

Most recently demonstrated in the H1N1 Flu outbreak and the CDC/FDA collaboration on the peanut product recall, recent need was such that over 14 million page views were requested in one day on CDC's Web site for H1N1 response. Back-up systems had to be employed to keep the system stable. CDC must continue to increase access, use and engagement with the public in order to raise awareness of CDC scientific data and health information and increase the impact on the public's health.

In order to ensure that CDC-INFO remains a trusted and credible resource among the general public, CDC-INFO uses its OMB-approved survey to determine the level of satisfaction with the service provided to the inquirer. The satisfaction surveys (there are voluntary automated and call back surveys offered to call and email inquirers) also pose additional questions regarding desire to change behavior and actual behavior change influenced by the information provided by CDC-INFO. This measure enables CDC-INFO to measure the effectiveness of the information it provides in influencing health-related behavior on call and email inquirers.

To measure access, use, and engagement with and health impact of the CDC.gov Web presence, NCHM relies on a number of analytics tools including Omniture, American Customer Satisfaction Index (ACSI) surveys, and other commercial services which analyze real time user behavior, satisfaction, and the overall user experience. Customer satisfaction significantly increased with CDC.gov, as measured by ACSI. CDC.gov's quarterly score jumped from 76 (Q4- 2006) to 82 (out of 100) in Q4-2008, which is the second highest performing site for Federal Portal Sites in Q4 2008.

The most recent self reported responses (October 08-January 09) showed increased satisfaction scores with key audience groups, Health Care Providers, Educators and Studentsm Consumers, and Public Health Professionals. Seventy-seven percent of the Health Care Provider audience segment reported that they successfully found the information they were looking for on the CDC Web site. From the October

08-January 09 ACSI survey, with regard to new media usage (in the last three months), most (60 percent) say that they have watched a video online, half (50 percent) say they have received text messages, half (50 percent) say they receive e-mail updates from a Web site, and a large portion (41 percent) have browsed through online photo galleries. CDC-INFO modified and refined more than 1,000 of its 5,000 prepared responses in FY 2008, in order to ensure that the information provided to callers is clear, accurate, compelling and relevant to the inquirer. Many prepared responses include a "Call To Action" for the agent handling the call to provide to the caller.

In December, 2008, 50 percent of call-back survey respondents from a sample of 1,800 indicated that what they had learned from CDC-INFO made them want to change their behavior and of those 81 percent had made a behavior change. The most common behavior changes made were reducing risky sexual behavior, getting vaccinated and changing diet and exercise habits. Prior to the CDC-INFO consolidation, none of this information was collected, so the public health impact of CDC's phone and email services provided was not known.

Ensuring rapid dissemination of CDC's important health information, health messaging and critical behavioral change opportunities through CDC.gov, and interactive media channels including online partnerships, content syndication and mobile, and through electronic communication efforts such as CDC-INFO can significantly contribute to the health, safety, and well-being of people around the world. CDC.gov and CDC-INFO can also be more effectively integrated and used as key channels to communicate with and educate CDC's partners in state and local health departments, health care organizations, laboratories, universities, businesses, and other government agencies to disseminate the latest research into practice, provide emergency updates, increase knowledge and skills in public health practice, and much more.

In order to achieve improved performance, CDC is undertaking a number of activities. The program is expanding use of CDC.gov through content syndication and other innovative technical products that increase the reach and partnership of CDC data and information to achieve the overall goals of health impact. CDC.gov will implement newly created question on the ACSI survey for CDC.gov Web site that will help CDC better evaluate health impact and behavior change associated with CDC.gov. CDC is expanding the use of metrics analysis specifically for its health campaigns to understand the reach of web based campaigns. CDC.gov will pursue online partnerships with credible organizations to help improve the dissemination of key health messages and promote online traffic to CDC.gov. CDC-INFO will continue to strengthen development of prepared scripts and training to ensure that the CDC-INFO inquirer experience is compelling and leads to measurable outcomes and health benefits for inquirers.

Long-term Objective 9.1, Performance Measure 2 a – c:

CDC provides health information to health professionals and partner organizations in order to educate, inform and improve health outcomes.

MMWR is the nation's leading public health bulletin and the flagship publication of CDC. MMWR provides public health officials and health-care providers with the reliable recommendations necessary to: (a) direct response to disease outbreaks or public health emergencies, (b) educate peers and the public, and (c) provide proven practices for disease and injury prevention and control.

MMWR's electronic distribution is far reaching. Currently, approximately 88,000 persons on GovDelivery receives the MMWR electronically; MMWR's website receives approximately 1 million hits per month; and MMWR is indexed in PubMed, which receives more than 13,000 MMWR hits per month, of which more than 8,000 hits are for the Weekly. In addition, weekly MMWR podcasts of published reports receive approximately 10,000 hits per month.

MMWR will continue to serve as the communication vehicle for CDC, publishing timely and accurate science-based public health information and associated CDC or CDC-sanctioned recommendations and surveillance data.

Partners (public health organizations such as NACCHO, the National Association of City and County Health Officials), business, faith- and community-based organizations, educational institutions, and the sports and entertainment industry play a critical role in diffusing important public health messages and influencing national-level policy discussions regarding health. Therefore, CDC's commitment to developing and maintaining relationships with these organizations' represents an integral part of the agency's strategy in promulgating sound public health policies and practices.

Regarding partner engagement and communication, which is critical to overcoming system barriers and implementing multi-level interventions, CDC established an online partnership portal. The portal connects nearly 400 organizations affiliated with multiple sectors and delivers a bi-weekly newsletter to more than 7,500 subscribers to provide updates on CDC's activities and issues of critical public health importance.

The number, reach and type of partner engagements conducted with CDC partners. For the purposes of this measure, partner engagement includes such items as small partner meetings, ongoing partner engagement activities (e.g. providing content for Target Corporation for their customer communications program), large partner meetings (e.g. Leaders to Leaders Conference); telephone calls leading to specific actions; teleconferences or podcasts; and memoranda of understanding.

Partner engagement activities will be planned annually around the strategic goals of the agency that relate to policy and policy awareness objectives and to generally aid in diffusion of health messages (through partners) to the public, such as through our work with Target and Wal-Mart to reach patrons of those organizations. Public health organizations alone cannot be the message bearers and influencers regarding health reform or improving the health of Americans.

To achieve projected targets, CDC is working with its partners, the agency's policy office and leadership team to help frame and diffuse public health messages to partners who can carry the messages to specific target audiences of the public. In addition, CDC will provide innovative solutions based on the partner engagement activities to help meet the changing needs of the public health community.

ENVIRONMENTAL HEALTH AND INJURY PREVENTION

ENVIRONMENTAL HEALTH

Measure	FY	Target	Result
10.E.2: Maintain the percentage of cost savings each year for CCEHIP as a result of the Public Health Integrated Business Services HPO. *(Output)*	*2011*	30%	Dec 31, 2011
	2010	29%	Dec 31, 2010
	2009	28%	38% (Target Exceeded)
	2006	Baseline	0%

Unique Identifier	Data Source	Data Validation
10.E.2	CDC's Management Analysis and Services Office, COMPARE data system	CDC's Financial Management Office validates the data against FTE database information for the Management Analysis and Services Office

Efficiency Measure 10.E.2:

CDC is undergoing an agency-wide process to achieve significant efficiencies through the Public Health Integrated Business Services High Performing Organization (PHIBS HPO). The PHIBS HPO was approved by OMB in March of 2007. The focus of the PHIBS HPO is to systematically improve and modernize 16 different business support services reaching optimal efficiencies in service quality and at the same time reducing staff resource costs that perform the services by 2011.

Participation in the CDC-wide PHIBS HPO will link virtually all business support services performed in CCEHIP with those performed elsewhere at CDC, allowing the use of best practices, standardized procedures, and comparable measurement of performance across CDC. Reductions in staff and contractor time spent performing business support services will occur initially and be maintained thereafter in the CCEHIP HPO. Targets have been created for staff and contractors and costs associated with these, and for combined costs. These targets form the approximate 30 percent reduction in business support service costs. It is also expected that staff now performing business support services less than 10 percent of their time, will have those business service functions redirected to staff who primarily perform business services. This will decrease the combined grade of staff performing business services in CCEHIP and will allow the work in question to be accomplished more efficiently. Because staff who currently perform business services less than 10 percent of their time are primarily programmatic, this time will be returned to CCEHIP programs.

In addition, the Public Health Integrated Business Services HPO procedures require use of consistent, standardized business processes for all 16 involved business services. Cost and staffing efficiency will be routinely monitored and measured, as will service quality. In addition, 23 performance measures related to service delivery will be monitored and reported. All business support services currently focused at the branch, team, or other level in CCEHIP will be coordinated, standardized, and measured across CCEHIP. CCEHIP will be able to determine, disseminate and implement best practices in all business support services.

In FY 2009, CCEHIP exceeded their target reduction with a total percentage of cost savings of 38 percent. This reduction far exceeded the targeted reduction of 28 percent. At this time CCEHIP will retain the same targets as FY 2009 was the first year of reporting on this measure. CCEHIP will update targets as necessary as trends are established.

LONG TERM OBJECTIVE 10.1: DETERMINE HUMAN HEALTH EFFECTS ASSOCIATED WITH ENVIRONMENTAL EXPOSURES.

Measure	FY	Target	Result
10.1.1: Number of environmental chemicals, including nutritional indicators that are assessed for exposure of the U.S. population. *(Output)*	*2011*	323	Oct 31, 2011
	2010	323	Oct 31, 2010
	2009	323	323 (Target Met)
	2008	280	280 (Target Met)
	2007	250	293 (Target Exceeded)
	2006	180	274 (Target Exceeded)
10.1.2: Complete studies to determine the harmful health effects from environmental hazards *(Output)*	*2011*	25	Oct 31, 2011
	2010	25	Oct 31, 2010
	2009	25	25 (Target Met)
	2008	12	32 (Target Exceeded)
	2007	25	36 (Target Exceeded)
	2006	25	34 (Target Exceeded)
10.1.3: Number of laboratory quality standards maintained in certified or participating laboratories for tests such as lipids; newborn screening; those predictive of type 1 diabetes; blood lead, cadmium, and mercury; and nutritional factors. *(Output)*	*2011*	974	Oct 31, 2011
	2010	974	Oct 31, 2010
	2009	959	967 (Target Exceeded)
	2008	967	967 (Target Met)
	2007	1,001	1,001 (Target Met)
	2006	990	987 (Target Not Met but Improved)

Unique Identifier	Data Source	Data Validation
10.1.1	Environmental Health Laboratory data systems	Data systems at Centers for Disease Control and Prevention (CDC)s Environmental Health Laboratory monitor laboratory performance under Clinical Laboratory Improvement Amendments (CLIA). CDC also conducts quality assurance activities internally to confirm results and ensure their validity.
10.1.2	Annual Division Report (year-end)	Internal Program Review
10.1.3	Environmental Health Laboratory data systems	Data systems at Centers for Disease Control and Prevention (CDC)s Environmental Health Laboratory monitor laboratory performance under Clinical Laboratory Improvement Amendments (CLIA). CDC also conducts quality assurance activities

Unique Identifier	Data Source	Data Validation
		internally to confirm results and ensure their validity.

Long-term Objective 10.1, Performance Measure 1

Currently, CDC's Environmental Health Laboratory can measure at least 450 environmental chemicals and dietary indicators in human blood or urine. However, not all of these are yet measured in specimens obtained from participants in the National Health and Nutrition Examination Survey (NHANES). In FY 2009, the laboratory continued to measure environmental chemicals in people who participated in NHANES. These data provide unique exposure data to scientists, physicians, and health officials and can be used in multiple ways: 1) to determine which chemicals and indicators are in peoples bodies and at what levels; 2) to establish national reference ranges against which physicians and health officials can determine whether a person or group has an unusually high exposure; 3) to track trends in levels of exposure in the population over time; and 4) to assess the effectiveness of public health actions. The laboratory published data on blood lead levels among U.S. children aged one to five years. Results indicate an 84 percent decline in elevated blood lead levels among children from 1988 to 2004. The major risk factors for higher blood lead levels continue to be living in housing built before 1950, poverty, age and being non-Hispanic black. Because children can be exposed to lead from multiple sources, including consumer products and imported toys, efforts to test children at high risk for lead poisoning, and to identify and control all lead sources that can poison children, must continue. Prevention efforts at national, state, and local levels will help maintain progress already made, and continue to help eliminate elevated blood lead levels in children. The laboratory also published the Fourth National Report on Human Exposure to Environmental Chemicals (Fourth Report), the most extensive assessment to date of the exposure of Americans to environmental chemicals. Findings include evidence of widespread exposure in the U.S. population to some commonly-used industrial chemicals, such as polybrominated diphenyl ethers (PBDEs), bisphenol A (BPA), and perfluorooctanoic acid (PFOA). This baseline data on the U.S. population is the first step in directing priorities for research on human health effects from exposure. The Fourth Report also supports scientists and health professionals in identifying groups with unusually high exposure levels and recognizing exposures that are increasing over time.

For FY 2011, the program has developed a target of measuring 323 environmental chemicals and nutritional indicators in the U.S. population. Achieving this target is dependent on scientific advancements, such as increasing the number of chemicals that can be measured in a single sample and developing sophisticated new methods for analyzing chemicals that will increase the laboratory's exposure-assessment capabilities. While past research and development (R&D) of new methods has progressed well, it is difficult to predict progress.

Long-term Objective 10.1, Performance Measure 2

This measure reflects the efforts of CDC's Environmental Hazards and Health Effects (EHHE) Program. CDC investigates the human health effects of hazards in the environment, such as water and air pollutants, mold, and radiation as well as hazards related to natural and other disasters. The results of these investigations and studies help CDC develop, implement, and evaluate actions and strategies for preventing or reducing harmful exposures and their health consequences. Since FY 2005, the program has significantly exceeded its targets. Strained financial and staff resources in state health departments over the past several years have required state health departments to rely more heavily on CDC's technical expertise and assistance to conduct investigations into suspected environmental exposures. Most of the studies conducted by EHHE are a result of response activities to clarify emerging environmental threats. Response activities by definition are not planned. Other factors that affect this performance measure are the number of natural disasters and emergency response situations. EHHE met its FY 2009 target of 25 studies. One could hypothesize that meeting, rather than exceeding this target could be affected by 1)

economic situation of the United States. The publics primary concern is the economy, leaving less capacity for concern for environmental health threats; 2) the U.S. experienced fewer natural disasters, such as hurricanes, in FY2009 than in years past; and 3) state public health capacity was directed to address H1N1, resulting in reduced opportunities for the state to dedicate to environmental health, including requesting CDC's technical assistance. For example, EHHE investigated an outbreak of 111 fatal, diethylene glycol (DEG) poisonings among infants in Nigeria. The team interviewed 71 potential case patient families, collected medications for DEG analysis and reviewed medical records. The team successfully confirmed the source of the outbreak (a teething medication), identified an additional contaminated medication, enhanced surveillance and initiated a public awareness campaign. Results were published in the MMWR in December of 2009. Targets are established based on experience and available resources.

Long-term Objective 10.1, Performance Measure 3

The program ensures the quality of several different tests in a large number of laboratories that voluntarily participate in quality assurance and standardization programs. In FY 2009, the program met its target of 967 laboratories. Although CDC makes every effort to encourage participation in these programs, it cannot compel laboratories to participate. The targets for FY 2010 and FY 2011 realistically reflect anticipated participation in these voluntary standardization programs. One of the standardization programs, the Newborn Screening Quality Assurance Program (NSQAP) is the only comprehensive program in the world devoted to ensuring the accuracy of newborn screening tests. In many cases, detecting these disorders spells the difference between life and death for newborns; in other instances, identifying babies with a disorder means that they can be treated and thus not face life-long disability or cognitive impairment. In FY 2009, NSQAP provided quality assurance services, such as training, consultation, proficiency testing, guidelines and reference materials, for more than 50 disorders to public health laboratories responsible for newborn screening. When the program began in 1978, it provided quality assurance services for one disorder, congenital hypothyroidism. Because of NSQAP's efforts, parents and doctors in the United States can trust the results of newborn screening tests

LONG TERM OBJECTIVE 10.2: PREVENT OR REDUCE ILLNESSES, INJURY, AND DEATH RELATED TO ENVIRONMENTAL RISK FACTORS.

Measure	FY	Target	Result
10.2.2: Number of children under age 6 with elevated blood lead levels. *(Outcome)*	*2011*	67,000	Jun 30, 2013
	2010	79,000	Jun 30, 2012
	2009	95,000	Jun 30, 2011
	2008	104,000	Jun 30, 2010
	2007	112,000	121,000 (Target Not Met but Improved)
	2006	190,829	190,829 (Target Met)
10.2.4: Increase the proportion of those with current asthma who report they have received self – management training for asthma in populations served by CDC funded state asthma control programs. *(Output)*	*2011*	50%	Dec 31, 2012
	2010	49%	Dec 31, 2011
	2009	48%	Dec 31, 2010
	2006	Baseline	45%

Unique Identifier	Data Source	Data Validation
10.2.2	NHANES	Increased reporting from laboratories electronically, resulting in fewer errors introduced in data during data entry.
10.2.4	BRFSS Asthma Call-Back Survey	Approximately 4-6 month process conducted by CDC staff that involves processing, cleaning, weighting, and checking survey data to develop an aggregate data set for reporting purposes.

Long-term Objective 10.2, Performance Measure 2

Authorized in 1998, the Childhood Lead Poisoning Prevention Program uses funds to develop programs and policies to prevent lead poisoning, educate the public and health-care providers about lead poisoning, fund state and local health departments to determine the extent of lead poisoning by screening for elevated blood lead levels, help ensure medical and environmental follow-up for lead poisoning, and develop neighborhood-based efforts to prevent lead poisoning.

The program provides over 80 percent of its budget to fund competitive cooperative agreements in 34 states and six localities for lead poisoning prevention programs. Funding for the current five-year project period began in July 2006 and will continue through June 2010. Additionally, CDC has partnered with the U.S. Department of Housing and Urban Development (HUD) and the EPA since 2004 to ensure safe and healthy communities by identifying housing units in which successive children have been lead poisoned. The partnership was piloted in one community in 2004 and has since expanded to seven by the end of FY 2008.

Significant Accomplishments of this program include: NHANES data related to EBLs are typically finalized and ready for public release in June every two years. This means that the 2007/2008 NHANES EBL data will likely be available for release June 2010.

- Based on the data published in CDC's Third National Report on Human Exposure to Environmental Chemicals the percentage of young children with elevated Blood Lead Levels (BLLs), 10 micrograms per deciliter (g/dl) or higher, decreased from an estimated 4.4 percent in NHANES III (19911994) to.59 percent for 2005-2006. This decline indicates that lead exposure among young children in the general population is continuing to decrease and is reflective of national, state and local efforts to reduce BLLs in children aged one to five years.

- By the end of FY 2008, 100 percent of previously CDC funded programs had met the requirement to develop and implement elimination plans that involved stakeholders and local and state decision-makers.

- Because of the excellent progress in reducing the number of lead-poisoned children in our nation and the connection to the effort to make housing safer, CDC has transitioned the Childhood Lead Poisoning Prevention program into a Healthy Housing program that will focus on reducing multiple health and safety hazards located in housing, including the hazard of lead. CDC recognizes the synergies that can be gained by a holistic approach to analyzing and addressing health threats in houses.

Long-term Objective 10.2, Performance Measure 4

Asthma is the fourth leading cause of work absenteeism and diminished productivity, resulting in nearly 12 million missed or less productive work days annually. According to the National Heart, Lung, and Blood Institute (NHLBI) asthma costs the nation $19.7 billion dollars every year. One of four activities outlined by the National Asthma Education and Prevention Program (NAEPP) of the NHLBI in 2002 for providing quality care to patients with asthma is the provision of education to the patient about the steps

they can take in managing their disease and what steps to take if symptoms worsen (self-management). An analysis conducted by the Cochrane Collaboration showed reductions (20 - 35 percent) where self-management education reduced asthma exacerbations, emergency room visits, unscheduled office visits to the doctor, and days off work or from school (Gibson et al, 2002). All states funded by CDC's National Asthma Control Program to address asthma from a public health perspective work with partners throughout their states to implement educational and training interventions. Results from a systematic review of reports provided by states in the implementation phase of their program (30 at time of review) showed that 100 percent of state asthma control programs conduct training based interventions. In addition, the review found that 25 states (83.3 percent) are currently conducting asthma educational activities that are designed to improve medical practitioner adherence and the proper diagnosis, control, and management of asthma. A variety of other training-based interventions are conducted by state asthma control programs, including those which are designed to directly educate persons with asthma and their families (70 percent of states). These numbers represent the strong emphasis state asthma control programs place on increasing the likelihood that persons with asthma will receive information about asthma self-management either through the activities of their medical providers or through direct contact with the state asthma program. CDC believes this measure provides a more accurate portrait of the performance the program is making towards reducing the burden of asthma within funded states. The NACP has increased national and state asthma surveillance. CDC's data source is the Behavioral Risk Factor Surveillance System (BRFSS) Asthma Call-Back Survey.

The data that CDC is collecting, analyzing, and reporting for this measure is based on calendar year not fiscal year. CY 2008 data reporting closed 12/31/2009. Once CDC receives the data at the end of the calendar year, an additional four to six months is needed before an aggregate file in which the data has been cleaned, processed, weighted, and checked/validated is complete. This file must be received before CDC can analyze any data to evaluate and report results to assess our performance. Due to unexpected changes in the raw data set, the data for CY 2007 is still undergoing the analysis and validation process. Results for CY 2006 are reported at 45 percent.

INJURY PREVENTION AND CONTROL

Measure	FY	Target	Result
11.E.2: Maintain the percentage of cost savings each year for CCEHIP as a result of the Public Health Integrated Business Services HPO. *(Outcome)*	*Out-Year Target*	30% (2011)	Dec 31, 2011
	2010	29%	Dec 31, 2010
	2009	28%	38%
	2006	Baseline	0%

Unique Identifier	Data Source	Data Validation
11.E.2	CDC's Management Analysis and Services Office, COMPARE data system	CDC's Financial Management Office validates the data against FTE database information for the Management Analysis and Services Office

Efficiency Measure 11.E.2:

CDC is undergoing an agency-wide process to achieve significant efficiencies through the Public Health Integrated Business Services High Performing Organization (PHIBS HPO). The PHIBS HPO was approved by OMB in March of 2007. The focus of the PHIBS HPO is to systematically improve and modernize 16 different business support services reaching optimal efficiencies in service quality and at the same time reducing staff resource costs that perform the services by 2011.

Participation in the CDC-wide PHIBS HPO will link virtually all business support services performed in CCEHIP with those performed elsewhere at CDC, allowing the use of best practices, standardized procedures, and comparable measurement of performance across CDC. Reductions in staff and contractor time spent performing business support services will occur initially and be maintained thereafter in the CCEHIP HPO. Targets have been created for staff and contractors and costs associated with these, and for combined costs. These targets form the approximate 30 percent reduction in business support service costs. It is also expected that staff now performing business support services less than 10% of their time, will have those business service functions redirected to staff who primarily perform business services. This will decrease the combined grade of staff performing business services in CCEHIP and will allow the work in question to be accomplished more efficiently. Because staff who currently perform business services less than 10 percent of their time are primarily programmatic, this time will be returned to CCEHIP programs.

In addition, the Public Health Integrated Business Services HPO procedures require use of consistent, standardized business processes for all 16 involved business services. Cost and staffing efficiency will be routinely monitored and measured, as will service quality. In addition, 23 performance measures related to service delivery will be monitored and reported. All business support services currently focused at the branch, team, or other level in CCEHIP will be coordinated, standardized, and measured across CCEHIP. CCEHIP will be able to determine, disseminate and implement best practices in all business support services.

In FY 2009, CCEHIP exceeded their target reduction with a total percentage of cost savings of 38 percent. This reduction far exceeded the targeted reduction of 28 percent. At this time CCEHIP will retain the same targets as FY 2009 was the first year of reporting on this measure. CCEHIP will update targets as necessary as trends are established.

INTENTIONAL INJURY

LONG TERM OBJECTIVE 11.1: ACHIEVE REDUCTIONS IN THE BURDEN OF INJURIES, DISABILITY, OR DEATH FROM INTENTIONAL INJURIES FOR PEOPLE AT ALL LIFE STAGES.

Measure	FY	Target	Result
11.1.1: Reduce youth homicide rate by 0.1 per 100,000 annually. *(Outcome)*	*2011*	8.7/100,000	Aug 31, 2013
	2010	8.7/100,000	Aug 31, 2012
	2009	8.8/100,000	Aug 31, 2011
	2008	8.8/100,000	Aug 31, 2010
11.1.2a: Reduce victimization of youth enrolled in grades 9-12 as measured by: a reduction in the lifetime prevalence of unwanted sexual intercourse *(Outcome)*	*2011*	6.4%	Dec 31, 2012
	2009	6.7%	Dec 31, 2010
	2007	6.9%	7.8% (Target Not Met)
11.1.2b: Reduce victimization of youth enrolled in grades 9-12 as measured by: the 12-month incidence of dating violence *(Outcome)*	*2011*	7.7%	Dec 31, 2012
	2009	8.1%	Dec 31, 2010
	2007	8.4%	9.9% (Target Not Met)
11.1.2c: Reduce victimization of youth enrolled in grades 9-12 as measured by: the 12-month incidence of physical fighting. *(Outcome)*	*2011*	28.4%	Dec 31, 2012
	2009	29.3%	Dec 31, 2010
	2007	30.3%	35.5% (Target Not Met but Improved)

Unique Identifier	Data Source	Data Validation
11.1.1	National Violent Death Reporting System (NVDRS)	Data verified through CDCs National Center for Injury Prevention and Control, Office of Statistics and Programming Analysis.
11.1.2	Youth Risk Behavior Survey	Data verified through CDCs National Center for Injury Prevention and Control, Office of Statistics and Programming Analysis.

Long-term Objective 11.1, Performance Measure 1

This measure is monitored utilizing data from persons aged 10-24 years among states participating in the National Violent Death Reporting System (NVDRS) in 2003. This measure contributes to CDC's long term goal to reduce homicide rates among youth aged 10-24 by 10 percent in NVDRS states with FY 2003 baseline data.

Homicide is the second leading cause of death for youth ages 10-24 years in the U.S. and the fourth leading cause of death for children ages 1-14 years.

The FY 2005 target of 8.9/100,000 was not met for this measure (actual was 9.2/100,000). There are many factors that contribute to youth violence and homicide rates, including economic conditions, lifestyle behaviors, and social and physical environments. CDC works to prevent this violence by identifying effective strategies that reduce risk factors and increase promotive and protective factors at the

individual, family, and community levels. As trends in these risk factors change, such as poorer economic conditions or changes in the prevalence and types of substance abuse, youth violence and youth victimization may increase. CDC will continue to evaluate and modify efforts to achieve its targets in reducing incidences of youth homicide. CDC continues to keep the existing projection of targets for future years while trends fluctuate and are still being established; however, there is currently not a national program to fund states for youth violence activities. This presents a challenge with impacting national level statistics.

Long-term Objective 11.1, Performance Measure 2

This measure contributes to CDC's long term goal to impact self-reported victimization of youth as measured by reductions in two of three of the following: unwanted sexual intercourse, dating violence, and physical fighting.

CDC funds numerous programs and activities to address the victimization of youth. The data source of youth victimization is CDC's Youth Risk Behavior Survey (YRBS). In the YRBS, students enrolled in grades nine to twelve are asked these questions:

- During the past 12 months, did your boyfriend or girlfriend ever hit, slap, or physically hurt you on purpose?

- Have you ever been physically forced to have sexual intercourse when you did not want to?

- During the past 12 months, how many times were you in a physical fight?

The FY 2005 and 2007 targets were not met for this measure. There are many factors that contribute to youth violence and victimization, including economic conditions, lifestyle behaviors, and social and physical environments. CDC works to prevent this violence by identifying effective strategies that reduce risk factors and increase promotive and protective factors at the individual, family, and community levels. As trends in these risk factors change, such as poorer economic conditions or changes in the prevalence and types of substance abuse, youth violence and youth victimization may increase. CDC will continue to evaluate and modify efforts to achieve its targets in reducing incidences of unwanted sexual intercourse, dating violence, and physical fighting. CDC continues to keep the existing projection of targets for future years while trends fluctuate and are still being established; however, there is currently not a national program to fund states for youth violence activities. This presents a challenge with impacting national level statistics.

UNINTENTIONAL INJURY

LONG TERM OBJECTIVE 11.2: ACHIEVE REDUCTIONS IN THE BURDEN OF INJURIES, DISABILITY OR DEATH FROM UNINTENTIONAL INJURIES FOR PEOPLE AT ALL LIFE STAGES.

Measure	FY	Target	Result
11.2.1: Among the states receiving funding from CDC, reduce deaths from residential fires by 0.01 per 100,000 population. *(Outcome)*	2010	1.10/100,000	Oct 31, 2012
	2009	1.11/100,000	Oct 31, 2011
	2008	1.12/100,000	Oct 31, 2010
	2007	1.13/100,000	Jun 30, 2010
	2006	1.27/100,000	1.15/100,000 (Target Exceeded)
11.2.2: Achieve an age-adjusted fall fatality rate among persons age 65+ of no more than 69.6 per 100,000. *(Outcome)*	Out-Year Target	58.7 per 100,000 (2013)	Oct 31, 2015
	2011	54.3/100,000	Oct 31, 2013
	2010	52.1/100,000	Oct 31, 2012
	2009	50.0/100,000	Oct 31, 2011
	2008	47.8/100,000	Oct 31, 2010
	2007	45.6/100,000	Jun 30, 2010
	2006	43.4/100,000	44.4/100,000 (Target Not Met)
11.2.3: Decrease the estimated percent increase of age-adjusted fall fatality rates among persons age 65+ years. *(Outcome)*	Out-Year Target	9.73% reduction (2012)	Dec 31, 2014
	2011	9.66% reduction	Dec 31, 2013
	2010	9.56% reduction	Dec 31, 2012
	2009	9.45% reduction	Dec 31, 2011
	2008	9.30% reduction	Oct 31, 2010
	2007	9.10% reduction	Jun 30, 2010
	2006	8.82% reduction	0.87% (Target Not Met but Improved)

Unique Identifier	Data Source	Data Validation
11.2.1 - 11.2.3	National Vital Statistics System	Data verified through CDCs National Center for Injury Prevention and Control, Office of Statistics and Programming Analysis.

Long-term Objective 11.2, Performance Measure 1

This measure contributes to CDC's long term program assessment goal to reduce deaths from residential fires to 1.02 per 100,000 population among states receiving funding from CDC. CDC anticipates that targets will be met, as the field continues to make strides in residential fire safety and prevention. Policy decisions are being made at state and local levels that contribute to fewer deaths from residential fires, such as requirements for the sale of fire-safe cigarettes. While the field continues to see improvements in deaths from residential fires, achieving success is depending upon a number of factors such as developing new countermeasures and technologies to lower risks for fires; conducting research and surveillance to understand emerging issues as they arise and become a factor in deaths from residential fires; and, conducting research on effective prevention strategies that can be implemented in the home.

CDC faces several challenges in addressing residential fire prevention that make it difficult to set targets, including: a lack of timely and comprehensive fire incident data; scarce resources for conducting fire

prevention and evaluation activities on a national level; and few evaluated residential fire prevention programs.

At the end of FY 2010, CDC will end the Smoke Alarm Installation and Fire Safety Education Program (SAIFE). The program is a cooperative agreement between CDC and 17 states for the installation of smoke alarms in homes in high risk areas. FY 2010 will mark the end of the most recent five year cooperative agreement cycle. CDC will work with grantees to transition their activities prior to the termination of this program. CDC will allocate funds currently used for the SAIFE Program (approximately $2.3 million) to address cutting edge residential fire prevention scientific and policy-related opportunities as well as other priority topics in unintentional injury prevention. Given that the SAIFE program will no longer be funded by CDC, Measure 11.2.1 will no longer reflect CDC activities and will need to be retired. Retiring measure 11.2.1 is a first step in CDC's preparations for revising its entire existing performance plan to better reflect CDC's breadth of activities. As a result, CDC will not propose a replacement measure at this time.

Data for FY 2007 has not been released by the National Center for Health Statistics (NCHS). Therefore, the program is unable to report the actuals at this time. As a result, the reporting date for this program assessment measure has been shifted from 10/2009 to 06/2010 to allow NCHS to release the FY 2007 Vital Statistics Data. Existing targets will remain unchanged until FY 2007 data can be reviewed and trends assessed.

Long-term Objective 11.2, Performance Measure 2

This measure was not met for FY 2004, FY 2005 and FY 2006. FY 2004 was the first year of implementation of a process to track the new older adult falls baseline measures. The target of 39.0 per 100,000 population for FY 2004 was based on a best estimation of an achievable result, given trends and existing prevention efforts. The reasons CDC is not meeting the targets on falls are unclear, but rates of older adult fall deaths are increasing. Falls are the leading cause of death among adults age 65 and older. With the aging society, older adults are the fastest growing segment of the U.S. population, this will continue to be a rising public health concern. In addition, the average life expectancy has increased and death rates from cardiovascular and chronic diseases have decreased. Although the fatality rates were adjusted for age, additional age-related factors may explain the increasing rate. Advancing age is associated with physiologic changes, including decreased muscle strength and endurance, delayed reaction times, slowed reflexes, and loss of visual acuity. These changes may interact with use of psychoactive medications and chronic conditions, such as osteoporosis, arthritis, and diabetes, which put older adults at high risk of sustaining fatal fall injuries. There are currently no national state-funded falls prevention activities to reduce the fall fatality rate.

Efforts are underway to decrease deaths from falls among older adults. For example, within HHS, CDC is collaborating with states to provide custom exercise classes designed to improve strength, balance, and mobility; education about how to reduce fall risk factors; assistance to improve the home environment; and medical referrals as appropriate. CDC will seek to revise its measures to reflect milestones and outcomes which may be more practical to achieve given resources, capacity, and trends in this important cause of morbidity and mortality in the U.S.

Data for FY 2007 has not been released by the National Center for Health Statistics (NCHS). Therefore, the program is unable to report the actuals at this time. As a result, the reporting date for this program assessment measure has been shifted from 10/2009 to 06/2010 to allow NCHS to release the FY 2007 Vital Statistics Data. Existing targets will remain unchanged until FY 2007 data can be reviewed and trends assessed.

Long-term Objective 11.2, Performance Measure 3

This measure was not met for FY 2004, FY 2005 and FY 2006. FY 2004 was first year of implementation of a process to track the new older adult falls baseline measures. The target of a 7.67 percent reduction was based on a best estimation of an achievable result, given trends and existing prevention efforts. The reasons CDC is not meeting the targets on falls are unclear, but rates of older adult fall deaths are increasing. Falls are the leading cause of death among adults age 65 and older. With the aging society, older adults are the fastest growing segment of the U.S. population, this will continue to be a rising public health concern. In addition, the average life expectancy has increased and death rates from cardiovascular and chronic diseases have decreased. In addition, although the fatality rates were adjusted for age, additional age-related factors may explain the increasing rate. Advancing age is associated with physiologic changes, including decreased muscle strength and endurance, delayed reaction times, slowed reflexes, and loss of visual acuity. These changes may interact with use of psychoactive medications and chronic conditions, such as osteoporosis, arthritis, and diabetes, which put older adults at high risk of sustaining fatal fall injuries.

Efforts are underway to decrease deaths from falls among older adults. For example, within HHS, CDC is collaborating with states to provide custom exercise classes designed to improve strength, balance, and mobility; education about how to reduce fall risk factors; assistance to improve the home environment; and medical referrals as appropriate. CDC will seek to revise its measures to reflect milestones and outcomes which may be more practical to achieve given resources, capacity, and trends in this important cause of morbidity and mortality in the U.S.

Data for FY 2007 has not been released by the National Center for Health Statistics (NCHS). Therefore, the program is unable to report the actuals at this time. As a result, the reporting date for this program assessment measure has been shifted from 10/2009 to 06/2010 to allow NCHS to release the FY 2007 Vital Statistics Data. Existing targets will remain unchanged until FY 2007 data can be reviewed and trends assessed.

Please note: Some actuals are negative numbers as the actual rates are not only larger than the target rate, but also the projected rates as well.

OCCUPATIONAL SAFETY AND HEALTH

Measure	FY	Target	Result
12.E.2: Reduce consumption of utilities (e.g., gas, electric, water). *(Efficiency)*	*2011*	4% reduction	Dec 31, 2012
	2010	3% reduction	Dec 31, 2011
	2009	2% reduction	Dec 31, 2010
	2008	1% reduction	$3.09/sq.ft (Target Exceeded)
	2007	Baseline	$3.26/sq.ft

Unique Identifier	Data Source	Data Validation
12.E.2	Office of Administrative and Management Services Records	NIOSH Operations Officers at each facility (Pittsburgh, Spokane, Morgantown, and Cincinnati) track the annual costs spent on utilities. The expenditures, which are measured in dollars for each tracked utility, are adjusted for rate changes from the utility suppliers. NIOSH energy consumption is tracked monthly and the usages are trended. The usages come from utility bills and are verified against meter readings.

Efficiency Measure 12.E.2:

This measure focuses on the consumption of utilities at NIOSH research facilities. Specifically, the annual costs spent on utilities (water, gas, electric, and coal) at the Morgantown, Cincinnati, Pittsburgh, and Spokane facilities per square feet of used space during the year. Utilities are a significant part of the CDC budget. NIOSH research facilities have specific requirements (e.g., continuous air cooling/heating for animal housing facilities, human sample storage) making efficiency efforts more difficult than they are for other types of government operations. This measure is not a duplication of CDC's Buildings and Facilities program efficiency measures on energy and water reduction. NIOSH, unlike other CDC CIOs is responsible for covering utility expenses out of its total program budget. Therefore, NIOSH's expenses are not captured within the existing measure.

It is expected that utility costs may advance at a faster rate than utility usage efficiencies, possibly leading to an overall increase in utility costs for these facilities. Thus the numerator will be corrected for price increases that NIOSH cannot control. It is proposed that the numerator reflect expenditures (measured in dollars) for each tracked utility adjusted for rate changes from the utility suppliers. Hence, baseline rates were provided the as part of the proposed measure.

LONG TERM OBJECTIVE 12.1: CONDUCT RESEARCH TO REDUCE WORK-RELATED ILLNESSES AND INJURIES.

Measure	FY	Target	Result
12.1.1: Progress in targeting new research to areas of occupational safety and health (OSH) most relevant to future improvements in workplace protection. *(Outcome)*	*2009*	Evaluate relevance of final 1/5 of CDC NIOSH program activities according to specifications below.	Dec 31, 2010
	2008	Evaluate relevance of fourth 1/5 of CDC NIOSH program activities according to specifications below.	Evaluate relevance of fourth 1/5 of CDC NIOSH program activities (Target Met)
	2007	Evaluate relevance of third 1/5 of CDC NIOSH program activities according to specifications below.	Evaluate relevance of third 1/5 of CDC NIOSH program activities (Target Met)

Measure	FY	Target	Result
	2006	Baseline	Evaluate relevance of second 1/5 of CDC NIOSH program activities according to specifications below (Target Met)
12.1.2: Improve the quality and usefulness of tracking information for safety and health professionals and researchers in targeting research and intervention priorities; measure the success of implemented intervention strategies. *(Output)*	2011	A) Evaluate the role that tracking information had in designing research and intervention projects. B) Identify the role that follow-up tracking information can have in assessing the success of interventions. C) Heighten use of tracking data as a way to reduce the prevalence rate of elevated blood lead concentrations in persons due to work exposures by 3%.	Jun 30, 2012
	2010	A) Evaluate the role that tracking information had in designing research and intervention projects. B) Identify the role that follow-up tracking information can have in assessing the success of interventions. C) Heighten use of tracking data as a way to reduce the prevalence rate of elevated blood lead concentrations in persons due to work exposures by 3%.	Jun 30, 2011
	2009	A) Evaluate the role that tracking information had in designing research and intervention projects. B) Identify the role that follow-up tracking information can have in assessing the success of interventions. C) Heighten use of tracking data as a way to reduce the prevalence rate of elevated blood lead concentrations in persons due to work exposures by 3%.	Jun 30, 2010
	2008	A) Evaluate the role that tracking information had in designing research and intervention projects. B) Identify the role that follow-up tracking information can have in assessing the success of interventions. C) Heighten use of tracking data as a way to reduce the prevalence rate of elevated blood lead concentrations in persons due to work exposures by 3%.	A)252 research and intervention projects were based on tracking information; B) 33 intervention projects used tracking information to demonstrate the success of intervention strategy C) 7.4 adults per 100,000 with elevated blood lead levels (Target Met)
	2007	A) Evaluate the role that tracking information had in designing research and intervention projects. B) Identify the role that follow-up tracking information can have in assessing the success of interventions. C) Heighten use of tracking data as a way to reduce the prevalence rate of elevated blood lead concentrations in persons due to work exposures by 3%.	A) 211 research and intervention projects were based on tracking information (Met); B) 34 intervention projects used tracking information to demonstrate the success of the intervention strategy (met) C) 7.8 adults per 100,000 with elevated blood lead levels (Target Met)

Measure	FY	Target	Result
	2006	A) Evaluate the role that tracking information had in designing research and intervention projects. B) Identify the role that follow-up tracking information can have in assessing the success of interventions. C) Heighten use of tracking data as a way to reduce the prevalence rate of elevated blood lead concentrations in persons due to work exposures by 3%.	A) 155 research and intervention projects were based on tracking information (Met); B) 15 intervention programs used tracking information to demonstrate the success of the intervention strategy (Met); C) 7.6 adults per 100,000 with elevated blood lead levels (Target Met)
12.1.3: Percentage of NIOSH programs that will have completed program-specific outcome measures and targets in conjunction with stakeholders and customers. *(Output)*	*2011*	90%	Sep 30, 2011
	2010	90%	Sep 30, 2010
	2009	80%	80% (Target Met)
	2008	70%	80% (Target Exceeded)
	2007	60%	61% (Target Exceeded)
	2006	50%	52% (Target Exceeded)

Unique Identifier	Data Source	Data Validation
12.1.1	National Academies (NA) direct report to NIOSH	NIOSH has contracted with the NA to complete reviews of at least two NIOSH sector programs annually. Upon completion of the reviews, the NA submits a formal report to NIOSH, which includes a quantitative rating of the program, summary of findings, refined outcome measures and suggestions for future improvement.
12.1.2	NIOSHTIC II database and NIOSH Project Planning and Management (NPPM) system	a) Annually, the Office of the Director develops a report on the number of publications produced by select projects using the NIOSHTIC II database and NPPM system. This report is sent to the Divisions for review, to ensure the accuracy and completion of the information; b) Internal Projects Projects competing for new NORA funds undergo a formal external peer-review process. The NPPM system is used to identify new projects and peer review is verified by the NIOSH Associate Director for Science. External Projects - All external projects are reviewed through the NIH peer review system. The date and details of the reviews are recorded and reviewed by the NIOSH Office of Extramural Programs.
12.1.3	National Academies (NA) direct report to NIOSH	NIOSH has contracted with the NA to complete reviews of at least two NIOSH sector programs annually. Upon completion of the reviews, the NA submits a formal report to NIOSH,

Unique Identifier	Data Source	Data Validation
		which includes a quantitative rating of the program, summary of findings, refined outcome measures and suggestions for future improvement.

Long-term Objective 12.1, Performance Measure 1

CDC entered into a contract with the National Academies (NA) to conduct a review of its occupational safety and health (OSH) research program portfolio. In FY 2005, the NA Framework Committee engaged in extensive study of appropriate program evaluation criteria for judging the relevance and impact of CDC research programs. The NA evaluation committees subsequently used the Framework document created by the Framework Committee to guide the reviews of CDCs OSH research programs. Subsequently, the reporting deadlines for all evaluations had to be extended to provide sufficient time to the NA committees to conduct the reviews. A panel of experts was recruited for each NIOSH program review. The purpose of the review was to assess the impact and relevance of each program and to identify emerging issues. As of November 2009, NA evaluation committees have reported favorable scores for program relevance and impact for eight CDC programs: hearing loss, mining, agriculture, respiratory diseases, traumatic injuries, construction, personal protective technology, and health hazard evaluations. The results of these reviews provided NIOSH with a number of recommendations, which will guide the direction of OSH research and contribute to improved safety and health of the Nation's workers.

This measure is currently under review and FY 2010 and 2011 targets are to be determined pending the direction of the post-evaluation activities.

Long-term Objective 12.1, Performance Measure 2

CDC supports several state-based surveillance activities and maintains national databases of occupational injuries and fatalities. Linked to this health information is the identification of exposures to hazards that can lead to illness and injury. With this information, specific research initiatives can be undertaken to understand the relationships between exposures and health outcomes. In turn, intervention strategies are developed and implemented to reduce illness and injury.

CDC continues to meet its performance targets by using surveillance information to develop and evaluate projects. In FY 2008, 252 research and intervention projects were based on tracking information, and 33 intervention programs used tracking information to demonstrate the effectiveness of the programs strategies. From FY 2004 to FY 2008, the number of research and intervention projects using surveillance information has varied due to changes in the total number and types of projects funded each fiscal year. Although not included in the target, many CDC projects such as training initiatives and information projects are also initiated in response to surveillance information. CDC continuing education courses, CDC Alerts and Fact Sheets may be developed for occupational safety and health professionals, employers and employees to renew concern and present prevention strategies for identified workplace hazards. The ABLES program has been successful in improving surveillance of lead exposures among adults by increasing to 40 the number of states conducting surveillance in 2008. The programs strategy for making progress toward meeting the target includes continuing to focus on providing funding to states for surveillance of blood lead levels, providing technical support to state surveillance programs, and promoting lead exposure prevention. In addition, CDC continues to improve its capacity to analyze blood lead data among adults and to make data available to researchers and the public

The continued use of surveillance information in developing and evaluating projects and other OSH activities has been encouraged by the sector-based approach of the second decade of National Occupational Research Agenda (NORA) and the comprehensive NA reviews. Both of these initiatives urge scientists to analyze OSH surveillance data, and conduct projects that are relevant to existing OSH hazards and will result in a reduction in workplace illness and injury.

Long-term Objective 12.1, Performance Measure 3

As part of the National Academies' comprehensive review of research activities (referenced above) and NORA, all programs will develop comprehensive outcome-based measures and targets in conjunction with stakeholders and customers. These two initiatives have assisted CDC in exceeding this performance goal from FY 2005 to present. To date, NIOSH research programs have established Steering Committees and have drafted strategic plans. The plans include goals, measures, and targets. In FY 2009, the Steering Committees completed outcome measures and targets for 80 percent of CDC's programs mining, construction, agriculture, health care, transportation, services, public safety, and wholesale and retail trade. These measures and targets guide the research programs in conducting customer-based, transparent research, and have aided the National Academies' program committees in their evaluation of the relevance and impact of the research programs.

LONG TERM OBJECTIVE 12.2: PROMOTE SAFE AND HEALTHY WORKPLACES THROUGH INTERVENTIONS, RECOMMENDATIONS AND CAPACITY BUILDING.

Measure	FY	Target	Result
12.2.1: Increase the percentage of CDC NIOSH-trained professionals who enter the field of occupational safety and health after graduation. *(Outcome)*	*2011*	80%	Dec 31, 2011
	2010	80%	Dec 31, 2010
	2009	80%	81% (Target Exceeded)
	2008	80%	85% (Target Exceeded)
	2007	80%	85% (Target Exceeded)
	2006	80%	80% (Target Met)
12.2.2a: Reduce the annual incidence of work injuries, illnesses, and fatalities, in targeted sectors: Reduction of non-fatal injuries among youth ages 15–17. *(Output)*	*2011*	4.2/100 FTE	Dec 31, 2011
	2010	4.2/100 FTE	Dec 31, 2010
	2009	4.4/100 FTE	4.2/100 FTE (Target Exceeded)
	2008	4.4/100 FTE	4.2/100FTE (Target Exceeded)
	2007	4.4/100 FTE	4.4/100 FTE (Target Met)
	2006	4.8/100 FTE	4.4/100 FTE (Target Exceeded)
12.2.2b: Reduce the annual incidence of work injuries, illnesses, and fatalities, in targeted sectors: Reduction of fatal injuries among youth 15–17. *(Output)*	*2011*	2.5/100,000 FTE	Dec 31, 2011
	2010	2.5/100,000 FTE	Dec 31, 2010
	2009	3.0/100,000 FTE	2.3/100,000FTE (Target Exceeded)
	2008	2.5/100,000 FTE	2.0/100,000 FTE (Target Exceeded)
	2007	2.5/100,000 FTE	2.0/100,000 FTE (Target Exceeded)
	2006	3.2/100,000 FTE	3.2/100,000 FTE (Target Met)
12.2.2c: Reduce the annual incidence of work injuries, illnesses, and fatalities, in targeted sectors: Percentage of active underground coal mines in the U.S. that	*2011*	90%	Dec 31, 2011
	2010	90%	Dec 31, 2010
	2009	90%	98% (Target Exceeded)
	2008	90%	98% (Target Exceeded)

Measure	FY	Target	Result
possesses NIOSH-approved plans to perform x-ray surveillance for pneumoconiosis *(Output)*	*2007*	90%	94% (Target Exceeded)
	2006	90%	92% (Target Exceeded)
12.2.3a: Reduce occupational illness and injury as measured by: Percent reductions in respirable coal dust overexposure. *(Outcome)*	*Out-Year Target*	50% reduction (2014)	Dec 31, 2014
12.2.3b: Reduce occupational illness and injury as measured by: Percent reduction in fatalities and injuries in roadway construction. *(Outcome)*	*Out-Year Target*	40% reduction (2014)	Dec 31, 2014
12.2.3c: Reduce occupational illness and injury as measured by: Percent of firefighters and first responders' access to chemical, biological, radiological, and nuclear respirators. *(Outcome)*	*Out-Year Target*	75% reduction (2014)	Dec 31, 2014

Unique Identifier	Data Source	Data Validation
12.2.1	NIOSH Office of Extramural Programs training grantee annual progress reports, which include performance data	OEP staff review and verify data with grantees via phone or email contact, as needed
12.2.2	a) National Electronic Injury Surveillance System (NEISS); b) Census of Fatal Occupational Injuries (CFOI) special research file provided to NIOSH by Bureau of Labor Statistics; c) National Occupational Respiratory Mortality System (NORMS), an interactive query system designed to generate statistics, charts, and maps relating to mortality from occupationally-related lung diseases.	a) The Consumer Product Safety Commission (CPSC) annually visits emergency departments that submit data to NEISS to assess case capture, and review records as they are submitted for completeness and internal consistency. NIOSH receives NEISS data quarterly and reviews the subset of work-related cases that CPSC provides to ensure the cases meet NIOSH definitions of work-relatedness. NIOSH reviews a sample of cases after coding by a contractor to ensure a high level of accuracy for codes that describe source of injury and event/exposure leading to injury; b) NIOSH receives the special CFOI file annually. To avoid duplication of fatalities in the counts, source documents are matched using the decedent's name and other information. To ensure an accurate count of fatal occupational injuries, the census program requires that for each case, the work relationship (that

Unique Identifier	Data Source	Data Validation
		is, whether a fatality is work related) be substantiated by two or more independent source documents or a source document and a follow-up questionnaire; c) NORMS is based on public-use, multiple cause of death data files obtained annually from the National Center for Health Statistics (NCHS). NCHS performs data quality check to remove invalid codes, verify the coding of certain rare causes of death, and ensure age/cause and sex/cause compatibility. To ensure the accuracy of the NORMS results, NIOSH compares the findings to the NCHS control tables.
12.2.3	a) The Mine Safety and Health Administration (MSHA) and NIOSH data sets that are shared between the agencies - MSHA data is routinely collected as part of the enforcement and compliance requirements, and NIOSH data collected during field investigations, in support of current and future research experiments.; b) See Measure 2b	a) The MSHA data is collected according to the agencys standard rigorous sampling and handling protocols. The validation of NIOSH data is ensured by following the protocols developed during the generation of the research proposals. The proposals are peer-reviewed and include calibration requirements for the measurement and handling of the dust samples, as well as procedures for analyzing the results and ensuring the meaningfulness of the data points; b) See Measure 2b.

Long-term Objective 12.2, Performance Measure 1

This measure focuses on the effectiveness of CDC training with respect to entry into the field of occupational safety and health. CDC conducts a competitive training grant program aimed at increasing the number of professionals trained to work in the occupational safety and health field. CDC supports a network of Education and Research Centers (ERCs) and Training Project Grants (TPGs) around the country. In FY 2009, 429 professionals graduated from these programs with specialized training in disciplines that include occupational medicine, occupational health nursing, industrial hygiene, occupational safety, and other closely related occupational safety and health fields of study. From 2003 to 2009, the number of occupational trained professionals has steadily increased. This is due to the increase in awareness of occupational safety and health and the comprehensive curriculum which provides a variety of continuing education opportunities for occupational safety and health professionals. CDC estimates that about half of all U.S. occupational safety and health professionals graduate from CDC-supported programs at the masters and doctoral levels. In FY 2009, CDC exceeded its performance goal with 81 percent of the professionals graduating from CDC-funded programs pursuing careers in occupational safety and health. The increase in demand for OSH professionals and the agency's ability to provide needed OSH training opportunities via the ERC/TPG network has enabled CDC to meet and exceed performance targets over the past several years.

Long-term Objective 12.2, Performance Measure 2

CDC has a long history of conducting and supporting young worker safety and health research and intervention activities, and working with partners to improve young worker safety and health.

Contributions to improvements in young worker safety include increased awareness of the issue and recent changes in child labor laws.

In FY 2007, CDC, CDC grantees and others, finalized and disseminated curricula that will increase young workers basic knowledge of workplace safety and health if adopted and widely used. The curricula engages students and teachers in the exploration of risks to youth in the workplace, their rights and relevant labor laws, common workplace hazards and controls, communication skills, and young workers role in emergency preparedness and response. CDC has publicized the availability of the curricula and encouraged its use; however, schools are faced with limited opportunities to introduce new curricula. The product is currently underutilized. CDC continues to reach out to the education community to encourage use of the curricula, and plans to hire a curriculum expert to help develop a document showing where each part of the curriculum aligns with mandatory national education standards in high schools.

CDC has also made valuable contributions in the area of child labor laws. CDC provided input into the revised child labor regulations that became effective February 14, 2005, that prohibit youth less than 18 years of age from working in particularly dangerous work, such as work on roofs and with compacting and baling equipment. Further progress was made on April 17, 2007, when the Department of Labor proposed federal child labor laws that will prohibit youth less than 18 years of age from working in poultry slaughtering and packaging plants, riding on a forklift as a passenger, fighting forest fires, and operating certain power-driven hoists and work assist vehicles. These proposed regulatory changes are responsive to specific science-based recommendations made by CDC, and a final rule is anticipated within the next couple of years. The Department of Labor continues to work on additional proposed rules based on previous comprehensive science-based recommendations made by CDC in 2002. CDC routinely responds to requests for data and technical consultation from the Department of Labor on potential changes to child labor laws, and is developing a document that summarizes surveillance data and findings from research-based investigations since 1992 to provide further guidance in rulemaking.

A particular challenge for reducing young worker deaths are the preponderance of deaths in the agriculture sector. Child labor laws are very limited in the agriculture sector, and family farms are exempt. CDC has provided the Department of Labor with science-based recommendations for revisions to agricultural child labor laws, but the Department of Labor has not yet acted upon these recommendations. CDC produces data to help guide prevention efforts in the agricultural sector, leads a federal interagency working group on childhood agricultural injury prevention, funds research on childhood agricultural injury prevention, and funds a National Children's Center to conduct outreach to the agricultural sector. The Children's Center has served as a central resource for the agricultural community since 1997, and among other resources, has developed and disseminated the North American Guidelines for Children's Agricultural Tasks (NAGCATS) which have been shown to be effective in reducing injuries when used. The Children's Center continues outreach to encourage the use of these guidelines. CDC data demonstrate a 35 percent reduction in injuries to youth working on farms between 1998 and 2004.

Current rates of young worker deaths and injuries are generally lower than in the last decade, however, there has not been a clear and steady trend, and fatality rates in particular have gone up and down. The relatively small numbers of deaths each year contribute to the erratic nature of the fatality rates (e.g. 34 deaths of youth workers less than 18 years of age in 2008). The recent economic downturn is likely to impact deaths and injuries of young workers. Youth unemployment has increased which means less exposure, but there is the possibility that fewer job opportunities will result in more youth working in especially dangerous informal work arrangements, such as in construction and agriculture. Routine CDC analyses of data collected by both CDC and the Bureau of Labor Statistics will monitor trends.

All actively producing underground coal mines are required to file a mine x-ray plan with NIOSH. This plan outlines where and when working underground coal miners will be able to obtain a chest x-ray free of charge to them. Prior to 2003 the percentage of active underground coal mines in the U.S. that were in

compliance with having a NIOSH-approved plan was not monitored. CDC has exceeded the 90 percent target level since the FY 2003 baseline year, but 90 percent remains an ambitious target for several reasons. Because pneumoconiosis continues to occur, it will be important to maintain high levels of participation among coal mines in CDC's Coal Workers Health Surveillance Program because of production demands, it is anticipated that many new coal mines will open that will need to be entered into the program. CDC has exceeded the 90 percent target level since the 2003 baseline year, but 90 percent remains an ambitious target for several reasons. CDC will work to encourage coal mines to participate by establishing surveillance plans in two ways: directly contacting mines without approved programs and assist them in developing approved programs, and partnering with the MSHA by informing them of mines without approved plans. MSHA has the ability to follow up with these mines to encourage participation, and if necessary, is able to issue citations to mines without plans and vacate the citations once plans are established.

Long-term Objective 12.2, Performance Measure 3

For most program activities, reductions in occupational illnesses and injuries are due to multiple factors of which research is one component. However for some sectors and activities, extenuating circumstances are minimal and efforts are at a stage where future decreases in illness and injuries logically can be attributed to the success of programs without requiring the additional level of analysis. This measure targets three such high risk sectors and activities which represent impact in (1) occupational illness (due to coal dust overexposure); (2) occupational injuries (in roadway construction); and (3) preparedness (firefighter access to CBRN respirators). In FY 2003, the baseline for each was established: (1) greater than 15 percent; (2) 154 percent; and (3) greater than seven percent. CDC will report on this long term measure in FY 2014.

GLOBAL HEALTH

GLOBAL AIDS PROGRAM

LONG TERM OBJECTIVE 13.A.1: GAP WILL HELP IMPLEMENT PEPFAR IN 15 FOCUS COUNTRIES BY PARTNERING WITH OTHER USG AGENCIES TO ACHIEVE THE GOALS OF TREATING 2 MILLION HIV-INFECTED PEOPLE AND CARING FOR 10 MILLION PEOPLE INFECTED WITH OR AFFECTED BY HIV/AIDS BY 2008, AND PREVENTING 7 MILLION NEW HIV INFECTIONS BY 2010.

Measure	FY	Target	Result
13.A.1.1: Number of people receiving HIV/AIDS treatment. *(Output)*	2010	3,153,169	Mar 31, 2011
	2009	2,568,137	2,329,400 (Target Not Met but Improved)
	2008	1,668,800	2,007,800 (Target Exceeded)
	2007	1,200,000	1,358,375 (Target Exceeded)
	2006	741,000	822,000 (Target Exceeded)
13.A.1.2: Number of individuals provided with general HIV-related palliative care/basic health care and support during the reporting period, including TB. *(Output)*	2010	8,503,441	Mar 31, 2011
	2009	7,693,971	6,855,300 (Target Not Met but Improved)
	2008	4,970,650	5,734,800 (Target Exceeded)
	2007	3,130,341	3,901,543 (Target Exceeded)
	2006	2,496,157	2,464,063 (Target Not Met but Improved)
13.A.1.3: Number of pregnant women receiving PMTCT services, including counseling and testing during the reporting period. *(Output)*	2010	9,789,416	Mar 31, 2011
	2009	7,134,086	6,565,800 (Target Not Met but Improved)
	2008	5,406,208	5,850,100 (Target Exceeded)
	2007	3,650,949	4,011,797 (Target Exceeded)
	2006	2,100,292	2,837,409 (Target Exceeded)
13.A.1.4: Number of individuals who received counseling and testing during the reporting period (counseling includes the provision of test results to clients *(Output)*	2010	22,882,305	Mar 31, 2011
	2009	16,527,468	18,719,300 (Target Exceeded)
	2008	12,258,174	17,901,400 (Target Exceeded)
	2007	7,671,789	10,580,699 (Target Exceeded)
	2006	5,590,762	6,426,120 (Target Exceeded)

Unique Identifier	Data Source	Data Validation
13.A.1.1 - 13.A.1.4	Country Operational Plans (COPS) database	All USG data are validated by the OGAC Strategic Information team following internal procedures.

All but one FY 2009 performance target for the 15 focus countries were not met; however performance was improved over the preceding year for these three measures (13.A.1.1 to 13.A.1.3). All progress in performance can partially be attributed to momentum achieved through the establishment of local program infrastructure and systems in the focus countries to support and sustain greater levels of performance. Many variables impact performance and it should be noted that this accelerated progress is not due to CDC efforts alone but to the combined efforts of all the PEPFAR implementing agencies including the Department of State, USAID, Department of Commerce, Department of Labor, Department of Defense, Peace Corps and the following HHS OPDIVS: CDC, HRSA, NIH, FDA and SAMHSA.

Additional information on this measure regarding past performance and trends, current performance, and strategies can be found in the PEPFAR Fourth Annual Report to Congress at http://www.pepfar.gov

Long-term Objective 13.A.1, Performance Measure 1

On July 30, 2008, the Tom Lantos and Henry J. Hyde United States Global Leadership Against HIV/AIDS, Tuberculosis, and Malaria Reauthorization Act of 2008 was signed into law, authorizing up to $48 billion over the next 5 years to combat global HIV/AIDS, tuberculosis, and malaria. Through FY 2013, PEPFAR plans to work in partnership with host nations to support:

- Treatment for at least 3 million people

- Prevention of 12 million new infections

- Care for 12 million people, including 5 million orphans and vulnerable children

To meet these goals and build sustainable local capacity, PEPFAR will support training of at least 140,000 new health care workers in HIV/AIDS prevention, treatment and care.

The number of individuals receiving HIV/AIDS treatment has significantly increased from 66,911 in 2003 to 2,329,400 in FY 2009. The actual performance for Measure 1 was 2.3 million individuals receiving treatment compared to the target of 2.6 million. The baseline 2003 numbers are an aggregate of totals from different population-based studies conducted from 1998 to 2002 in 14 original countries (a subset of the focus countries).

With the support of PEPFAR, approximately 50,000 individuals are added each month to the number of people benefiting from life-extending antiretroviral therapy (ART). The number of sites providing treatment increased by 139 percent from FY 2005 to FY 2006, and each month an average of about 93 new ART sites began operations.

Long-term Objective 13.A.1, Performance Measure 2

Palliative care comprises a broad range of services including physical, psychological, spiritual, and social support services. Please note that beginning in FY 2006, both target and actual number include TB (FY 2004 and FY 2005 did not include TB in either target or actuals).

The number of individuals provided with general HIV-related palliative care/basic health care and support has significantly increased from 854,800 in FY 2004 to 6,855,300 in FY 2009. The actual performance for Measure 2 was 6.9 million individuals provided with care compared to the target of 7.7 million individuals.

Long-term Objective 13.A.1, Performance Measure 3

In FY 2004 through FY 2009, PEPFAR: (1) supported prevention of mother-to-child HIV transmission (PMTCT) services for women during more than 16 million pregnancies; (2) supported antiretroviral prophylaxis for nearly 1.2 million HIV-positive pregnant women, averting an estimated 240,000 infant HIV infections; and (3) supported approximately 13,769 service outlets for prevention of mother-to-child HIV transmission. This is a program level indicator that is standardized across the 15 focus countries.

The number of pregnant women receiving PMTCT services has significantly increased from 1,271,300 in FY 2004 to 6,565,800 in FY 2009. The actual performance for Measure 3 was 6.6 million pregnant women receiving these services compared to the target of 7.1 million.

Long-term Objective 13.A.1, Performance Measure 4

PEPFAR supports efforts of host nations to dramatically expand HIV counseling and testing services. PEPFAR supports HIV counseling and testing, where consent is obtained and testing is performed in accordance with international standards. Within these standards, countries use a range of services to meet their specific needs. Client-initiated or self-referred counseling and testing is requested by an individual. In a medical setting, provider-initiated counseling and testing occurs when health care workers recommend an HIV test and the patient chooses to accept. This is a program level indicator standardized across the 15 focus countries.

The number of individuals receiving counseling and testing (including the provision of test results to clients) has significantly increased from 1,791,900 in 2004 to 18,719,300 in 2009. The actual performance for Measure 4 was 18.7 million individuals compared to the target of 16.5 million individuals.

LONG TERM OBJECTIVE 13.A.2: THE GLOBAL AIDS PROGRAM WILL HELP IMPLEMENT THE PRESIDENT'S EMERGENCY PLAN FOR AIDS RELIEF IN THE OTHER BILATERAL COUNTRIES BY PARTNERING WITH OTHER USG AGENCIES , INTERNATIONAL AND HOST COUNTRY ORGANIZATIONS TO ACHIEVE THE GOALS OF PREVENTING NEW HIV INFECTIONS, TREATING HIV-INFECTED PEOPLE, AND CARING FOR PEOPLE INFECTED WITH OR AFFECTED BY HIV/AIDS.

Measure	FY	Target	Result
13.A.2.1: Number of individuals receiving antiretroviral therapy at the end of the reporting period (includes PMTCT+ sites). *(Output)*	2010	133,021 (direct)	Mar 31, 2011
	2009	123,435	155,900 (Target Exceeded)
	2008	99,706	115,000 (Target Exceeded)
	2007	306,053	276,965 (Target Not Met but Improved)
	2006	43,859	165,964 (Target Exceeded)
13.A.2.2: Number of individuals trained to provide laboratory-related activities. *(Output)*	2010	3,411 (direct)	Mar 31, 2011
	2009	2,479	1,349 (Target Not Met)
	2008	3,951	3,420 (Target Not Met)
	2007	4,652	3,988 (Target Not Met)
	2006	1,770	6,252 (Target Exceeded)
13.A.2.3: Number of pregnant women who received HIV counseling and testing for PMTCT and received their test results. *(Output)*	2010	759,994 (direct)	Mar 31, 2011
	2009	674,359 (direct)	802,425 (Target Exceeded)
	2008	290,768 (direct)	457,509 (direct) (Target Exceeded)
	2007	3,308,371	3,268,602 (Target Not Met but Improved)

Measure	FY	Target	Result
	2006	633,185	1,108,500 (Target Exceeded)
13.A.2.4: Number of individuals who received counseling and testing during the reporting period. *(Output)*	*2010*	2,310,591 (direct)	Mar 31, 2011
	2009	2,022,878 (direct)	2,506,200 (Target Exceeded)
	2008	1,112,592 (direct)	1,644,600 (Target Exceeded)
	2007	4,096,661	5,249,131 (Target Exceeded)
	2006	1,049,628	2,478,262 (Target Exceeded)

Unique Identifier	Data Source	Data Validation
13.A.2.1 - 13.A.2.4	GAP Planning and Reporting System and OGAC	All USG data are validated by the OGAC Strategic Information team following internal procedures.

All USG bilateral HIV/AIDS programs are developed and implemented within the context of multi-sectoral national HIV/AIDS strategies, under the host countries national authority. Programming is designed to reflect the comparative advantage of the USG within the national strategy, and it also leverages other resources, including both other international partner and private-sector resources. The number reported for other PEPFAR countries reflects the USG programs outside of the fifteen focus countries that provide direct support at the point of service delivery. Individuals outside of the focus countries receiving treatment as a result of the USGs contribution to systems strengthening beyond those counted as receiving direct USG support are not included in this total.

The results and targets for FY 2008, and targets for FY 2009 and FY 2010 are for direct support by USG. Additional information on the following measures regarding past performance and trends, current performance, and strategies can be found in the PEPFAR Fourth Annual Report to Congress at http://www.pepfar.gov.

Long-term Objective 13.A.2, Performance Measure 1

In addition to the 15 focus nations, the PEPFAR now partners with 19 host nations to support ART for approximately 277,000 people. USG programs in these nations largely provide critical support through system-strengthening and capacity-building, including technical assistance to international partners that support treatment. This measure represents a program level indicator that is standardized for use across all other bilateral countries receiving $1 million or more in FY 2005 USG HIV/AIDS funding. Data from FY 2004 and FY 2005 are from USAID and HHS/CDC and were not under the guidance of PEPFAR reporting; therefore, double counting may exist due to overlap between agency programs.

The actual FY 2009 performance for Measure 1 was 155,900 individuals compared to the target of 123,435 individuals. This performance gain can partially be attributed to momentum achieved through the establishment of local program infrastructure and systems in the focus countries to support and sustain greater levels of performance. Many variables impact performance and it should be noted that this accelerated progress is not due to CDC efforts alone but to the combined efforts of all the PEPFAR implementing agencies including the Department of State, USAID, Department of Commerce, Department of Labor, Department of Defense, Peace Corps and the following HHS OPDIVS: CDC, HRSA, NIH, FDA and SAMHSA.

The targets appear to be reduced in FY 2008 to FY 2010 because the Office of Global Aids Coordinator (OGAC) is only reporting direct targets and results. In the past, for other bilaterals, OGAC reported

direct and indirect targets and results for totals. These numbers were a combination of results directly attributed to USG support and results from support for systems strengthening.

Long-term Objective 13.A.2, Performance Measure 2

PEPFAR supports system-strengthening (including laboratories and surveillance and information systems), capitalizing on USG expertise in technical assistance and capacity-building for quality improvement and sustainability of programs. This measure represents a program level indicator that is standardized for use across all other bilateral countries receiving $1 million or more in USG HIV/AIDS funding in FY 2005. Data from FY 2004 and 2005 are from CDC and were not under the guidance of PEPFAR reporting. FY 2006 is the first reporting cycle that PEPFAR guidance is in effect for the countries receiving $1 million or more in USG HIV/AIDS funding.

The number of individuals trained to provide laboratory-related activities increased sharply from 1,488 in FY 2004 to 6,252 in FY 2006 before declining to 3,420 in FY 2008. The actual performance for Measure 2 was 3,420 individuals trained compared to the target of 3,951. The target was not met because Zimbabwe did not meet their targets due to the economic constraints of monetary devaluation and flight of medical personnel in Zimbabwe. Also, the targets appear to be reduced in FY 2008-FY 2010 because the Office of Global Aids Coordinator (OGAC) is only reporting direct targets and results. In the past, for other bilaterals, OGAC reported direct and indirect targets and results for our totals. These numbers were a combination of results directly attributed to USG support and results from support for systems strengthening.

Long-term Objective 13.A.2, Performance Measure 3

Through PEPFAR, the USG will continue to support counseling and testing for pregnant women, emphasizing the provision of tests results. This measure represents a program level indicator that is standardized for use across all other bilateral countries receiving $1 million or more in USG HIV/AIDS funding in FY 2005. Data from FY 2004 and FY 2005 are from USAID and HHS/CDC and were not under the guidance of PEPFAR reporting. Therefore, double counting may exist due to overlap between agency programs. FY 2006 was the first reporting cycle that PEPFAR guidance was in effect for the countries receiving $1 million or more in USG HIV/AIDS funding.

The number of pregnant women receiving HIV counseling and testing for PMTCT and their test results has significantly increased from 145,133 in 2004 to 802,425 in 2009. The actual performance for Measure 3 was 802,425 pregnant women compared to the target of 674,359.

Long-term Objective 13.A.2, Performance Measure 4

PEPFAR supports programs to care for persons living with HIV/AIDS (PLWHA) and to provide HIV counseling and testing in a growing number of countries. This measure represents a program level indicator that is standardized for use across all other bilateral countries receiving $1 million or more in USG HIV/AIDS funding in FY 2005. Data from FY 2004 and 2005 are from USAID and HHS/CDC and were not under the guidance of PEPFAR reporting. Therefore, double counting may exist due to overlap between agency programs. FY 2006 was the first reporting cycle that PEPFAR guidance was in effect for the countries receiving $1 million or more in USG HIV/AIDS funding.

The number of individuals receiving counseling and testing as a result of bilateral country programs has significantly increased from 773,649 in 2004 to 2,506,200 in 2009. The actual performance for Measure 4 was 2,506,200 individuals compared to the target of 2,022,878.

GLOBAL IMMUNIZATION PROGRAM

Measure	FY	Target	Result
13.B.E.1: The portion of the annual budget that directly supports the program purpose in the field. *(Output)*	*2011*	>=90%	Apr 30, 2012
	2010	>=90%	Apr 30, 2011
	2009	>= 90%	93% (Target Exceeded)
	2008	>= 90%	93% (Target Exceeded)
	2007	>= 90%	96% (Target Exceeded)
	2006	>= 90%	91% (Target Exceeded)

Unique Identifier	Data Source	Data Validation
13.B.E.1	Data are tracked and analyzed through IRIS, GMIS, UFMS, and ICE systems,which are financial management systems specific to CDC and or HHS.	The monthly budget update is reviewed for accuracy by the Divisions Associate Director for Management and Operations (ADMO). The ADMO monitors appropriate use of funds by category (polio, measles, and global disease detection) and CAN numbers. The ADMO works with the GID Branches to ensure that funds are completely obligated by the end of the fiscal year. The overall budget is reviewed by the Branch Chiefs, Deputy Division Director, and Division Director quarterly.

Efficiency Measure 13.B.E.1:

Developed through the 2005 program assessment process, this measure demonstrates that the majority of the Global Immunization Programs funding is used to support mission-critical activities directly through CDCs global partners, the WHO, UNICEF, PAHO and UNF. Specifically, these funds are used to purchase measles and polio vaccine and/or to provide technical or operational support through these agencies. CDC will maintain this efficiency and support for these activities in order to continue to meet global health goals. CDC has consistently exceeded this target for the five fiscal years it has been reported.

LONG TERM OBJECTIVE 13.B.1: HELP DOMESTIC AND INTERNATIONAL PARTNERS ACHIEVE WORLD HEALTH ORGANIZATION'S GOAL OF GLOBAL POLIO ERADICATION.

Measure	FY	Target	Result
13.B.1.1: Number of doses of oral polio vaccine (OPO) purchased for use in OPV mass immunization campaigns in Asia, Africa, and Europe (1 dose = 1 child reached). *(Output)*	*2011*	240 million doses	Jun 30, 2012
	2010	240 million doses	Jun 30, 2011
	2009	240 million doses	Jun 30, 2010
	2008	240 million doses	278.9 million doses (Target Exceeded)
	2007	260 million doses	287 million doses (Target Exceeded)
	2006	500 million doses	341 million doses (Target Not Met)
13.B.1.2: Number of children reached with OPV as a result of non-vaccine	*2011*	45 million children reached	Jun 30, 2012
	2010	45 million children reached	Jun 30, 2011
	2009	45 million children reached	Jun 30, 2010

Measure	FY	Target	Result
operational support funding provided to implement OPV mass immunization campaigns in Asia, Africa, and Europe. *(Output)*	*2008*	60 million children reached	39.6 million children reached (Target Not Met)
	2007	100 million children reached	119 million children reached (Target Exceeded)
	2006	Baseline	37 million children
13.B.1.3: Number of countries in the world with endemic wild polio virus. *(Outcome)*	*2011*	0 endemic countries	Aug 31, 2012
	2010	0 endemic countries	Aug 31, 2011
	2009	0 endemic countries	Aug 31, 2010
	2008	0 endemic countries	4 endemic countries (Target Not Met)
	2007	3 endemic countries	4 endemic countries (Target Not Met)
	2006	4 endemic countries	4 endemic countries (Target Met)

Unique Identifier	Data Source	Data Validation
13.B.1.1	UNICEF provides the number of doses of polio purchased with CDC funding in an annual report that is part of the CDC/UNICEF cooperative agreement.	Case count and surveillance indicators provided weekly by WHO are reviewed and analyzed by the Global Immunization Division.
13.B.1.2	GID tracks SIA operations funds provided by country through WHO and UNICEF. WHO provides a cost per child figure for SIA operational costs for each country. GID uses this data to generate and validate the number of children reached with CDC funds.	
13.B.1.3	WHO provides the polio case data generated from reports submitted by countries.	

Long-term Objective 13.B.1, Performance Measure 1

CDC continues to be one of the Global Polio Eradication Initiatives (GPEI) largest procurers of Oral Polio Vaccine (OPV). CDC works in partnership with WHO and UNICEF to ensure that CDC funding is used to fill critical unmet needs for the global initiative.

In FY 2008, performance was exceeded because CDC's grantee UNICEF does its best to ensure lowest-cost procurement whenever possible, and grantee efforts resulted in cost savings that allowed for additional vaccine to be procured with CDC funds. Starting in FY 2007, future targets were established using estimates provided by CDC's grantee UNICEF. Variation in grantee estimates occurs because of variability in vaccine costs throughout the year as UNICEF procures through multiple vaccine producers. In 2008, CDC exceeded its target with procurement of 278.9 million doses of vaccine; each dose of vaccine purchased is the equivalent of one child reached with the vaccine.

Long-term Objective 13.B.1, Performance Measure 2

WHO and UNICEF have successfully mobilized new donor contributions to the GPEI, especially for OPV procurement. While critical OPV funding gaps have been filled, significant funding gaps remain for the extensive program operations required to reach children during supplemental immunization activities (SIAs) (transport, vaccinators, cold chain management). The average cost to reach a child during SIAs is $0.31/per child (variable by country). The availability of other donor support for OPV has allowed CDC to use its more flexible funding to fill critical SIA operational gaps, ensuring that the vaccines do indeed reach the child, as well as supporting outbreak response activities related to imported poliovirus.

In FY 2008, the program procured 278.9 million doses of oral polio vaccine and provided operational funding that supports vaccinating 39.6 million children in mass vaccination campaigns. CDC funds are

sometimes strategically used as the funds of last resort to fill urgent funding gaps not met by other sources. Polio funding is finite and since flexibility must be maintained to ensure that priority polio eradication activities are conducted, there is sometimes a need to direct funds to priority gaps, leaving some activities with less resources or unfunded. In FY 2008, polio funds were used to procure additional OPV doses to ensure that campaigns were conducted, which resulted in a reduction of available funds for SIA operations. However, this need was ultimately met through other sources of funding.

Long-term Objective 13.B.1, Performance Measure 3

Since 1988, global polio incidence has declined by more than 99 percent from more than 350,000 cases annually to 1,659 cases in 2008. The 2008 number represents an increase of 27 percent from the 1,310 cases reported in 2007, mostly due to an increase of cases in Nigeria and an outbreak in Sudan.

Interrupting polio transmission in the remaining four endemic countries (India, Nigeria, Afghanistan, and Pakistan) presents the greatest immediate challenge to the global polio eradication initiative. Despite significant progress in these countries, ongoing transmission is likely to delay global polio eradication until 2010. Low routine immunization coverage in the polio endemic countries presents a challenge to the eradication efforts in the most critical areas.

New strategies being implemented to achieve the polio eradication goal include: New laboratory procedures are now in place that significantly decrease the time it takes to detect and confirm new polio infection from 42 to 21 days; this enables more rapid detection of wild poliovirus (WPV) and allows for faster response to importations and/or spread of virus.

The use of monovalent OPV (mOPV), which provides greater protection against the two types of WPV currently circulating (Types 1 and 3), is now widespread in the four polio-endemic countries and in countries experiencing outbreaks. Use of mOPV Type 1 has significantly reduced transmission of WPV Type 1, and its sustained use will be critical to interrupting WPV Type 1 globally.

Research is on-going to assess the potential for use of additional tools to achieve the polio eradication strategy, including safer and more cost-effective variations of inactivated polio vaccine (IPV) (Sabin and, intradermal), fractional dose IPV, and other vaccine administration techniques.

This measure is an adaptation developed as a result of the 2005 program assessment process and serves as both a long term and annual measure. The ultimate objective is to eradicate polio. The previous goal tracked cases of polio, whereas the new goal tracks number of countries with endemic polio.

LONG TERM OBJECTIVE 13.B.2: WORK WITH GLOBAL PARTNERS TO REDUCE THE CUMULATIVE GLOBAL MEASLES-RELATED MORTALITY BY 90% COMPARED WITH 2000 ESTIMATES (BASELINE 777,000 DEATHS) AND TO MAINTAIN ELIMINATION OF ENDEMIC MEASLES TRANSMISSION IN ALL 47 COUNTRIES OF THE AMERICAS.

Measure	FY	Target	Result
13.B.2.1: Number of global measles-related deaths. *(Outcome)*	*2011*	60,000	Dec 31, 2012
	2010	75,000	Dec 31, 2011
	2009	100,000	Dec 31, 2010
	2008	327,600	164,000 (Target Exceeded)
	2007	363,400	197,000 (Target Exceeded)
	2006	399,200	242,000 (Target Exceeded)
13.B.2.2: Number of non-	*2011*	0	Dec 31, 2012

Measure	FY	Target	Result
import measles cases in all 47 countries of the Americas as a measure of maintaining elimination of endemic measles transmission. *(Outcome)*	*2010*	0	Dec 31, 2011
	2009	0	Dec 31, 2010
	2008	0	0 (Target Met)
	2007	0	0 (Target Met)
	2006	0	0 (Target Met)

Unique Identifier	Data Source	Data Validation
13.B.2.1 - 13.B.2.2	WHO, Pan American Health Organization.	A team of WHO epidemiologists and statisticians annually review the estimates using a standardized methodology. This is supplemented with information obtained in national surveillance and program reviews as well as special studies. In addition, WHO works with partners to examine the quality and accuracy of these data.

Long-term Objective 13.B.2, Performance Measure 1

CDC provided scientific, technical, and programmatic support for measles outbreak investigations in Pakistan, Tanzania, Kenya, Sudan, Georgia and the Ukraine; supported reviews of immunization surveillance in the African and Western Pacific regions and a national review in the Republic of the Maldives and the Philippines; helped conduct a review of accelerated measles control activities in the western provinces of China; and evaluated the regional surveillance system for measles, rubella and congenital rubella syndrome in the American and European regions. CDC also contributed funding and or technical assistance to measles immunization campaigns in 23 African countries and to those planned and conducted in Afghanistan, Armenia, Bangladesh, Bhutan, Fiji Indonesia, Pakistan, Yemen, and others. These efforts resulted in recommendations for improved surveillance and control activities and contributed substantially to declines in measles mortality.

Measles has been eliminated from the Western Hemisphere. Outstanding progress has been made towards reducing measles mortality globally. These achievements highlight the technical feasibility of measles mortality reduction. By 2010, CDC and global immunization partners aim to reduce the global measles-related mortality by 90 percent compared with this estimate from 2000. As of 2008, the efforts of CDC's global measles initiative contributed to a reduction of global measles mortality in all ages by 78 percent, from an estimated 733,000 deaths in 2000 to an estimated 164,000 deaths in 2008.

- The regional percent reduction in estimated measles mortality reached the 2010 target of 90 percent in the WHO African Region, Eastern Mediterranean Region, and Western Pacific Region, which accounted for 60, 17, and four percent of the global reduction in measles mortality, respectively.

- As of 2008, out of six WHO regions, only the South East Asian Region did not attain the 90 percent reduction in measles mortality compared to the 2000 estimates: in 2008, it accounted for the majority (77 percent) of estimated measles deaths worldwide.

The model used to generate the preceding year coverage is based on routine and campaign related performance data that is captured by a joint WHO/UNICEF reporting form. WHO and UNICEF convene a panel committee to review this data annually and reach consensus on estimates of disease burden.

Long-term Objective 13.B.2, Performance Measure 2

This performance measure corresponds with the goal adopted by the PAHO for Latin America and the Caribbean. According to available surveillance information, measles transmission has been interrupted in all countries of the Western Hemisphere since November 2002. However, imported measles cases, with limited secondary spread, continue to occur in several countries, including the U.S. Deaths from measles complications in the Americas have virtually disappeared. Globally, measles caused an estimated 164,000 deaths in 2008 and was the leading cause of death among children under five years of age from a vaccine-preventable disease.

GLOBAL MALARIA

LONG TERM OBJECTIVE 13.C: DECREASE THE RATE OF ALL-CAUSE MORTALITY
IN CHILDREN UNDER FIVE IN THE PRESIDENT'S MALARIA INITIATIVE TARGET
COUNTRIES.

Measure	FY	Target	Result
13.C.1: Increase the proportion of children under five years old who slept under an insecticide treated net the previous night PMI target countries. *(Outcome)*	*2011*	85% (median) in 2006 countries	Dec 31, 2011
	2010	NA	NA
	2009	NA	NA
	2008	3rd 6 of 8 countries - Baseline	13.1%
	2007	2nd 4 countries - Baseline	14.5%
	2006	Baseline	16.0%
13.C.2: Increase the proportion of children under five with fever in the previous two weeks that received treatment with antimalarials within 24 hours of onset of their symptoms in PMI target countries. *(Outcome)*	*2011*	85% (median) in 2006 countries	Dec 31, 2011
	2010	NA	NA
	2009	NA	NA
	2008	3rd 6 of 8 countries – Baseline	29.5%
	2007	2nd 4 countries – Baseline	13.4%
	2006	Baseline	32.2%
13.C.3: Increase the proportion of women who have received two or more doses of intermittent preventive treatment during pregnancy (IPTp) among women that have completed a pregnancy in the last two years. *(Outcome)*	*2011*	85% (median) in 2006 countries	Dec 31, 2011
	2010	NA	NA
	2009	NA	NA
	2008	3rd 5 of 8 countries - Baseline	4.9%
	2007	2nd 4 countries – Baseline	30.6%
	2006	Baseline	17.6%

Unique Identifier	Data Source	Data Validation
13.C.1 – 13.C.1	Demographic and Health Surveys (DHS), Multiple Indicator Surveys (MICS), and Malaria Indicator Surveys (MIS).	In sub-Saharan Africa, nationally representative household surveys, like the UNICEF Multiple Indicator Cluster Surveys (MICS) or the MEASURE Demographic and Health Surveys (DHS) conducted by MACRO/Measure Evaluation measure mortality of children less than five as a complement to decadal censuses.

Long-term Objective 13.C, Performance Measure 1

Malaria causes approximately 500 million infections and more than one million deaths annually; most deaths occur in young children. Although one-third of the world's population is at risk for malaria, 90 percent of the cases and deaths occur in sub-Saharan Africa. In the U.S. about 1,500 people get malaria annually, almost all from traveling to countries where malaria is transmitted. In the last decade, 48 people in the United States have died from malaria. The Presidents Malaria Initiative (PMI) supports participating countries to achieve an ultimate goal of a fifty percent reduction in malaria mortality. Eight indicators focus on coverage with four interventions: long-lasting insecticidal bed nets (LLINs); indoor residual spraying with insecticide (IRS); intermittent preventive treatment for pregnant women (IPTp); and prompt treatment with artemisinin-based combination therapy. The mortality burden of malaria is concentrated among children in sub-Saharan Africa. For this reason, studies often focus on mortality among children less than five-years old to assess the impact of malaria control efforts on mortality.

Insecticide Treated Nets (ITNs) are highly effective in killing mosquitoes, and the netting acts as a protective barrier. Consistently sleeping under an ITN can decrease severe malaria by 45 percent, reduce premature births by 42 percent, and cut all-cause mortality by 17 percent to 63 percent. The targets are very ambitious, given the programmatic challenge of overcoming barriers to rapid scale-up of ITN distribution and usage often encountered in resource poor settings with infrastructure challenges.

Long-term Objective 13.C, Performance Measure 2

Malaria causes approximately 500 million infections and more than one million deaths annually; most deaths occur in young children. Although one-third of the world's population is at risk for malaria, 90 percent of the cases and deaths occur in sub-Saharan Africa. In the U.S. about 1,500 people get malaria annually, almost all from traveling to countries where malaria is transmitted. In the last decade, 48 people in the United States have died from malaria. The President's Malaria Initiative (PMI) supports participating countries to achieve an ultimate goal of a fifty percent reduction in malaria mortality. Eight indicators focus on coverage with four interventions: long-lasting insecticidal bed nets (LLINs); indoor residual spraying with insecticide (IRS); intermittent preventive treatment for pregnant women (IPTp); and prompt treatment with artemisinin-based combination therapy. The mortality burden of malaria is concentrated among children in sub-Saharan Africa. For this reason, studies often focus on mortality among children less than five-years old to assess the impact of malaria control efforts on mortality.

Artemisinin-based combination therapy (ACTs) represents the most effective drugs currently available for treating malaria. Three day treatment with ACTs will completely eliminate the malaria parasite from a person's body. The targets are very ambitious in light of programmatic challenges such as overcoming barriers to rapid scale-up of ACT procurement and distribution often in resource poor settings with infrastructure challenges.

Long-term Objective 13.C, Performance Measure 3

Malaria causes approximately 500 million infections and more than one million deaths annually; most deaths occur in young children. Although one-third of the world's population is at risk for malaria, 90 percent of the cases and deaths occur in sub-Saharan Africa. In the U.S. about 1,500 people get malaria annually, almost all from traveling to countries where malaria is transmitted. In the last decade, 48 people in the United States have died from malaria. The President's Malaria Initiative (PMI) supports participating countries to achieve an ultimate goal of a fifty percent reduction in malaria mortality. Eight indicators focus on coverage with four interventions: long-lasting insecticidal bed nets (LLINs); indoor residual spraying with insecticide (IRS); intermittent preventive treatment for pregnant women (IPTp); and prompt treatment with artemisinin-based combination therapy. The mortality burden of malaria is concentrated among children in sub-Saharan Africa. For this reason, studies often focus on mortality among children less than five-years old to assess the impact of malaria control efforts on mortality.

Each year more than 30 million African women living in malaria-endemic areas become pregnant and are at risk for malaria. IPTP protects pregnant women from possible death and anemia and also prevents malaria-related low birth weight in infants, which is responsible for between 100,000 and 200,000 infant deaths annually in Africa. The targets are very ambitious in light of programmatic challenges such as overcoming barriers to rapid scale-up of IPTp implementation often in resource poor settings with infrastructure challenges.

AFGHAN HEALTH INITIATIVE

LONG TERM OBJECTIVE 13.D.1: BY 2008, REDUCE BY 20% THE NUMBER OF MATERNAL AND NEONATAL DEATHS IN AFGHANISTAN. THE OVERALL PURPOSE OF THE PROGRAM IS TO ACHIEVE THE LONG TERM GOAL BY IMPROVING THE SKILLS AND TRAINING OF THE HOSPITAL STAFF.

Measure	FY	Target	Result
13. D.1.1: The in-hospital mortality rate per 100,000 caesarian sections at Rabia Balkhi Women's Hospital (RBH) in Kabul, Afghanistan. *(Outcome)*	*2011*	100	Feb 26, 2012
	2010	105	Feb 26, 2011
	2009	110	117
	2008	120	157
	2007	130	129.5
	2006	170	136.5
	2005	140	146
13. D.1.2: The percent of trainees enrolled in courses. *(Output)*	*2010*	99%	Feb 26, 2011
	2009	99%	98%
	2008	85%	95%
	2007	80%	99%
	2006	50%	70%
	2005	40%	60%
13. D.1.3: The time to hire and deploy essential staff trainers. *(Output)*	*2010*	1.5 mos	Feb 26, 2011
	2009	2 mos	2 mos
	2008	2.5 mos	2 mos
	2007	3 mos	4.5 mos
	2006	2.5 mos	4.2 mos
	2005	2 mos	3 mos
13. D.1.4: The percentage of staff trainers who fulfill the agreed upon in-country contract. *(Output)*	*2010*	95%	Feb 26, 2011
	2009	95%	93%
	2008	92%	90%
	2007	89%	87.5%
	2006	40%	85%
	2005	60%	80%
13. D.1.5: The rate of fetal deaths occurring during labor or delivery among newborns who weigh at least 2500 grams at birth at Rabia Balkhi Women's Hospital in Kabul, Afghanistan per 1,000 such births. *(Outcome)*	*2011*	4.8	Feb 26, 2012
	2010	5.2	Feb 26 , 2011
	2009	5.8	3.4
	2008	6.0	14.3
	2007	6.3	7.8
	2006	5.8	8.7
	2005	4.8	5.2
13. D.1.6: The newborn pre-discharge mortality rate for Babies weighing at least 2500 grams at birth at Rabia Balkhi Women's Hospital in Kabul, Afghanistan per 1,000 births. *(Outcome)*	*2010*	1.8	Feb 26, 2011
	2009	1.9	1.9
	2008	2.0	1.9
	2007	2.2	2.50
	2006	2.2	2.54
	2005	2.0	2.2
13. D.1.7: The percentage of nurse midwives at Rabia Balkhi Women's Hospital (RBH) who meet the selected competency	*2010*	95%	Feb 26, 2011
	2009	92%	90%
	2008	88%	80%
	2007	85%	71%
	2006	50%	75%

Measure	FY	Target	Result
measures of the 37 Afghanistan Standards of Practice. *(Outcome)*	*2005*	30%	40%
13. D.1.8: The percentage of women who have a caesarean section delivery who subsequently develop a post-operative infection at Rabia Balkhi Women's Hospital in Kabul, Afghanistan. *(Outcome)*	*2011*	2.0%	Feb 26, 2012
	2010	2.2%	Feb 26, 2011
	2009	2.4%	4%
	2008	2.7%	4%
	2007	3.0%	1.8%
	2006	3.0%	6.3%
	2005	2.8%	3.75%

Unique Identifier	Data Source	Data Validation
13.D.1.1	Rabia Balkhi Women's Hospital (RBH)	Surveillance Data
13.D.1.2	International Medical Corps (IMC)	Annual Report
13.D.1.3	IMC	Annual Report
13.D.1.4	IMC	Annual Report
13.D.1.5	RBH	Surveillance Data
13.D.1.6	RBH	Surveillance Data
13.D.1.7	IMC	Annual Report
13.D.1.8	RBH	Surveillance Data

Programmatic direction of the Afghan Health Initiative (AHI) is under review presently in light of its transition from the Office of Global Health Affairs (OGHA) to CDC; therefore, the appropriateness and applicability of the current measures will undergo a review as well. Pending decisions, CDC anticipates the proposal of new and/or modified measures to more accurately reflect the performance of current and future programmatic activities.

Long-term Objective 13.D.1, Performance Measure 1

Maternal Mortality/100,000 C-Sections is a measure of the excess mortality related to the CS system and an indicator of the "quality" of the CS. This is and continues to be an important measure because of the high rate of maternal deaths prior to CDC involvement and AHI intervention. The interventions carried out under the AHI have reduced the maternal death rate (MDR) and is continuing to focus on reducing the MDR at RBH associated with C-sections. An important indicator of the success of this intervention is that with an increase in the number of C-sections performed, associated mortality has not increased.

The increase in the number maternal deaths associated with C-sections performed over time will suggest, among other things, any improvement or not in the "quality" of the C-section system. The C-section includes all activities, equipment, pharmaceuticals, etc. associated with the preparation, performance and follow up of a C-section.

Setting numerical targets is not always suited to every situation. Suffice it say, that interventions are underway and planned to reduce maternal deaths under this measure, buy "measuring" and observing the C-section system to identify "gaps" in quality and make suitable improvements. Data would suggest that progress is being made due to the longstanding professional relationships with the director of RBH and her staff, the Ministry of Public Health (MOPH) other donors and international organizations, and that we have been engaged with RBH from the AHI inception in 2003.

Long-term Objective 13.D.1, Performance Measure 2

This measure is anticipated to be proposed for retirement, as the grant with which this indicator is linked in no longer in effect. When the cooperative agreement was active, this measure counted the number of

people enrolled in any given course. This measure was important because a significant part of the public health burden to RBH and the greater MOPH health delivery system was the absence of sufficient numbers of trained HC providers and trained trainers. The past intervention of the grantee was very successful as indicated by the actual percentage of enrolled trainees at both RBH and within the greater MOPH HC system. From 60 percent to 98 percent of trainees actually attended a course over the past five years.

Long-term Objective 13.D.1, Performance Measure 3

This measure was also associated with the grant discussed above and is anticipated to be proposed for retirement. Measuring the amount of time required by the grantee to hire and assign trainers was a significant accomplishment over time because of the dire need on the part of RBH and the greater MOPH health care system for trained healthcare professional staff. The grantee successfully met this challenge by providing adequate numbers and in a timely manner by greatly reducing the time lag associated with hiring and deploying important and much needed professional health care staff for RBH and the greater MOPH HC system. Data suggests a reduction over time in the amount of time it took to recruit and deploy essential staff trainers.

Long-term Objective 13.D.1, Performance Measure 4

This measure was also associated with the grant discussed above and is anticipated to be proposed for retirement. The measure indicated the degree to which those hired under a contract by the grantee, completed the contract. The data suggests that steady improvement was made over the past five years, improving from 80 – 98 percent.

Long-term Objective 13.D.1, Performance Measure 5

This measure is a measure of several things: The quality, if any of the antenatal care, the health of the mother, the baby, the care during labor, delivery and follow up. Twenty-five hundred grams or greater is considered a full-term baby and suggests a positive outcome baring any complications on the part of the mother, her baby and attending health providers and their support system. An excess of mortality suggests that a closer look be taken at the cases whose outcome is not positive for either the mother or her baby.

Past performance indicates an improvement in the reduction of fetal deaths. This is due in part to several interventions. The implementation of quality assurance principles to identify gaps in performance is one. Others include training, demonstrate-by-doing, (each one teach one), and reducing the decision-to-incision time. Targets are adjusted in small increments and cautiously due to the complex nature of variables associated with a successful or negative outcome in the delivery of a full-term baby.

This measure is proposed for revision as programmatic direction is determined.

Long-term Objective 13.D.1, Performance Measure 6

This measure is anticipated to be proposed for retirement as the impact is best delineated by measure 1.5: "The rate of fetal deaths occurring during labor or delivery among newborns who weigh at least 2500 grams at birth at Rabia Balkhi Women's Hospital (RBH) in Kabul, Afghanistan per 1,000 such births." Which itself would benefit from a very small modification. This was a measure of a significant public health burden at RBH prior to AHI and CDC involvement. The PD Mortality Rate for full-term babies has been reduced as a result of this intervention. The AHI remains an important intervention and activity at RBH and within the MOPH. Quality assurance principles were engaged in the effort to identify areas in need of improvement surrounding PDMR and made appropriate and timely improvements resulting in a reduction of PDMR. The targets and results have varied some over time from a high of 2.2 to a low of 1.9.

Long-term Objective 13.D.1, Performance Measure 7

This measure was also associated with the grant discussed above and is anticipated to be proposed for retirement. It measures the competency of trained nurse midwives as measured against MOPH Standards of Practice. A high of 90 percent in 2009 compared to the low of 40 percent in 2005 represents progress over the course of five years.

Long-term Objective 13.D.1, Performance Measure 8

This is a measure of the quality of infection control as part of the C-section system. The presence of post-op infection suggests a closer look at infection control techniques including instruments, draping, hands and other related aspects. Steady progress has been made over time in spite of fluctuations in funding, the dynamics of security status of Kabul and a multitude of uncertainties associated with working in the region. This measure is anticipated to be proposed for modification, yet continue to reflect infection control as an indicator of quality health care.

PUBLIC HEALTH IMPROVEMENT AND LEADERSHIP

OFFICE OF MINORITY HEALTH AND HEALTH DISPARITIES

LONG TERM OBJECTIVE 14.B.1: PREPARE MINORITY, MEDICAL, VETERINARY, PHARMACY, UNDERGRADUATE, AND GRADUATE STUDENTS FOR CAREERS IN PUBLIC HEALTH.

Measure	FY	Target	Result
14.B.1.1: Increase the number of minority students participating in the Hispanic Serving Health Professions Internship and Fellowships Program, Ferguson Emerging Infectious Disease Fellowship Program, Public Health Summer Fellowship Program, Research Initiatives for Student Enhancement (RISE) and Project IMHOTEP. *(Output)*	*2011*	95	Dec 31, 2011
	2010	95	Dec 31, 2010
	2009	95	112 (Target Exceeded)
	2008	95	112 (Target Exceeded)
	2007	87	106 (Target Exceeded)
	2006	87	106 (Target Exceeded)

Unique Identifier	Data Source	Data Validation
14.B.1.1	Administrative records identifying the number of interns and fellows	Data quality assurance is measured by review of quarterly and annual program progress reports.

Long-term Objective 14.B.1, Performance Measure 1

In FY 2009, the target was exceeded because of programs with Kennedy Krieger Institute/RISE, and Morehouse College/IMHOTEP programs which provided opportunities for 17 additional students. Although the trend of exceeding the target has been consistent for the past four years, the target will not be set upward because additional dollars to expand programs are not expected. Additionally, supplemental funding from other CDC programs to support minority student internships is increasingly difficult to identify.

LONG TERM OBJECTIVE 14.B.2: SUPPORT HBCUS, HISPANIC SERVING INSTITUTIONS, AND TRIBAL COLLEGES AND UNIVERSITIES (TCUS).

Measure	FY	Target	Result
14.B.2.1a: Maintain the number of funding mechanisms and increase the number of minority-serving institutions and TCUs receiving support. Cooperative agreements *(Output)*	*2011*	4	Dec 31, 2011
	2010	4	Dec 31, 2010
	2009	4	4 (Target Met)
	2008	4	4 (Target Met)
	2007	4	4 (Target Met)
	2006	4	4 (Target Met)
14.B.2.1b: Maintain the	*2011*	52	Dec 31, 2011

Measure	FY	Target	Result
number of funding mechanisms and increase the number of minority-serving institutions and TCUs receiving support. Schools *(Output)*	2010	52	Dec 31, 2010
	2009	52	52 (Target Met)
	2008	50	50 (Target Met)
	2007	47	48 (Target Exceeded)
	2006	47	48 (Target Exceeded)

Unique Identifier	Data Source	Data Validation
14.B.2.1	Administrative records of the number of cooperative agreements funded and institutions supported	Data quality assurance is measured by review of quarterly and annual program progress reports.

Long-term Objective 14.B.2, Performance Measure 1

In FY 2009, a total of 52 schools were reached, meeting the target.

LONG TERM OBJECTIVE 14.B.3: ENHANCE AMERICAN INDIAN/ALASKAN NATIVE (AI/AN) ACCESS TO CDC PROGRAMS AND RESOURCES AND FOSTER A STRONGER COLLECTIVE DEPARTMENTAL PERSPECTIVE ON AI/AN ISSUES.

Measure	FY	Target	Result
14.B.3.1: Participate in the HHS National and Regional Tribal Consultation Sessions to strengthen CDC and HHS partnerships with tribes to accelerate health impact and address health disparities in AI/AN populations. *(Output)*	2011	Hold 3 Tribal consultations	Oct 31, 2010
	2010	Hold 3 tribal consultations	Oct 31, 2010
	2009	Hold 3 tribal consultations	Held 3 tribal consolations (Target Met)
	2008	Hold 3 tribal consultations	Held 3 tribal consultations (Target Met)
	2007	Baseline	Hold 2 tribal consultations
14.B.3.2: Maintain support for, and effective communication with the CDC/ATSDR Tribal Consultation Advisory Committee (TCAC). *(Output)*	2011	Hold 2 meetings and act on 5 tribal recommendations	Oct 31, 2011
	2010	Hold 2 meetings and act on 5 tribal recommendations	Oct 31, 2010
	2009	Hold 2 meetings and act on 5 tribal recommendations	Held 3 TCAC meetings and act on 12 tribal recommendations (Target Exceeded)
	2008	Hold 4 meetings and act on 5 tribal recommendations	Held 5 meetings and acted on 10 recommendations (Target Exceeded)
	2007	Baseline	Held 4 meetings and acted on 2 tribal recommendations (Target Met)
14.B.3.3: Categorize, systematically monitor, and critically assess CDC resources allocated to programs that directly benefit AI/AN people and	2011	2 Interagency Agreements	Oct 31, 2011
	2010	2 Interagency Agreements	Oct 31, 2010
	2009	2 Interagency Agreements	Maintained 2 IAAs (Target Met)
	2008	2 Interagency Agreements	Maintained 2 IAAs (Target Met)

Measure	FY	Target	Result
communities. *(Output)*	*2007*	Baseline	Maintained 2 IAAs and attended 2 meetings of each council (Target Met)
14.B.3.4: Participate and support the Interagency Agreement for the Intradepartmental Council on Native American Affairs and the HHS AI/AN Research Council. *(Output)*	*2011*	Attend 2 meetings of each council	Oct 31, 2011
	2010	Attend 2 meetings of each council	Oct 31, 2010
	2009	Attend 2 meetings of each council	Attended 2 meetings of each council (Target Met)
	2008	Attend 2 meetings of each council	Attended 2 meetings of each council (Target Met)
	2007	Baseline	Maintain 2 IAAs and attend 2 meetings of each Council

Unique Identifier	Data Source	Data Validation
14.B.3.1	Documented participation and consultation with AI/AN tribes and tribal organizations at regional or national consultation sessions or meetings, official meeting summaries, and TCAC recommendations to CDC leadership, reports from CDC funded projects and documented activities or collaborative efforts, and CDC Financial Management Office tracking of resources allocated to AI/AN tribal programs.	Data quality assurance is measured by review of TCAC and CDC Biannual Tribal Consultation meeting summaries, and CDCs Annual Tribal Budget and Consultation Report to OS/HHS, and documented outcomes of key program activities.
14.B.3.2	Documented participation and consultation with AI/AN tribes and tribal organizations at TCAC Meetings, HHS regional or national consultation sessions, CDC Biannual Tribal Consultation Sessions, and other tribal meetings which CDC participates in per invitation of individual tribes or tribal organizations/consortia or official meeting summaries.	Data quality assurance is measured by review of TCAC meeting summaries, meeting summaries of any AI/AN tribal meeting, TCAC official communication to CDC leadership, and documented agency response to TCAC recommendations shared internally and externally with AI/AN stakeholders and the OS/HHS.
14.B.3.3	Documented participation and consultation with AI/AN tribes and tribal organizations at regional or national consultation sessions or meetings, official meeting summaries, reports from CDC National Centers/Divisions and funded projects, and the Financial Management Office tracking of resources allocated to AI/AN tribal programs.	Data quality assurance is measured by review of ICNAA and HRAC Meetings, TCAC meeting summaries, and CDCs Annual Tribal Budget and Consultation Report to OS/HHS, as well as documented outcomes of key program activities.
14.B.3.4	Documented participation and consultation with HHS-sponsored councils.	Data quality assurance is measured by review of biannual council meeting summaries.

Long-term Objective 14.B.3, Performance Measure 1

In FY 2009, CDC met the performance target by holding three agency-wide tribal consultations meetings. In addition, NCHHSTP and three Divisions of NCCDPHP (Division of Diabetes Translation, Division of Cancer Prevention and Control, and the Office of Smoking and Health) held focused categorical consultations that complemented the agency-wide consultations. The consultations have resulted in increased participation of both Tribal and CDC American Indian/Alaska Native (AI/AN) stakeholders and increased tribal access and knowledge of CDC programs.

The Office of the Chief of Public Health Practice/Office of Minority Health and Health Disparities has continued to provide guidance and technical assistance to National Centers and Offices in their efforts and engagement of AI/AN entities to ensure agency-wide adherence to CDC and HHS tribal consultation policies and facilitate consultation with state partners in the tribal/state/ federal dialogue and collaborations. CDC participated in the HHS National Budget and Consultation session and four HHS regional consultation sessions. These Consultation Sessions are assisting CDC to understand the scope

and difficult realities tribal nations are facing. Consultations have provided the opportunities for meaningful dialogue between tribal leadership and CDC leadership resulting in new initiatives, programs, and collaborations to address public health needs while maintaining CDCs commitment to uphold the tenets of Tribal consultation and positively impact the health of AI/AN people. CDC has listened to tribal testimonies and responded by releasing new funding opportunities and increasing tribal access to subject matter experts to provide technical assistance in addressing specific needs. CDC is becoming a known and trusted public health partner to AI/AN tribes and organizations and is working collaboratively across the department to maximize resources benefitting the Tribes.

Long-term Objective 14.B.3, Performance Measure 2

In FY 2009, CDC exceeded the target, as the agency engaged TCAC (CDC's federal advisory committee). TCAC recommended CDC decrease the meeting frequency from this point in time on. TCAC requested CDC to decrease the number of meetings held per year to allow more time and emphasis by the agency to increase response and actions to their recommendations. Meeting frequency was changed to two meetings per year rather than quarterly. This allowed CDC to act on 12 recommendations because of increased attention to issues presented. In 2007 when the TCAC was established, most tribes knew very little about the depth and breadth of CDC programs. Tribes felt that CDC was doing little to address public health needs affecting the Native population. At the regional HHS consultations, only limited time was allocated for CDC to consult and dialogue with Tribes. The establishment of TCAC has allowed CDC and elected tribal leadership to have a re-occurring venue to dialogue and inform each other and collaboratively discuss the use of CDCs scientific research, expertise, and resources to develop public health practices to decrease long term health disparities (such as cancer morbidity, diabetes, tobacco, SIDS deaths, unintentional injuries) disproportionally affecting Tribes. The TCAC also helps to ensure that CDC activities or policies that affect tribal communities are brought to the attention of tribal leaders and, through its recommendations to CDC, serves to facilitate collaboration across the agency on a continuum of prevention and health protection actions that support CDC ability to protect the nation's health. The TCAC held three meetings in FY 2009 to increase the connectivity and knowledge between CDC and tribal leaders (Nov. 18-20, 2008; Feb. 10-12, 2009; and August 11-13, 2009). The TCAC submitted recommendations to the CDC to inform and request additional actions to address critical public health issues in Indian country. CDC provides a progress report on actions taken in response to TCAC recommendations at each meeting. Complete documentation of these meetings and a summary of TCAC recommendations and response is posted and available on OMHD website (http://www.cdc.gov/omhd/Populations/AIAN/AIAN.htm) Some accomplishments from consultations are: increased transparency about CDC budget so that tribes can see resource allocations stratified by categorical areas of high priority to them, provided at least annually a technical assistance training by the Procurements and Grants Office to assist AI/AN stakeholders in competing for funding, established standardized language specifying tribal eligibility in all funding opportunity announcements, and monitoring multiple programs such as those related to Smoking, Cancer, Diabetes, and Unintentional Injuries to maintain and/or increase funding for tribes as well as collect some AI/AN best practices.

Long-term Objective 14.B.3, Performance Measure 3

In FY 2009, CDC met the target by maintaining two interagency agreements between HHS/OS/Intergovernmental affairs and HHS/Office of Minority Health. CDC contributes to the funding and execution of the agreements. One agreement supports the activities of the Interdepartmental Council on Native American Affairs (ICNAA) to improve access to and effective use of federal resources available to AI/AN Tribes. The other agreement supports the activities of the AI/AN Health Research Advisory Council (HRAC) to serve as a formal avenue through which the Department gathers tribal input on health research matters and research priorities and needs as well as how best to carry out health research involving AIs/ANs. Through the HRAC, HHS and tribal representatives strive to better communicate and coordinate the work in AI/AN health research to their respective agencies and tribes

and/or communities to improve the conduct and application of research findings. Since FY 2006, CDC has managed its fiscal and personnel resources in a manner that maximizes impact on the health and safety of AI/AN people, accurately monitor CDC resources allocated to benefit AI/AN communities, and make this information readily available to tribal leaders. CDC uses a portfolio management approach to its resources devoted to AI/AN health issues. This approach improves how CDC tracks and displays its AI/AN resource commitments and enables CDC to more closely monitor funds distributed to state health departments via CDC grants and cooperative agreements to help ensure that AI/AN communities receive appropriate benefit from these funds. CDC estimates its total FY 2009 resource allocation for AI/AN programs to be approximately $163 million. The total figure represents a 66 percent increase compared to AI/AN allocations in FY 2008; an increase that is consistent with an overall increase in VFC funds received by CDC in FY 2009. The annual reports produced from this data have enhanced accountability and increased transparency regarding how CDC programs and resources are made available to AI/AN populations.

Long-term Objective 14.B.3, Performance Measure 4

In FY 2009, CDC continued to support and participate actively in HHS-sponsored councils and committees to collaborate more effectively with other agencies to maximize resources and increase tribal access to CDC and HHS programs.

LONG TERM OBJECTIVE 14.B.4: SUPPORT AND STRENGTHEN CAPACITY DEVELOPMENT STRATEGIES OF EXISTING NATIONAL AND REGIONAL MINORITY ORGANIZATIONS.

Measure	FY	Target	Result
14.B.4.1: Increase the number of national and regional public health collaborations with public health agencies/organizations serving minority and AI/AN communities. *(Output)*	*2011*	100	Oct 31, 2011
	2010	230	Oct 31, 2010
	2009	100	240 (Target Exceeded)
	2008	100	240 (Target Exceeded)
	2007	85	240 (Target Exceeded)
	2006	Baseline	477 (Target Exceeded)
14.B.4.2: Identify program and organizational infrastructure needs (i.e., policy analysis, program assessment and development, and evaluation) of public health agencies/organizations serving minority communities and provide technical assistance to improve the health status and access to programs for racial and ethnic minority populations. *(Output)*	*2011*	250	Oct 31, 2011
	2010	250	Oct 31, 2010
	2009	100	240 (Target Exceeded)
	2008	100	240 (Target Exceeded)
	2007	85	240 (Target Exceeded)
	2006	Baseline	477

Unique Identifier	Data Source	Data Validation
14.B.4.1 - 14.B.4.2	The number of collaborative efforts, documented activities, and products	Data quality assurance is measured by review of quarterly and annual program progress reports, and documented outcome of key program activities.

Long-term Objective 14.B.4, Performance Measure 1

Programs funded under this measure support national and/or regional initiatives to develop, expand, and enhance health promotion, educational, and community-based programs targeting racial and ethnic populations. The seven cooperative agreements awarded to support and strengthen existing NMOs/RMOs that engage in health advocacy, promotion, education and preventive health care with the intent of improving the health and well-being of racial and ethnic minority populations have led to collaborations and technical assistance that benefited 240 entities.

Long-term Objective 14.B.4, Performance Measure 2

In FY 2008, CDC and its cooperative agreement recipients worked with 240 partner entities to indentify and help meet their analytic and program management needs. The target was exceeded for reasons explained in 14.B.4.1. Programs funded under this measure support national and/or regional initiatives to develop, expand, and enhance health promotion, educational, and community-based programs targeting racial and ethnic populations. The seven cooperative agreements awarded to support and strengthen existing NMOs/RMOs that engage in health advocacy, promotion, education and preventive health care with the intent of improving the health and well-being of racial and ethnic minority populations have led to collaborations and technical assistance that benefited 240 entities.

PUBLIC HEALTH WORKFORCE DEVELOPMENT

LONG TERM OBJECTIVE 14.D.1: CDC WILL DEVELOP AND IMPLEMENT TRAINING TO PROVIDE FOR AN EFFECTIVE, PREPARED, AND SUSTAINABLE HEALTH WORKFORCE ABLE TO MEET EMERGING HEALTH CHALLENGES.

Measure	FY	Target	Result
14.D.1.1: Maintain the number of recruits who join public health programs in local, state, and federal health departments to participate in training in epidemiology or public health leadership management. *(Output)*	*2011*	200	Dec 31, 2011
	2010	200	Dec 31, 2010
	2009	200	198 (Target Not Met)
	2008	200	203 (Target Exceeded)
	2007	200	205 (Target Exceeded)
	2006	200	206 (Target Exceeded)

Unique Identifier	Data Source	Data Validation
14.D.1.1	Currently, data are based on the number of core-funded fellows (EIS, PHPS, and PMR/F).	Staff reviews and validates data through the Public Health Workforce Development programs personnel system.

Long-term Objective 14.D.1, Performance Measure 1

CDC continues to train professional staff to address public health workforce gaps and meet challenges affecting the health of the public through its Epidemic Intelligence Service (EIS), Preventive Medicine Residency and Fellowship (PMR/F), and the Public Health Prevention Service (PHPS).

The FY 2009 result was slightly lower than target with fewer EIS officers and PHPS prevention specialists supported with core-funding in 2009. Several factors affected the decrease in the target. Also in 2009, core funding had to be used to cover the continuation of two new fellowships (initiated in 2008) as required by the CDC Director. Costs associated with trainees account for more than 80 percent of expenditures for these fellowships; many indirect costs, such as training and travel, in addition to salaries and benefits are incurred in administering the fellowship programs.

The number of core-funded recruits in public health programs participating in epidemiology or public health leadership and management has dropped ten percent during the past five years, from a high of 221 in 2004 to a low of 198 in 2009. One reason for the reported decline is that the number of PMR applications has declined for several years, resulting in fewer residents and fellows during the past three years. Another reason for the reported decline is that the number of core-funded EIS officers has decreased as the number of officers funded with preparedness and emergency response funds has increased. Preparedness and Response funds, as well funds from the Applied Epidemiology Fellowship Training line, have allowed the Public Health Workforce Development program to continue to train the same number of EIS officers each year.

To help track and report progress toward accomplishing this long-term objective, CDC is developing and implementing the Fellowship Management System, an electronic system designed to improve monitoring and tracking of fellows in 10 cross-cutting fellowship programs. CDC also is researching the development of new fellowships designed to address the public health needs of the increasingly diverse U.S. population.

Note: In FY 2007, the FY 2004 result was revised from 258 to 221 to reflect fellows that were core-funded in FY 2004. The previous result inadvertently included EIS officers funded with non-core funds (e.g., Bioterrorism, Food Safety). Additionally, the FY 2005 through FY 2010 targets have been revised to remain constant, due to the creation of the Office of Workforce and Career Development (OWCD) in 2004 and uncertainty about the programs' ability to increase the number of health professionals recruited and trained.

LONG TERM OBJECTIVE 14.D.2: INCREASE THE NUMBER OF FRONTLINE PUBLIC HEALTH WORKERS AT THE STATE AND LOCAL LEVEL THAT ARE COMPETENT AND PREPARED TO RESPOND TO BIOTERRORISM, INFECTIOUS DISEASE OUTBREAKS, AND OTHER PUBLIC HEALTH THREATS AND EMERGENCIES; AND PREPARE FRONTLINE STATE AND LOCAL HEALTH DEPARTMENTS AND LABORATORIES TO RESPOND TO CURRENT AND EMERGING PUBLIC HEALTH THREATS.

Measure	FY	Target	Result
14.D.2.1: Evaluate the impact of training programs conducted by the NLTN on laboratory practices. *(Output)*	*2011*	More than 50% of public health and clinical laboratorians attending NLTN Public Health Series hands-on laboratory training updated and improved practices as a result of the course.	Dec 31, 2011
	2010	More than 65% of public health and clinical laboratorians attending biosecurity and biosafety NLTN courses who reported lacking practices for protection of individuals, security of assets and information, or training/practice drills added these practices or modified current practices as a result of the course.	Dec 31, 2010
	2009	More than 40% of public health and clinical laboratorians attending biosecurity and biosafety NLTN courses who reported lacking practices for protection of individuals, security of assets and information, or training/practice drills added these practices or modified current practices as a result of the course.	90% (Target Exceeded)
	2008	More than 40% of public health and clinical laboratorians attending biosecurity practice NLTN courses who reported lacking practices for physical security/access control, information security and training/practice drills added these practices or modified current practices as a result of the course.	51% (Target Met)

Measure	FY	Target	Result
	2007	More than 40% of public health and clinical laboratorians attending <u>biosecurity</u> practice NLTN courses who reported lacking practices for physical security/access control, information security and training/practice drills added these practices or modified current practices as a result of the course.	51% (Target Met)
	2006	90% of the public health and clinical laboratorians attending NLTN courses can correctly handle, process, or identify potential disease agents.	90% (Target Met)

Unique Identifier	Data Source	Data Validation
14.D.2.1	Data for the FY 2006FY 2010 targets are related to laboratory safety and security. The data are collected following each course, reviewed, and evaluated by a statistician.	Data are reviewed by the CDC Training Advisor responsible for the course. Collective data are checked quarterly.

Long-term Objective 14.D.2, Performance Measure 1

The National Laboratory Training Network (NLTN) provides cost-effective, high-quality continuing education in the laboratory sciences. During FY 2009, the NLTN trained more than 45,000 public health and clinical laboratorians in more than 240 courses via hands-on workshops, seminars, online and computer-based courses, audioconferences, and webcasts. During FY 2008, the NLTN also trained more than 45,000 laboratorians in 250 classes. NLTN training courses are developed based on documented training needs and delivered in collaboration with state public health laboratories. Course topics include bioterrorism and chemical terrorism preparedness; safe packaging and shipping of diagnostic and infectious agents; biosafety and biosecurity; antimicrobial susceptibility testing; infectious disease testing, mycology, foodborne illness, parasitology, and pandemic influenza preparedness. All training events are evaluated to ensure that the defined learning objectives were met, an appropriate level of knowledge was gained, or a measurable improvement in laboratory practice or performance was reported.

The performance targets for FY 2007 and FY 2008 specifically addressed improvement of laboratory biosecurity practices as a result of training. Statistical analysis of the evaluation data showed that 51 percent of the course attendees indicated a positive change in biosecurity policy or practice after attending the course. The wording for the FY 2009 performance target was modified to incorporate training enhancements for biosafety and biosecurity practices based upon a needs assessment process. Statistical analysis of the FY 2009 data showed that 90 percent of the course attendees indicated a positive change in either biosafety or biosecurity policy or practice after attending the course.

The performance target for 2010 has been modified to reflect the greater training impact observed in the improved training course. A positive training impact is now projected for at least 65 percent of the course attendees in FY 2010. The 65 percent target represents a significant increase over 40 percent targets for previous years. With only one year of data for the improved training course at the 90 percent level, it is premature to establish a FY 2010 target at that level.

After 2010, fewer biosafety and biosecurity courses will be offered due to training saturation of public health laboratory staff. In FY 2011, the performance target will shift from the biosafety and biosecurity focus of previous years to NLTN's public health series courses. These courses provide intensive hands-on training in critical public health laboratory areas such as rabies, foodborne illness, influenza, micobacteriology, virology, parasitology, mycology, select agents, vaccine-preventable diseases, and

other infectious diseases. The intensive transfers of laboratory techniques and practices are unique to NLTN and provide core laboratory training for public health scientists of all experience levels.

BUILDINGS AND FACILITIES

LONG TERM OBJECTIVE 15.E: ACHIEVE ENERGY/WATER REDUCTION AND INCREASED SUSTAINABILITY.

Measure	FY	Target	Result
15.E.3: Reduce Energy and Water consumption. Implement high performance energy and water sustainability requirements. *(Efficiency)*	2011	18% (E); 8% (W)	Dec 31, 2011
	2010	15% (E); 6% (W)	Dec 31, 2010
	2009	12% (E); 4% (W)	20.9%(E); 4.4%(W) (Target Exceeded)
	2008	9% (E); 2% (W)	16.7% (E); 2.4% (W) (Target Exceeded)
	2007	6% (E); Baseline - Water	12.6% (E); 0% (W)
15.E.4: Incorporate sustainable practices in building construction, repair, renovation, and modernization projects, according to the Guiding Principles for High Performance and Sustainable Federal Buildings. *(Efficiency)*	2011	7%	Dec 31, 2011
	2010	5%	Dec 31, 2010
	2009	4%	19.4% (Target Exceeded)
	2008	3%	3% (Target Met)
	2007	Baseline	0%

Unique Identifier	Data Source	Data Validation
15.E.3	Energy electrical metering, utility bills, Water water metering, water bills; Sustainability HHS Assessment, Appendix H and Appendix G for new facilities.	Manual processes to verify calculations.
15.E.4	Sustainability HHS Assessment, Appendix H and Appendix G for new facilities.	Sustainability through third party verification from Green Globe and LEEDs

Efficiency Measure 15.E.3:

This measure provides goals for current/future energy reduction and the incorporation of sustainable practices for CDC constructed assets. Energy goals reduce costs, reduce environmental impact, and increase availability of energy sources for other users. Incorporation of sustainable practices ensures implementation of integrated design principles, increased energy efficiency, protection and conservation of water, enhancement of indoor air quality, and minimizes environmental impact of materials. Steam, water (gal), and power (kwhd) are metered and measured per EISA 2007 for each government facility. The Energy Independence and Security Act (EISA) of 2007 requires comprehensive energy and water evaluations for 25 percent of facilities annually. The evaluations are conducted in a manner that ensures the total facility is evaluated every four years. The target setting methodology is to reduce energy consumption by three percent every year from the 2005 baseline for a 30 percent reduction in energy use by 2015. Water usage is targeted to be reduced by two percent per year from the 2007 baseline to a 16 percent reduction in water usage by 2015. Assets built with sustainable practices, as per the Guiding Principles for High Performance and Sustainable Federal Buildings, will account for at least 15 percent of CDC aggregate assets by 2015. Regular Assessments are made on sustainable practices utilized by CDC buildings. HHS Assessment, Appendix H is used for assessing existing facilities and Appendix G is used for assessing new construction and major renovations.

Past performance has been significant in the area of reducing energy and water consumption by 20 percent from a 2003 baseline (previous measure). Energy trend data is consistent with the level and type of portfolio growth. The energy and water targets are very ambitious and metric requirements do not take into account programmatic growth in asset, utilization, mission, etc. The reduction requirement also does not take into account energy use density based on the type and age of facility and technology. The CDC asset management plan included the construction of many significant new buildings within recent years. These buildings have already appreciably contributed to the reduction of energy and water consumption, making additional targets of two percent water and three percent energy reductions per year difficult. These buildings are already outperforming similar buildings.

CDC's specific mission for disease control requires construction of state-of-the-art laboratory facilities. Such facilities have specific material and system design requirements, making the incorporation of all of the sustainable practices and the further reduction of energy and water consumption difficult to implement. Increased metering will be installed to measure energy consumption at the building level. Energy savings equipment will be specified for new and existing buildings. The Guiding Principles for High Performance and Sustainable Federal Buildings has been incorporated into the CDC Design and Construction Standards. The result is that the Guiding Principles will be incorporated, as per the DHHS Policy for Sustainable and High Performance Buildings, in all projects to the greatest extent possible. Existing building assessments will be performed to determine opportunities for sustainable improvements of existing facilities as well as opportunities for energy and water use improvements. CDC exceeded the Performance Measure targets for 2009 by increasing the reductions in energy and water usage.

Efficiency Measure 15.E.4:

Incorporation of sustainable practices ensures implementation of integrated design principles, increased energy efficiency, protection and conservation of water, enhancement of indoor air quality, and minimizes environmental impact of materials. Assets built with sustainable practices, as per the Guiding Principles for High Performance and Sustainable Federal Buildings, will account for at least15 percent of CDC aggregate assets by 2015. Regular Assessments are made on sustainable practices utilized by CDC buildings. HHS Assessment, Appendix H is used for assessing existing facilities and Appendix G is used for assessing new construction and major renovations. The requirement for implementation of sustainable practices is fairly recent, but CDC was proactive in incorporating sustainable practices into several building projects before this requirement came into effect. Two buildings have received Leadership in Energy and Environmental Design (LEED) ratings, and another building is currently in review for either LEED silver or gold rating.

CDC's specific mission for disease control requires construction of state-of-the-art laboratory facilities. Such facilities have specific material and system design requirements, making the incorporation of all of the sustainable practices and the further reduction of energy and water consumption a challenge to implement.

The Guiding Principles for High Performance and Sustainable Federal Buildings has been incorporated into the CDC Design and Construction Standards. The result is that the Guiding Principles will be incorporated, as per the DHHS Policy for Sustainable and High Performance Buildings, in all projects to the greatest extent possible. Existing building assessments will be performed to determine opportunities for sustainable improvements of existing facilities as well as opportunities for energy and water use improvements.

CDC continues to meet the targets for the Performance Measure. One notable achievement in this regard was the receipt of a LEED Gold rating for Building 106 at CDC's Chamblee campus.

LONG TERM OBJECTIVE 15.2: EXECUTE EARNED VALUE ANALYSIS/EARNED VALUE MANAGEMENT FOR PROJECT MANAGEMENT.

Measure	FY	Target	Result
15.2.1: Aggregate of scores for capital and repair/improvement projects rated on scope, schedule, and cost. *(Output)*	*Out-Year Target*	1.00±0.08 (2013)	Oct 31, 2013
	2011	1.00±0.09	Oct 31, 2011
	2010	1.00±0.09	Oct 31, 2010
	2009	1.00±0.10	1.00±0.09 (Target Met)
	2008	1.00±0.10	99% (Target Exceeded)
	2007	Baseline	90%

Unique Identifier	Data Source	Data Validation
15.2.1	Cost and Schedule are tracked using Cost and Schedule Indexes from the Earned Value Analysis/ Management (EVA/EVM) - IFMS EVA/EVM Project Status Monthly Report	Independent Review of Project EAC, ETC, CPI, & SPI

Long-term Objective 15.2, Performance Measure 1

This measure provides a private industry and Government recognized performance tool for project progress: Earned Value Analysis. The previous OMB program assessment measure addressed traditional tracking of scope, budget, schedule, and quality. These traditional measures are not predictive for project management. On the other hand, the Earned Value Management (EVA) project management system uses normalized indexes to predict the S-curve trending of project progress. This allows a project manager to predict and adjust schedule and budget to meet shortfalls in either. Use of this tool has already been selected as OMB program assessment goals for other agencies within DHHS. CDC Buildings and Facilities Offices (BFO) revision of this measure allows greater consistency across Department OPDIVs and enhances discrete, proactive management of project targets.

Project cost and schedule performance is measured by calculating a Cost Performance Index (CPI) and a Schedule Performance Index (SPI) at regular intervals of a projects progress. Cost Performance index is the ratio of Earned Value (Budget Cost of Work Performed) to Actual Cost of Work Performed. CPI = EV/ACWP Schedule Performance Index is the ratio of Earned Value (Budget Cost of Work Performed) to Budget Cost of Work Scheduled. SPI = EV/BCWS.

Project scope, schedule and budget have been performance metrics managed by BFO since 2000. However, existing techniques tracked historical data and were non-predictive.

EVM integration into Facility Engineering practices was a major culture change. Facility projects have historically been managed on the basis of reviewing cost and schedule at pre-defined increments, then reacting to anomalies as they occur. EVM is predictive, and requires non-intuitive, monthly input by BFO Engineers and Architects. The analysis is pre-programmed, but an investment in time and training was needed before results became known for individual projects and managers. EVM was first introduced into the Engineering/Architecture culture of CDC's BFO in October, 2007. Extensive training sessions and examples were presented prior to and during the systems inception.

EVA is now used as the de facto project management tool in BFO's organizations EVA is reported locally on a monthly basis as part of the Offices business metrics within CDC's business services office. Participation in the EVA system has increased by over 90 percent since Q1, FY 2008. After its introduction during that same quarter, data has been consistently reported on a monthly basis. Targeted

indexes have been met since Q1, FY 2008. Continued training will enhance our Engineers and Architects capability with the EVA system. EVA targets were exceeded for 2009.

LONG TERM OBJECTIVE 15.3: EXECUTE BUSINESS AND PROJECT TACTICS

Measure	FY	Target	Result
15.3.1a: Improve CDC's Buildings and Facilities Office's processes and performance as reflected by two Key Performance Indicators - Work Order Closure Rates and Customer Satisfaction - and by three Federal Real Property Council (FRPC) metrics of Utilization, Mission Dependency, and Facility Condition Index for CDC buildings Work Order Closure Rates *(Outcome)*	*2011*	91%	Dec 31, 2011
	2010	89%	Dec 31, 2010
	2009	87%	89% (Target Exceeded)
	2008	85%	95% (Target Exceeded)
15.3.1b: Improve CDC's Buildings and Facilities Office's processes and performance as reflected by two Key Performance Indicators - Work Order Closure Rates and Customer Satisfaction - and by three Federal Real Property Council (FRPC) metrics of Utilization, Mission Dependency, and Facility Condition Index for CDC buildings Customer Satisfaction Survey Results *(Outcome)*	*2011*	85%	Dec 31, 2011
	2010	80%	Dec 31, 2010
	2009	80%	80% (Target Met)
	2008	75%	94% (Target Exceeded)
15.3.1c: Improve CDC's Buildings and Facilities Office's processes and performance as reflected by two Key Performance Indicators - Work Order Closure Rates and Customer Satisfaction - and by three Federal Real Property Council (FRPC) metrics of Utilization, Mission Dependency, and Facility Condition Index for CDC buildings Condition Index *(Outcome)*	*2011*	90.0CI	Dec 31, 2011
	2010	90.0CI	Dec 31, 2010
	2009	87.6CI	90.0CI (Target Exceeded)
	2008	87.2CI	93.9 (Target Exceeded)
15.3.1d: Improve CDC's Buildings and Facilities Office's processes and	*2011*	2.00%	Dec 31, 2011

Measure	FY	Target	Result
performance as reflected by two Key Performance Indicators - Work Order Closure Rates and Customer Satisfaction - and by three Federal Real Property Council (FRPC) metrics of Utilization, Mission Dependency, and Facility Condition Index for CDC buildings Mission Dependency *(Outcome)*	*2010*	5.00%	Dec 31, 2010
	2009	5.48%	0% (Target Exceeded)
	2008	5.95%	0% (Target Exceeded)
15.3.1e: Improve CDC's Buildings and Facilities Office's processes and performance as reflected by two Key Performance Indicators - Work Order Closure Rates and Customer Satisfaction - and by three Federal Real Property Council (FRPC) metrics of Utilization, Mission Dependency, and Facility Condition Index for CDC buildings Utilization *(Outcome)*	*2011*	6.7%O, 5.00%U	Dec 31, 2011
	2010	6.7%O, 5.00%U	Dec 31, 2010
	2009	6.7%O, 5.12%U	2.42%O; 1.51%U (Target Met)
	2008	6.7%O, 5.24%U	1.8%O, 1.8%U (Target Exceeded)
15.3.1f: Improve CDC's Buildings and Facilities Office's processes and performance as reflected by two Key Performance Indicators - Work Order Closure Rates and Customer Satisfaction - and by three Federal Real Property Council (FRPC) metrics of Utilization, Mission Dependency, and Facility Condition Index for CDC buildings Operating Costs *(Outcome)*	*2011*	$10.29/sq. ft.	Dec 31, 2011
	2010	$10.29/sq. ft.	Dec 31, 2010
	2009	$10.39/sq. ft.	$11.93/sq. ft. (Target Not Met)
	2008	$10.50/sq. ft.	$11.94/sq. ft. (Target Not Met)

Unique Identifier	Data Source	Data Validation
15.3.1	ARIS Data Tables, IFMS Project and Maintenance Data, Customer Satisfaction Surveys	Manual processes to verify calculations

Long-term Objective 15.3, Performance Measure 1

This measure provides analysis of tactical business performance and execution of Buildings and Facilities Office (BFO) services and stewardship of HHS-owned assets. The measure combines metrics required both locally at CDC (Work Order Closure Rate, Customer Satisfaction) with HHS and OMB reporting requirements based on Federal Real Property Council and Real Property Asset Management Program goals (Condition Index, Mission Dependency, Utilization,

Operating Costs). It supports the office's adherence to the Federal Real Property Council guidelines and requirements for owned and leased assets by providing performance metrics and asset value preservation.

Customer Satisfaction data is a direct and daily measurement of BFO performance from the customer perspective. Business metrics are validated by customer satisfaction surveys. Work Order Closure Rates measure BFO performance on maintenance trouble calls. The response to trouble calls directly supports the CDC mission capability.

- Customer Satisfaction is measured through seven primary questions on a customer's satisfaction with BFOs performance. In addition to random entries that may be submitted over the CDC Intranet, BFO has established direct data links with Work Order and Project identifying data. This allows direct measurement of BFO business performance from a customer's perspective.

- Work Order Closure Rates measure the ratio between closed work orders and closed work orders with intervals of less than 30 days. This a direct measurement of maintenance trouble call performance and it sets strategic guidelines on establishing the difference between projects and work orders (e.g., if a WO takes more than 30 days to complete, it should be defined as a project).

Federal Real Property Council Metrics measure the quantities of Condition Index, Mission Dependency, Utilization Rates, and Operating Cost goals for agency assets.

- Condition Index - a Facility Replacement Value (FRV) divided by the cost of needed repairs (sometimes referred to as the Backlog of Maintenance And Repair - BMAR), subtracted from one and multiplied by 100. The President's Managment Agenda goals require all agencies to bring building CI's to a minimum of 90 as a long-term goal. For the purposes of this Measure, CI is for laboratory space.

- Mission Dependency - is the Agency's mission directly dependent on this asset; is it critical? These are declarations of the importance of our assets. Ideally, all CDC buildings would become mission-dependent or they would be disposed/demolished.

- Utilization Rate - this is a ratio between the number of occupants and the space within a building. The goal is to meet HHS guidelines for Utilization Rates for all CDC buildings, so that adequate space is available - but not wasted. Both Over-utilization and Under-utilization is tracked, with percentages of each measured against goals.

- Operating Costs This is repair and maintenance costs on an annual basis. Goals are set by percentage reduction on an annual basis. Utility costs are not included.

Key Performance Indicator metrics were established during fourth quarter, FY 2007. BFO reports these metrics on a monthly basis.

Federal Real Property Council metrics continue to improve. Progress has occurred in new construction and demolition of older structures with poor conditional assessments. Each R&I project is now tracked within our Integrated Facility Management System project management system for these metrics. The metrics of Condition Index, Mission Dependency, Utilization, and Operating Costs are reported quarterly to HHS OFMP, who in turn report overall HHS agencies' metrics to OMB. The targets for these metrics were exceeded by CDC's Buildings and Facilities Office for 2009.

Key Performance Indicator targets have steadily increased as new methodologies were introduced into the BFO branch organizations (Customer Satisfaction, Work Order Closure Rates). Trending is positive. The Performance Measures target for Work Order Closure Rate and Customer Satisfaction were exceeded in 2009. Work Order Closure Rate is tracked independently through the TMA system, while Customer Satisfaction survey results are compiled through an outside consultant.

PUBLIC HEALTH PREPAREDNESS AND RESPONSE

STATE AND LOCAL PREPAREDNESS AND RESPONSE CAPABILITY

LONG TERM OBJECTIVE: CREATE PROGRAM EFFICIENCIES THAT IMPROVE SERVICES AND CONSERVE RESOURCES FOR MISSION-CRITICAL ACTIVITIES.

Measure	FY	Target	Result
16.E.1a: Decrease the amount of (A) time and (B) cost required for the Division of State and Local Readiness (DSLR) Project Development Officers to conduct technical reviews of work plans and budgets for all 62 grantees by providing appropriate tools and functionality in the DSLR Management Information System (MIS). A) time (days) *(Outcome)*	2011	20 days	Dec 31, 2012
	2010	20 days	Dec 31, 2011
	2009	21 days	Dec 31, 2010
	2008	25 days	17 days (Target Exceeded)
	2007	28 days	30 days (Target Not Met)
	2006	Baseline	30 days
16.E.1b: Decrease the amount of (A) time and (B) cost required for the Division of State and Local Readiness (DSLR) Project Development Officers to conduct technical reviews of work plans and budgets for all 62 grantees by providing appropriate tools and functionality in the DSLR Management Information System (MIS). B) cost (percentage reduction) *(Outcome)*	2011	20.2%	Dec 31, 2012
	2010	23.3%	Dec 31, 2011
	2009	22.9%	Dec 31, 2010
	2008	11.6%	52.8% (Target Exceeded)
	2007	4.3%	0% (Target Not Met)
	2006	Baseline	$126,507

Unique Identifier	Data Source	Data Validation
16.E.1	CDC's Office of Public Health Preparedness and Response has maintained a management information system on CDCs Secure Data Network (SDN) for approximately three years. This system, known as SLPP-MIS, is used to receive, process, monitor, and evaluate cooperative agreements of about $688 million in FY 2009 for 62 grantees.	When the technical review process begins, the date/ time will be noted in the system; Once the target date/time is reached, the system will be closed and Project Officers will not be able to conduct additional technical reviews.

Efficiency Measure 16.E.1:

CDC's DSLR is responsible for providing management oversight and technical assistance for the administration of the Public Health Emergency Preparedness (PHEP) Cooperative Agreement. As part of the application process, grantees are required to submit detailed work plans and budgets which can total 100 pages each. CDC Project Development Officers (PDO) review, provide feedback, and approve

applications before funds can be awarded. In addition, at the end of the extensive review process, PDOs provide recommendations for each work plan activity and line items are restricted or disallowed for the budget. The issues cited during this review are monitored and resolved during the year.

Historically, PDOs conducted technical reviews of the grants using paper-based approaches. This resulted in cumbersome paperwork and difficulty in tracking resolution of issues raised during the review process. To deal with these operational limitations, CDCs Management Information System (MIS) was enhanced to centralize the collection, tracking and management of review information. The MIS allows grantees to submit their budgets and work plans directly to the system. The MIS not only maximizes efficiency of the initial application review, but helps facilitate technical assistance efforts throughout the course of the year. The automation and integration of this process will create overall efficiencies in the grants management process by decreasing the time it takes to conduct initial reviews and by providing rapid access to information to track and manage over time.

The efficiency gained from the integration of the review section into the MIS translates into other efficiencies from the grantees stand point, including a reduction in the time it takes grantees to obtain feedback regarding their work plans and budgets from Project Officers. This in turn results in a faster implementation of recommended changes, thereby improving the overall efficiency of their programmatic operations. MIS also enables rapid submission of applications and recommended changes, reducing potential for funding restrictions or delays.

In FY 2008, the program conducted technical reviews in 17 days, resulting in a cost reduction of 52.8 percent, significantly exceeding the targets. The improvement can be attributed to diligent project management, database efficiencies, and scheduling challenges. The program guided reviewers to meet strict milestones and deadlines defined prior to the review process. The PERFORMS database used by the program provided time-based cost savings by expediting follow-up reviews. Lastly, unavoidable delays in distributing the Budget Period 9 PHEP guidance to grantees, due to the departmental clearance process, drastically reduced the review time as the program was committed to dispersing funds on time. The FY 2007 target of 28 days was unmet with an actual result of 30 days and, therefore, no associated cost savings; nonetheless, this efficiency measure continues to improve, as prior to implementing the MIS, receipt and review of grantee work plans and budgets relied upon inefficient manual processes. The two supplementary days purposely allocated for Project Officer review considers HHS clearance requirements, which were not anticipated when the original measure was drafted in 2006. CDC expects to meet future targets while accommodating HHS clearance requirements.

LONG TERM OBJECTIVE 16.3: DECREASE THE TIME NEEDED TO DETECT AND REPORT CHEMICAL, BIOLOGICAL, RADIOLOGICAL AGENTS IN TISSUE, FOOD, OR ENVIRONMENTAL SAMPLES THAT CAUSE THREATS TO THE PUBLIC'S HEALTH.

Measure	FY	Target	Result
16.3.1: Percentage of states that have level three chemical lab capacity, and have agreements with and access to (specimens arriving within 8 hours) a level-one chemical lab equipped to detect exposure to nerve agents, mycotoxins, and select industrial toxins. *(Output)*	*2011*	100%	Dec 31, 2011
	2010	100%	Dec 31, 2010
	2009	100%	100% (Target Met)
	2008	100%	100% (Target Met)
	2007	100%	100% (Target Met)
	2006	100%	100% (Target Met)
16.3.6: Percentage of state	*2011*	96%	Mar 31, 2012

Measure	FY	Target	Result
public health laboratories that directly receive CDC PHEP funding that can correctly subtype E.Coli O157:H7 and submit the results into a national reporting system within four working days for 90% of the samples received. *(Output)*	*2010*	96%	Mar 31, 2011
	2009	79%	Mar 31, 2010
	2008	63%	60% (Target Not Met but Improved)
	2007	Baseline	46%

Unique Identifier	Data Source	Data Validation
16.3.1	The Laboratory Response Network (LRN) delivers accurate and timely identification of agents causing public health threats, including naturally occurring diseases, organisms that could be used in a biologic terrorism attack,and chemical agents.	The data collection and validation activities across the LRN significantly enhances the capacity of laboratories to rapidly detect and identify agents likely to be used in a terrorist attack and provide timely information to health professionals.
16.3.6	Self-reported data as part of required progress reports	Quality assurance reviews with follow-up with grantees

Long-term Objective 16.3, Performance Measure 1

Currently, 54 state, county, and metropolitan public health laboratories are members of the chemical component of the Laboratory Response Network. Each chemical network member participates in Level 3 activities. CDC is training all 62 Level 3 public health chemical laboratories in the proper collection and shipment of human samples following a chemical terrorism event. This training also includes an overview of chemical agents; CDC's responsibilities in responding to chemical terrorism events; a discussion of federal regulations on diagnostic packaging procedures and evidentiary-control measures; and hands-on exercises involving the packaging and shipping of human samples. These public health chemical laboratories will then train internal partners (e.g., hospital laboratories, hazardous materials technicians, doctors, office laboratories) in the proper collection and shipment of human samples after a chemical terrorism event.

In FY 2006, significant progress was made on this measure as 100 percent of states have Level 3 lab capacity. This progress was maintained in FY 2007, FY 2008, and FY 2009. Fifty percent of the states are within an eight hour driving distance to a Level 1 chemical laboratory due to CDC's efforts in increasing the number of Level 1 laboratories from five to 10 in FY 2005. Additionally, in FY 2009, all 54 LRN-C laboratories participated in a sample collection, packaging, and shipping exercise with 96 percent passing rigorous performance standards.

Long-term Objective 16.3, Performance Measure 2

Diagnosed cases of *E. coli* O157:H7 and other serious infections are routinely reported to health departments in most states; and then states report them to CDC. Grantees need to be able to inform local, state, and national laboratorians and epidemiologists of disease occurrences in a timely manner in order to determine the extent and scope of potential outbreaks and to minimize the effects of these outbreaks.

Performing Pulsed Field Gel Electrophoresis subtyping and submitting data results to the PulseNet electronic database in a timely manner indicates the public health laboratory's ability to sub-type specific bacteria and share results quickly.

The FY 2007 baseline data indicated that additional progress is needed for states to report laboratory results within four working days for 90 percent of the samples received. The Public Health Emergency Preparedness (PHEP) program has developed additional guidance for grantees to help them improve performance on this measure, which resulted in improvements for FY 2008.

FY 2008 data indicate progress from FY 2007, although the target was not met. Some performance issues continue to be linked to grantee training and staffing abilities. Future improvement will be achieved through technical assistance.

LONG TERM OBJECTIVE 16.6: DECREASE THE TIME NEEDED TO PROVIDE COUNTERMEASURES AND HEALTH GUIDANCE TO THOSE AFFECTED BY THREATS TO THE PUBLIC'S HEALTH.

Measure	FY	Target	Result
16.6.1: Expand and enhance the Health Alert Networks (HAN) ability to rapidly provide access to public health guidelines, best practices, and information on the effectiveness of public health interventions. *(Outcome)*	*2011*	a) 85 percent of state health departments acknowledge receipt of health alert messages within 30 minutes of delivery on a 24/7 basis	Dec 31, 2011
	2010	a) 85 percent of state health departments acknowledge receipt of health alert messages within 30 minutes of delivery on a 24/7 basis	Dec 31, 2010
	2009	a) 85 percent of state health departments acknowledge receipt of health alert messages within 30 minutes of delivery on a 24/7 basis b) 85 percent of state grantees will have a protocol for testing and documenting send/ receive capabilities	(Did not report)
	2008	a) 80 percent of state health departments acknowledge receipt of health alert messages within 30 minutes of delivery on a 24/7 basis b) 85 percent of state grantees will have a protocol for testing and documenting send/ receive capabilities	a) 88 percent of State Health Departments acknowledge receipt of health alert messages within 30 minutes of delivery. (Exceeded) b) (Unmet)
	2007	a) 75 percent of state health departments acknowledge receipt of health alert messages within 30 minutes of delivery on a 24/7 basis b) 80 percent of state grantees will have a protocol for testing and documenting send/receive capabilities	a) 77 percent of State Health Departments acknowledging receipt of health alert messages within 30 minutes of delivery. (Exceeded) b) (Unmet)
	2006	a) 70 percent of state health departments acknowledge receipt of health alert messages within 30 minutes of delivery on a 24/7 basis. b) 75 percent of state grantees will have a protocol for testing and documenting send/ receive capabilities	a) 58 percent of Cooperative Agreement recipients acknowledge receipt of health alert messages within 30 minutes of delivery on a 24/7 basis (Unmet) b) Unmet c) 60 percent (Met) d) 98 percent (Exceeded)
16.6.2: Percentage of state	*2011*	100% prepared	Dec 31, 2011

Measure	FY	Target	Result
public health agencies that are prepared to use materiel contained in the SNS as demonstrated by evaluation of standard functions as determined by CDC. *(Outcome)*	*2010*	90% prepared	Dec 31, 2010
	2009	90% prepared	100% (Target Exceeded)
	2008	90% prepared	91% (Target Exceeded)
	2007	90% prepared	78% (Target Not Met)
	2006	80% prepared	70% (Target Not Met)

Unique Identifier	Data Source	Data Validation
16.6.1	HAN, CDCs Division of Alliance Management and Consultation	The data that passes through and is captured in HAN is frequently validated by program staff
16.6.2	DSNS State Technical Assistance Review Tool	The SNS program maintains a staff Program Services Consultants who provide ongoing technical advice and training assistance to Public health Emergency Preparedness & Response grantees. The consultants also assess the grantees level of preparedness to receive, distribute and dispense SNS assets. These services improve the grantees ability to receive, stage, store and distribute the SNS material.

Long-term Objective 16.6, Performance Measure 1

To obtain the status of performance for this measure, CDC's National Center for Public Health Informatics (NCPHI) conducts quarterly Health Alert Networks (HAN) response tests based on 50 grantees (State HAN Coordinators). Three of the four quarterly tests scheduled to be completed in FY 2008 have been completed to date. Note that original baseline (FY 2004) targets b) and d) were retired after data was reported for FY 2005 activities.

In FY 2005 and FY 2006, the targets were significantly unmet because approximate target levels were initially set too high for achievement in the reporting FY. In FY 2006, although the target was still unmet, there was an improvement from FY 2005. The trend indicates a steady improvement in performance on this measure from FY 2005 to FY 2008. Improvements in performance in FY 2007 and FY 2008 are largely attributed to close monitoring and managing of grantees' alerting contact data as well as meticulous and increased message communication testing troubleshooting and maintenance.

As of FY 2009, responsibility for HAN and performance on this measure transitioned to the CDC's National Center for Health Marketing. However, NCHM does not have access to the data sources that previously informed this performance measure. Collecting accurate data on the measure has historically been problematic. Past results from 2004 and 2006 were unreported (Unmet) and the reported 60 percent for 2005 is unclear as to its origin or what measurements were used to obtain that percentage. The program has developed and submitted for consideration a measure that more accurately measures how well the Health Alert Network is able to operate during an emergency response event.

Long-term Objective 16.6, Performance Measure 2

As of the fourth quarter of FY 2009, 100 percent (54/54) of the States and directly-funded cities demonstrated preparedness to use SNS assets, a significant milestone accomplished through the partnership between the CDC and project areas. Preparedness to receive, stage, store and distribute SNS

material is essential to saving lives at risk during a public health emergency. Trend data from the FY 2004 baseline of 72 percent to FY 2009's result of 100 percent demonstrate the gradual improvement in state public health agency's capabilities. CDC will continue to evaluate the preparedness of state public health agencies through exercises and reviews of SNS distribution plans. The target for this measure increases to 100 percent prepared in FY 2011.Evidence of SNS preparedness levels suggests that resources are needed to transfer knowledge and the application of various modeling techniques to state and local jurisdictions. To achieve this end, in the second quarter of FY 2009, CDC held the first annual SNS Summit that brought 400 state and local SNS planners and coordinators together to provide a forum for sharing information and best practices.

Although there are many challenges to sustaining this preparedness capability, CDC believes that recent efforts to enhance preparedness through more rigorous planning and assessment processes combined with technical assistance, training, and exercises; and additional tools and future strategies for advancing innovative modeling, will improve grantees' long term ability to respond to and sustain preparedness for public health emergencies.

LONG TERM OBJECTIVE 16.9: DECREASE THE TIME NEEDED TO IMPLEMENT RECOMMENDATION FROM AFTER-ACTION REPORTS FOLLOWING THREATS TO THE PUBLIC'S HEALTH.

Measure	FY	Target	Result
16.9.1: Percentage of public health agencies that directly receive CDC PHEP funding that can convene within 60 minutes of notification a team of trained staff that can make decisions about appropriate response and interaction with partners. *(Output)*	*2011*	97%	Mar 31, 2012
	2010	97%	Mar 31, 2011
	2009	92%	Mar 31, 2010
	2008	87%	85% (Target Not Met but Improved)
	2007	Baseline	84%
16.9.5: Percentage of public health agencies that directly receive CDC PHEP funding that, at least once/year, re-test a response following completion of corrective action(s) identified in a prior actual or simulated response. *(Outcome)*	*2011*	98%	Mar 31, 2012
	2010	98%	Mar 31, 2011
	2009	94%	Mar 31, 2010
	2008	85%	92% (Target Exceeded)
	2007	Baseline	81%

Unique Identifier	Data Source	Data Validation
16.9.1, 16.9.5	Self-reported data as part of required progress reports	Quality assurance reviews with follow-up with grantees

Long-term Objective 16.9, Performance Measure 1

This measure stipulates that public health agencies must be able to rapidly convene staff to integrate information and prioritize resource allocation to ensure timely and effective coordination within the public health agency and with key response partners during an emergency response.

This measure is incorporated as a specific reporting measure for the Division of State and Local Readiness's (DSLR) grantees. The baseline for this revised measure was established by grantee self-reports. Although DSLR will continue to report on this measure, some grantees desire additional

clarification of the measure. DSLR currently frames the measure as, "Time to notify all primary staff (secondary or tertiary staff as needed) with public health agency Incident Command System (ICS) functional responsibilities that the public health agency's Emergency Operations Center (EOC) is being activated."

DSLR will continue to highlight this measure as a grantee reporting requirement, and identify personnel trained to function within the eight primary components of ICS within the EOC. Specific minutes are required to be reported by grantees, and these reporting requirements permit DSLR to analyze and compare scores across differing health jurisdictions.

The FY 2008 target was not met, although performance improved slightly. DSLR will continue providing technical assistance to improve future performance. The performance measure is challenging for public health agencies to achieve, and so progress will be gradual.

Measure 16.9.1 has been selected to serve as an HHS high priority goal.

Long-term Objective 16.9, Performance Measure 2

This measure reflects the important ability of public health agencies to systematically re-test their response capabilities in order to provide evidence that planned and implemented corrective actions have been effective in improving response capacity. The expectation is that public health agencies should be progressively improving by addressing corrective actions within exercise-related after action reports (AARs). The current baseline was developed by direct grantee reporting. Not all grantees conducted exercises or experienced a real response as defined in the guidance for this measure. Additionally, AAR reporting processes are oftentimes lengthy, and depending on the scope of the event, corrective actions might be numerous or their identification might be subject to time consuming processes.

The target for FY 2008 was exceeded, as grantees made significant progress in achieving this performance measure. Targets for FY 2009 and beyond remain ambitious as they require further improvement in total grantee achievement.

Data related to this measure will be specifically collected from the grantees. In partnership with our grantees, the Division of State and Local Readiness (DSLR) is collecting data about how corrective actions are being incorporated into opportunities for improvement, and providing technical assistance to improve future performance.

CDC PREPAREDNESS AND RESPONSE CAPABILITY

LONG TERM OBJECTIVE: CREATE PROGRAM EFFICIENCIES THAT IMPROVE SERVICES AND CONSERVE RESOURCES FOR MISSION-CRITICAL ACTIVITIES.

Measure	FY	Target	Result
16.E.3: Decrease annual costs for personnel and materials development with the development and continuous improvement to the budget and performance integration information system tools. *(Outcome)*	*2011*	$0/BPI and Health Impact system	Dec 31, 2011
	2010	$0/BPI and Health Impact system	Dec 31, 2010
	2009	$0/BPI and Health Impact system	$0 (Target Met)
	2008	$0/BPI and Health Impact system	$0 (Target Met)
	2007	$50,000/ BPI and Health Impact system	$8,685.20/BPI and Health Impact system (Target Met)
	2006	N/A	$86,800/BPI and Health Impact system

Unique Identifier	Data Source	Data Validation
16.E.3	OPHPR has been at the forefront of development of two information technology tools for budget and performance integration. These tools are now widely used by a variety of staff for a variety of purposes, including gaining efficiencies in the consolidation of information systems, and reducing the time required to find, collate, and use data.	Health Impact and IRIS B&PI are used to track annual costs for personnel and materials development.

Efficiency Measure 16.E.3:

This is an Office of Management and Budget (OMB) approved efficiency measure for both the Upgrading CDC Capacity and Biosurveillance program assessments. The Office for Public Health Preparedness and Response (OPHPR) currently utilizes a team of contractors to help facilitate their Health Impact Planning (HIP) process each year. This team also provides supplemental support in regards to this measure. Since CDC's budget and performance tool is still being developed and improved, the system is not yet able to provide functionality with performance reporting and report generation. The contractor team created a webform that the projects use to report on performance twice per year. The team also maintains an Access database that houses the same information, but is able to provide more robust report generation and analysis. The intent of the measure is to reach a point where CDC's budget and performance integration (BPI) tool provides all of these services managed by internal full-time equivalents (FTE), therefore reducing costs for COTPER. FY 2007 showed a drastic decrease in cost due to the implementation of HealthImpact.net across CDC. As systems continue to improve, CDC aims to gradually decrease the time and material costs while not impacting the quality and timeliness of work developed and delivered. This trend has already begun as is evident from the decrease in costs from FY 2004 through FY 2007. This target was met in FY 2008 and in FY 2009 because of the implementation of HealthImpact.net across CDC. As the target has been maintained, this measure can be retired and replaced with a measure that more can track the efficiency of budget and performance integration more precisely.

LONG TERM OBJECTIVE 16.3: DECREASE THE TIME NEEDED TO DETECT AND REPORT CHEMICAL, BIOLOGICAL, RADIOLOGICAL AGENTS IN TISSUE, FOOD, OR ENVIRONMENTAL SAMPLES THAT CAUSE THREATS TO THE PUBLIC'S HEALTH.

Measure	FY	Target	Result
16.3.2: Percentage of Laboratory Response Network (LRN) labs that pass proficiency testing for Category A and B threat agents. *(Output)*	*2011*	92%	Dec 31, 2011
	2010	92%	Dec 31, 2010
	2009	92%	95% (Target Exceeded)
	2008	92%	94% (Target Exceeded)
	2007	100%	91% (Target Not Met)
	2006	84%	87% (Target Exceeded)
16.3.5: By 2010, CDC's laboratory system will decrease the time from receipt of tissue, food and environmental samples to confirm and report chemical, biological and radiological agents to stakeholders. *(Outcome)*	Targets under development		

Unique Identifier	Data Source	Data Validation
16.3.2	The Laboratory Response Network (LRN) delivers accurate and timely identification of agents causing public health threats, including both naturally occurring disease and organisms that could be used in a biologic terrorism attack.	The data collection and validation activities across the LRN significantly enhances the capacity of laboratories to rapidly detect and identify agents likely to be used in a terrorist attack and provide timely information to health professionals.
16.3.5	Targets under development	

Long-term Objective 16.3, Performance Measure 1

This measure determines the readiness posture of the Laboratory Response Network (LRN) for rapid detection of biological threat agents. Since laboratories infrequently encounter biological threat agents, the proficiency testing (PT) program provides familiarity in working with these agents, performing LRN assays using agent-specific testing algorithms, and using available electronic resources to report test results.

The PT program has been in place since the LRN was founded in FY 1999. At its onset, very few LRN member laboratories were able to rapidly and accurately identify biological threat agents and other agents of public health importance. Due to testing challenges and the need for increased training, the FY 2003 baseline passing rate was approximately 75 percent. By the end of FY 2005, the passing rate rose to 83 percent and at the end of FY 2006 the passing rate increased again to 87 percent. The passing rate increased in FY 2007 to 91 percent, although the FY 2007 target of 100 percent was not met.

Laboratories that fail a proficiency test are required to go through remediation steps that may include consultation, successful completion of a follow-up proficiency test, and/or hands-on training. Therefore, FY 2008 and FY 2009 targets have been adjusted accordingly, yet remain ambitious. The FY 2008 passing rate was 94 percent and exceeded the target. Although the LRN exceeded the target in FY 2009,

92 percent remains an ambitious target in light of the evolving priority threat list and challenges with mitigating staff turnover within the LRN with continuous training.

A 100 percent passing rate is not feasible for several reasons. First, an evolving priority threat list results in the introduction of new tests, technologies and equipment that require staff to gain additional training and experience. Additionally, the LRN program office at CDC is working to increase the complexity of the PT program to include a) multiple agents in a single challenge, b) testing in various non-clinical samples (e.g., food, water, and environmental samples), and c) requirements to complete a full testing algorithm rather than solely focusing on rapid tests.

Long-term Objective 16.3, Performance Measure 2

The time reductions stipulated by this performance measure will directly affect the ability of public health and emergency response entities to identify events of national public health importance. This measure will indirectly decrease the time needed to communicate with the public about important health issues, initiate investigations, and to identify and provide countermeasures.

CDC will work to refine and develop this measure to reflect individual lab capacity, rather than aggregate lab capacity, and to account for the inherent time of laboratory methods and procedures.

LONG TERM OBJECTIVE 16.5: DECREASE THE TIME TO IDENTIFY CAUSES, RISK FACTORS, AND APPROPRIATE INTERVENTIONS FOR THOSE AFFECTED BY THREATS TO THE PUBLIC'S HEALTH

Measure	FY	Target	Result
16.5.9: By 2010, CDC's epidemiology system will reduce the time to initiate, coordinate and resolve investigations to identify causes, risk factors and recommended interventions. *(Outcome)*		Targets under development	

Unique Identifier	Data Source	Data Validation
16.5.9	Targets under development	

Long-term Objective 16.5, Performance Measure 9

The time reductions stipulated by this performance measure will directly affect the ability of public health and emergency response entities to identify events of national public health importance. This measure will indirectly decrease the time needed to communicate with the public about important health issues, initiate investigations, and to identify and provide countermeasures.

Methods of incorporating individual project-level data reflecting current laboratory activities will contribute to the overarching implications of this Upgrading CDC Capacity performance measure. With further advancements of CDC goal action planning and identification of funding priorities, appropriate project alignment and contribution to finalizing target completion occurred in FY 2008. This information will be used to continue work on developing and refining targets in FY 2010.

LONG TERM OBJECTIVE 16.6: DECREASE THE TIME NEEDED TO PROVIDE COUNTERMEASURES AND HEALTH GUIDANCE TO THOSE AFFECTED BY THREATS TO THE PUBLIC'S HEALTH.

Measure	FY	Target	Result
16.6.7: By 2010, CDC's response operations system will decrease the time from event to actions that will minimize morbidity and mortality. *(Outcome)*		Targets under development	

Unique Identifier	Data Source	Data Validation
16.6.7	Targets under development	

Long-term Objective 16.6, Performance Measure 7

The time reductions stipulated by this performance measure will directly affect the ability of public health and emergency response entities to identify events of national public health importance. This measure will indirectly decrease the time needed to communicate with the public about important health issues, initiate investigations, and to identify and provide countermeasures.

Methods of incorporating individual project-level data reflecting current laboratory activities will contribute to the overarching implications of this Upgrading CDC Capacity performance measure. With further advancements of CDC goal action planning and identification of funding priorities, appropriate project alignment and contribution to finalizing target completion occurred in FY 2008. This information will be used to continue work on developing and refining targets in FY 2010.

LONG TERM OBJECTIVE 16.9: DECREASE THE TIME NEEDED TO IMPLEMENT RECOMMENDATION FROM AFTER-ACTION REPORTS FOLLOWING THREATS TO THE PUBLIC'S HEALTH.

Measure	FY	Target	Result
16.9.2: Increase the percentage of the TPER allocation for which budget execution matches strategic funding priorities. *(Output)*	2011	100%	Dec 31, 2011
	2010	100%	Dec 31, 2010
	2009	98%	99% (Target Exceeded)
16.9.3: Improve the on-time achievement of individual project milestones for Epidemiology, Laboratories and Emergency Response. *(Outcome)*	2011	96%	Dec 31, 2010
	2010	96%	Dec 31, 2009
	2009	95%	93% (Target Not Met but Improved)
	2008	93%	89% (Target Not Met but Improved)
	2007	90%	84% (Target Not Met)
	2006	Baseline	87%
16.9.4: Achieve progressive improvements in the quality of projects submitted for TPER Upgrading CDC Capacity funding consideration.. *(Output)*	2011	N/A	N/A
	2010	87%	Dec 31, 2010
	2009	85%	Dec 31, 2009 (Did not report)
	2008	78%	83% (Target Exceeded)
	2007	Baseline	74%

Unique Identifier	Data Source	Data Validation
16.9.2 - 16.9.4	Self-reported data as part of required progress reports.	See Efficiency Measure Data Validation.

Long-term Objective 16.9, Performance Measure 2

This measure reflects the need to ensure that budget execution matches strategic funding priorities. The Office of Public Health Preparedness and Response (OPHPR) has developed specific priorities for FY 2009 that built on priorities from the previous fiscal year. The priorities are derived from the recommendations in the Preparedness Goal Action Plan (GAP). The recommendations were organized by subject and first prioritized by the Preparedness Objective teams. These vertical priority lists were merged into a horizontal priority list by the Preparedness GAP champions for the entire agency. OPHPR then developed its top priorities from the horizontal list and communicated these priorities to the agency for new FY 2009 proposals.

Long-term Objective 16.9, Performance Measure 3

All individual projects funded to CDC Preparedness and Response Capability must improve performance in order to achieve the long term measures. Individual project performance is monitored continuously and can be summarized as the average time-appropriate achievement of milestones in the core functional areas. Improving on-time achievement of individual milestones for Epidemiology, Laboratory and Emergency Response functional objective related projects ensures that the projects are making substantial progress to complete all planned activities by the end of FY 2008 in order to help achieve CDC's Health Protection Goals. The target for FY 2008 was not achieved due to a number of projects extending the completion of their milestones into the next fiscal year. This extension is due to a number of reasons depending on the specific projects situation. For example, a project's priorities might change during the fiscal year so work specific to a milestone can get extended past the initial completion date while efforts are spent on other activities. In addition, in some cases milestones were delayed due to unexpected hiring difficulties or other personnel changes. However, performance improved from FY 2007 to FY 2008, and a more detailed feedback process was implemented to improve future performance. In addition, past project performance issues (i.e., projects that did not meet their milestones even with extensions) were taken into consideration during the review phase for FY 2009 funding.

In FY 2009, projects funded improved their achievement of project milestones from 89 percent in FY 2008 to 93 percent. While projects made significant gains, many projects in this category were heavily involved in the 2009 H1N1 response. As a result, staff were dedicated to the response and away from projects planned for FY 2009.

Long-term Objective 16.9, Performance Measure 4

Projects submitted for OPHPR funding include detailed workplans, timelines, and responses to standardized evaluation questions that are used to rate and select projects for funding. This process allows for the selection of projects that are a) most likely to achieve the objectives of upgrading some part of CDC's preparedness capacity, b) not duplicative of each other, c) well-specified and d) likely to succeed, thus improving overall preparedness capacity.

FY 2007 performance represents a baseline of the quality of project submissions, relatively early in the evolution of the Office for Public Health Preparedness and Response's (OPHPR) Health Impact Planning process. During FY 2008, the quality of project submitted improved due to additional specific guidance and criteria for project submissions. In addition, to improve future performance, during FY 2008, OPHPR implemented more specific scoring criteria so projects can receive more targeted feedback

from reviewers. Note: FY 2008 performance represents FY 2008 program activities providing guidance for and reviewing project submissions for FY 2009 funding.

Under advisement from its Board of Scientific Counselors, OPHPR has moved from an annual review of projects to a two-year project cycle. As a result, no competitive reviews were conducted for FY 2009 for funding consideration. The program anticipates reviewing projects for funding in FY 2010.

LONG TERM OBJECTIVE 16.2: DECREASE THE TIME NEEDED TO CLASSIFY HEALTH EVENTS AS TERRORISM OR NATURALLY OCCURRING IN PARTNERSHIP WITH OTHER AGENCIES.

Measure	FY	Target	Result
16.2.1: Number of top 50 metropolitan areas using BioSense. *(Output)*	*2011*	10% increase from 2010	Dec 31, 2011
	2010	10% increase from 2009	Dec 31, 2010
	2009	Additional population coverage in Top 50 metropolitan areas	9% increase in population coverage from FY 2008 (Target Met)
	2008	50	50 (Target Met)
	2007	50	49 (Target Not Met but Improved)
	2006	40	38 (Target Not Met but Improved)
16.2.2: By 2010, the BioSense program will reduce the time needed from a triggering biosurveillance event (the identification of a potential disease event or public health emergency event) to initiate event-specific standard operating procedures (the initiation of a public health investigation and, if needed, subsequent public health intervention) for all infectious, occupational or environmental (whether man-made or naturally occurring) threats of national importance. *(Outcome)*	*2011*	6.11 days	Dec 31, 2011
	2010	6.26 days	Dec 31, 2010
	2009	7.26 days	6.97 days (Target Exceeded)
	2008	Baseline	7.78 days

Unique Identifier	Data Source	Data Validation
16.2.1	The BioSense system routinely tracks the receipt of all data into its system. This information is available in routine summary reports. The top 50 Metropolitan Statistical Areas were determined from the census bureau website identifying population estimates as of July 1, 2006.	The BioSense data quality team performs special analyses to verify the number and location of all input data. This is cross-checked between the data warehousing, application, and analytic data mart. These routine analyses will be used to verify data used in this measure on a regular basis.
16.2.2	This measure includes five types of data feeds: manual data collection,	There are automated system controls in place as well as manual procedures

Unique Identifier	Data Source	Data Validation
	state syndromic surveillance automated feed to CDC, non-federal hospital feed to CDC, DoD feed to CDC, and VA feed to CDC. BioSense application data is used to determine the median number of days it takes for each type of data feed. The performance outcome for this measure is calculated using a weighted average rather than a simple average. The weight for each type of feed is determined based on the number of facilities feeding into BioSense that fall under that category.	that are frequently conducted to validate that the information being collected is accurate.

Long-term Objective 16.2, Performance Measure 1

The BioSense program began receiving aggregate data from the Department of Defense (DOD) and the Department of Veterans Affairs (VA) in 2004. In 2005, BioSense began to receive real-time clinical data from 32 hospitals in 10 major metropolitan areas around the country. By the end of 2006, CDC was receiving real-time data from 38 metropolitan areas, including a total of 350 healthcare facilities. Following these milestones, BioSense continued to seek partnerships with national data sources such as Laboratory Corporation of America (LabCorp) and Quest Diagnostics.

Data source recruitment strategies for BioSense have evolved over the last two fiscal years. To maximize return on investment, the program is focusing on the recruitment of state and local public health systems. This strategy has resulted in exponential data source growth while recruitment activities are focused on a single entity. For example, by focusing recruitment efforts on NC Detect, North Carolinas state surveillance system, the program was able to add 113 healthcare facilities as real-time data sources. In this capacity, BioSense is functioning as a network of networks. There are varying levels of biosurveillance capacity at the state and local levels, with few states having surveillance systems as comprehensive as North Carolina. Recognizing this need, the BioSense program initiated strategic planning efforts to leverage recent advances in informatics for the purposes of building biosurveillance capacity across the public health spectrum.

In FY 2011, the BioSense program will provide shared situational awareness for the public health community and connect existing systems and networks instead of duplicating them. This approach focuses on decreasing expenditures for local and state health departments related to building incompatible surveillance systems, encourages sharing of aggregate level data across jurisdictions that can support planning and decision making during an outbreak or other public health threat, and increasing communication across jurisdictions thereby contributing to a comprehensive and coordinated approach to surveillance.

During FY 2010 and 2011, CDC will continue to reform BioSense in line with recommendations from the Government Accountability Office (GAO) that the reformed BioSense should substantially involve constituents within CDC and in health departments.

Long-term Objective 16.2, Performance Measure 2

BioSense enables participating local and state public health departments to simultaneously share and access existing data from health care organizations, providing a more complete picture of potential and actual health events both locally and across jurisdictional boundaries. The request will improve the effectiveness of the interface between Health Departments' electronic surveillance systems and human analysts, decision makers and responders. Grant funding will be directed towards state and local public

health for the purposes of enabling state and local surveillance systems to exchange aggregate level data, allowing interoperability and collaboration for cross-jurisdictional analysis and intervention.

BioSense has made progress in enhancing public health capacity at the state and local level to participate in and contribute to a national public health surveillance network. Accomplishments that illustrate the programs impact on surveillance are listed below:

- Enhanced access to rich clinical data sets for local health departments, through funding to states, regional collaboratives, and Health Information Exchanges (HIEs).

- Supported information transfer/sharing via the distributed network: 1) a pilot was developed to use the Nationwide Health Information Network (NHIN) Connect Gateway, a federal initiative under the HHS Office of the National Coordinator for Health Information Technology, for reporting biosurveillance information from HIEs to CDC, and 2) the International Society for Disease Surveillances Distribute project repository was used to establish two-way data sharing with CDC by bringing together aggregate level influenza like illness (ILI) emergency department visit information from existing state and local syndromic surveillance systems for timely nationwide monitoring of emergency department visits for ILI.

LONG TERM OBJECTIVE 16.3: DECREASE THE TIME NEEDED TO DETECT AND REPORT CHEMICAL, BIOLOGICAL, RADIOLOGICAL AGENTS IN TISSUE, FOOD, OR ENVIRONMENTAL SAMPLES THAT CAUSE THREATS TO THE PUBLIC'S HEALTH.

Measure	FY	Target	Result
16.3.3: Number of Laboratory ResponseNetwork member laboratories able to use their current Laboratory Information Management System (LIMS) for LRN-specific electronic data exchange. *(Output)*	*2011*	6	Dec 31, 2011
	2010	5	Dec 31, 2010
	2009	7	0 (Target Not Met)
	2008	3	0 (Target Not Met)
	2007	Baseline	0
16.3.4: Reduce the time needed for a Laboratory Response Network (LRN) laboratory to enter and message LRN-related standardized results to the CDC. *(Outcome)*	*2011*	A) Chemical - 7 minutes B) Biological - 4 minutes	Dec 31, 2011
	Out-Year Target	A) Chemical – 10 minutes B) Biological – 5 minutes (2010)	Dec 31, 2010
	2009	A) Chemical – 17 minutes B) Biological – 16 minutes	A) Chemical – 13 minutes B) Biological – 7 minutes (Target Exceeded)
	2008	A) Chemical – 23 minutes B) Biological – 27 minutes	A) Chemical - 20 minutes B) Biological - 20 minutes (Target Exceeded)
	2007	Baseline	A) Chemical – 30 minutes B) Biological – 37 minutes

Unique Identifier	Data Source	Data Validation
16.3.3	In addition to specimen and results data, the Health Level 7(HL7) message utilized for messaging LRN data to the CDC carries information regarding the specific data source(i.e., from a labs own system rather than LRN Results Messenger). This information will allow CDC to differentiate between LRN Results Messenger and a local LIMS data. Further development is underway to allow easy reporting on various types of messages from the different sources, allowing CDC to quickly discern the number of messages related to various programs.	Data will be validated through project managers. Each laboratory that is engaged in the LRN LIMS Integration process is being tracked by a project manager. Labs participate in workgroup meetings and are tracked in detail as to their progress toward using their own LIMS. As labs progress, they will enter into a test phase, during which they will be sending test results using their own systems. After their test results using the new mechanism have been validated to be correct and complete (technical validation), the lab will be considered to have fulfilled the target of data exchange using their own LIMS.
16.3.4	Data are obtained by using LRN Results Messenger to send simulated messages and measure the amount of time to send messages for both biological and chemical agents. The LRN Results Messenger team is instituting a performance test plan using tools that will provide substantial measures of application response time, and also indicate areas that can be improved. This test plan will include load testing, stress testing, and capacity testing.	Validation of reaching the target of improved application performance will be provided by comparing performance test plan results from year to year.

Long-term Objective 16.3, Performance Measure 3

This measure reflects CDC's efforts in working with Laboratory Response Network (LRN) member laboratories to migrate away from their current use of the CDC-provided LRN Results Messenger software to their own Laboratory Information management System (LIMS) to exchange LRN-specific results. Transitioning from the LRN Results Messenger to LIMS will improve the speed and accuracy of results messaging to CDC, thus decreasing the time required to initiate a public health response. Using their own LIMS will also eliminate the burden on labs to learn, maintain, and enter data into a separate software component to manage their LRN-related testing. The targets proposed for the revised measure may appear low, but are considered ambitious in light of several challenges. Progress in transitioning efforts requires the availability of funding/resources, commitment and prioritization by the lab. Many LRN labs either do not have, or are currently implementing, a LIMS. Approximately 30 percent of LRN labs now receive funding through the Public Health Emergency Preparedness (PHEP) Cooperative Agreement enabling them to purchase and maintain a LIMS. Another 30 percent may receive funds indirectly, but these funds are limited and are often spent on other priority items. Of the LRN labs that currently have functional LIMS in place, many are still working to develop LIMS capacity for their primary lab functions and have placed a lower priority on biological and chemical terrorism. These factors, most of which are outside of the CDC's sphere of influence, directly impact CDC's ability to demonstrate significant progress in a short period of time. The use of a lab's LIMS to electronically exchange LRN-specific data is CDC's ultimate goal, and one that will take a longer period of time to realize.

CDC is currently working with 34 LRN laboratories in 32 States on development of the LRN Health Level (HL7) Test Result message. These labs represent a wide spectrum of capability and readiness, ranging from those that are still in the LIMS selection process to those that are currently configuring their

LIMS and/or HL7 message. Strategies employed to assist LRN laboratories in reaching these performance measure targets include:

- Distributing supplemental funding to 4 laboratories to ensure that they will be migrated to using their own LIMS for messaging of all LRN biological agents in FY 2010. Labs receiving supplemental funding are being strictly monitored to ensure success.

- Developing several re-usable components using the Rhapsody integration tool that can be shared with states using Rhapsody to accelerate their implementation of the HL7 message.

- Creating straight-forward use cases and a proposed design.

- Conducting site visits to the state public health labs in Florida, Washington, Minnesota, Idaho, Massachusetts, Indiana, and Utah to provide hands-on guidance to support their efforts to become capable of sending LRN-specific data.

These efforts are affected by limited resources and competing priorities within the LRN laboratories; targets for FY 2010 and 2011 have been adjusted accordingly. It is projected that the FY 2010 target for this measure will be partially met, due to the four laboratories that are receiving supplemental funding to complete the measure. Inability to reach the fiscal year 2009 target is due to the LRN lab's current state of readiness and competing priorities, not the CDC's readiness. CDC is prepared to receive and process incoming messages but as of December 2009, CDC does not have any LRN Member labs ready to send messages.

Long-term Objective 16.3, Performance Measure 4

The ability to exchange laboratory data, both within the Laboratory Response Network (LRN) as well as between the LRN and CDC, is critical to initiate event-specific standard operating procedures (e.g., aggregation of data at a national level) for all infectious, occupational or environmental (whether man-made or naturally occurring) threats of national importance. Reducing the time needed for a LRN laboratory to enter and message LRN-related standardized results to CDC is one aspect of CDC efforts to minimize the time required to initiate event-specific standard operating procedures. The LRN Results Messenger project directly supports the CDC's Laboratory Response Network mission, standardizing the exchange of LRN-related data and easing the burden of reporting on LRN laboratories.

CDC is measuring the amount of time it takes a laboratorian to enter a specific number of samples into the system, assign and result typical tests performed, and to send those results to CDC:

- For LRN-Biological samples, CDC measures the time required to manually enter 10 samples, add three Polymerase Chain Reactions (PCRs) to each sample (one for Brucella, one for Coxiella and one for Burkholderia) add a sample summary for each sample and send the results to CDC. This is a recreation of a proficiency testing exercise.

- For LRN-Chemical samples, CDC measures the time required to manually enter 10 batches, manually entering batch information and importing multiple runs of analytes/results, one run at a time. Batch details are then reviewed, validated and sent to CDC. This simulates LRN-C labs either proficiency testing, lab validation or emergency response.

- CDC intends to document the reduction (against the baseline) in time and effort required to enter, result and message LRN-specific results by the indicated percentages. It must be noted that this decrease does not take into account LRN policy that stipulates that notification should occur via a phone call to the CDC Emergency Operations Center within two hours of obtaining high-confidence presumptive or confirmatory results and that data messaging should occur within one hour of notifying CDC.

Original versions of LRN Results Messenger were targeted specifically at providing the basic capability to message LRN-specific results. Much work has been done to refine and enhance the performance of the application since its initial deployment. Reductions in the time required to enter, finalize and message LRN-specific results often receive a lower priority (per the LRN Program Office) than enhancements to programmatic functionality. For example, the addition of new types of LRN tests typically pre-empt enhancements that result in faster data entry. However, the application has dramatically improved reporting times; labs initially reported taking more than an hour to enter 10 samples.

The LRN Results Messenger development team has taken a comprehensive two pronged approach to reducing the time needed to enter and message LRN-specific results to the CDC:

- The development of new user interface tools and controls (using Google Web Toolkit) provide additional performance enhancements at the user interface level.

- Enhancements to allow for faster data lookup.

- Implementation of "surge" data entry capability for biological agents, which significantly speeds data entry during situations that require testing a large volume of samples.

- Implementation of data import capability to speed data entry.

- Additional improvements will be based on user feedback and additional enhancements to the database structure.

LONG TERM OBJECTIVE 16.5: DECREASE THE TIME TO IDENTIFY CAUSES, RISK FACTORS, AND APPROPRIATE INTERVENTIONS FOR THOSE AFFECTED BY THREATS TO THE PUBLIC'S HEALTH.

Measure	FY	Target	Result
16.5.1: Prevent the importation and spread of infectious diseases to the U.S. in mobile populations and non-human-primates, as measured by meeting 4 of 4 targets for the following measures (16.5.2 - 16.5.5) *(Outcome)*	*Out-Year Target*	4 of 4 (2015)	Aug 31, 2016
	2007	Baseline	1 of 4
16.5.2: Increase the proportion of applicants for U.S. immigration screened for tuberculosis by implementing revised tuberculosis technical instruction (TB TI). *(Outcome)*	*2011*	45%	Jul 31, 2012
	2010	40%	Jul 31, 2011
	2009	35%	Jul 31, 2010
	2008	30%	32% (Target Exceeded)
	2007	Trend data	22%
	2006	Baseline	0%
16.5.3: Increase the likelihood of travelers seeking pre-travel medical advice for travel to Africa and Asia *(Outcome)*	*2011*	Africa: 34 Asia: 23	Dec 31, 2012
	2010	Africa: 32 Asia: 21	Dec 31, 2011
	2009	Africa: 30 Asia: 19	Dec 31, 2010
	2008	Africa: 29 Asia: 19	Africa: 52 (Target Exceeded) Asia: 14 (Target Not Met)
	2007	Trend data	Africa: 44 Asia: 18
	2006	Trend data	Africa: 49* Asia: 25
16.5.4: Increase of the percentage of immigrants and refugees with a "Class	*2011*	72%	Dec 31, 2012
	2010	70%	Dec 31, 2011
	2009	68%	Dec 31, 2010

Measure	FY	Target	Result
A or B medical notification for tuberculosis" who undergo medical follow-up after arrival in U.S *(Outcome)*	2008	65%	Feb 28, 2010
	2007	Trend data	65%
	2006	Baseline	60%
16.5.5: Maintain low mortality in nonhuman primates (NHP) imported to the U.S. for science, exhibition, and education. *(Outcome)*	2011	<1%	Dec 31, 2011
	2010	<1%	Dec 31, 2010
	2009	<1%	<1% (Target Met)
	2008	<1%	<1% (Target Met)
	2007	Trend data	<1%
	2006	Trend data	<1%
16.5.6: Protect the U.S. population by increasing the number of 25 US international airports and land borders covered by a communicable disease preparedness plan. *(Outcome)*	*Out-Year Target*	25 (2015)	Jan 31, 2016
	2008	Trend data	6
	2007	Trend data	9
	2006	Trend data	5
16.5.7: Increase the number of hospitals with MOAs in priority 1 cities. *(Outcome)*	2011	185	Jan 31, 2012
	2010	180	Jan 31, 2011
	2009	175	Jan 31, 2010
	2008	170	175 (Target Exceeded)
	2007	Trend data	163
	2006	Trend data	149
16.5.8: Increase the number of illnesses in persons arriving in the United States that are reported to CDC DGMQ by conveyance operators, CBP, and others. *(Outcome)*	2011	2,500	Dec 31, 2011
	2010	2,500	Dec 31, 2010
	2009	1,692	3,156 (Target Exceeded)
	2008	1,651	1,677 (Target Exceeded)
	2007	Trend data	1,543
	2006	Trend data	1,464
16.E.4: Decrease the cost of notifying state health departments of disease conditions in incoming refugees and immigrants by implementing the electronic disease notification system. *(Outcome)*	2011	$490,000	Dec 31, 2011
	2010	$511,000	Dec 31, 2010
	2009	$534,500	$404,404 (Target Exceeded)
	2008	$884,000	$838,426 (Target Exceeded)
	2007	Trend data	$1,393,663
	2006	Trend data	$1,461,172

Unique Identifier	Data Source	Data Validation
16.5.1	Data sources for annual measures 16.5.2 16.5.5 below.	As above.
16.5.2	Office of Immigration Statistics for yearly number of immigrant and refugee arrivals. The number of immigrants screened under the 2007 TB TI is equivalent to the number of immigrants from countries that have	The Department of Homeland Security maintains the official U.S. government statistics of foreign-born persons entering the U.S.

Unique Identifier	Data Source	Data Validation
	adopted the 2007 TB TI; hence the same data source applies.	
16.5.3	GeoSentinel, International Trade Administration Survey of International Travelers * Outlier value: because 2006 does not follow the trend from the three previous years, we are basing our targets on the 3-year trend instead.	GeoSentinel data are validated through site visits and record review, and are derived from the GeoSentinel database with regular data cleaning and used in numerous peer-reviewed publications. The survey of International Air Travelers is conducted on an ongoing basis since 1980s by the International Trade Administration (ITA), Office of Travel and Tourism Industries (OTTI). DGMQ purchases the database once a year from ITA.
16.5.4	Information on Migrant Populations (IMP); Electronic Disease Notification (EDN) system	Immigrants and refugees with a TB class condition undergo a medical evaluation after entry into U.S. Results of medical evaluation are transmitted to CDC from state health departments and recorded in one of two databases: IMP or EDN. IMP is a paper-based reporting system. EDN is an electronic database that will replace IMP.
16.5.5	CDC nonhuman primate importation program records - annual NHP mortality data	Data are validated by CDC staff site visits to importers.
16.5.6	Plan data are currently compiled and analyzed by contractor. International traveler data are collected by U.S. Department of Transportation (DOT) and U.S. Customs and Border Protection (CBP).	Plan data extracted from actual plan documents are submitted by CDC quarantine stations, and checked against a template. Air traveler data are obtained from airlines, and verified by DOT. CBP collects primary data on all international arrivals and validates them.
16.5.7	Signed CDC documents; Memorandum of Agreement Tracking System (MOATS)	Validity of legal documents is clear, and MOATS supports DGMQ personnel in the management and maintenance of established Memorandum of Agreements (MOAs) and information related to the MOA Program. MOATS standardizes and automates existing business processes for managing MOAs and notifying emergency contacts during a quarantine measure implementation. MOATS key functional categories include Station (Q-Station information), Port (various combinations), Memorandum (Hospital under MOA), Contact (Hosp., State and local HD and any other POC) and Workflow Management (user authentication/authorization). MOATS is on the SQL server and web based

Unique Identifier	Data Source	Data Validation
		and defines and validates user authentication and authorization within the system.
16.5.8	Quarantine stations enter these reports into the quarantine activity reporting system (QARS)	Data are reviewed by the DGMQ QARS team.
16.E.4	Man hours, equipment, and FedEx costs for IMP (2005-2006 paper-based system) versus EDN (2006-09 electronic system) including centralized EDN 'IMP	Man hours are actual and projected personnel costs for FTEs and contractors performing data entry; equipment costs include one time set up and annual costs and are based on actual 2007 costs; FedEx costs are costs by the Quarantine stations to send paperwork to DGMQ headquarters and to state health departments. *the baseline is based on only 8 versus 20 quarantine stations and from an exclusively decentralized paper based system to an exclusively centralized electronic system.

Long-term Objective 16.5, Performance Measure 1

The public health burden for each of the four annual measures is described in greater detail for each measure. As a composite long-term measure, it measures the overall trend towards preventing the importation and spread of infectious diseases to the U.S. through four different approaches for a key disease (i.e., tuberculosis), in key populations (i.e., in immigrants, refugees, and travelers), and in key regulated animals (non-human primates).

In addition to benefiting the populations targeted in the measures, U.S. citizens, public health programs, and the research community at large benefit from preventing, regulating, controlling, and providing guidance for the measured diseases and populations.

The long-term measure with its four annual measures is in direct alignment with the Division of Global Migration and Quarantine's (DGMQ) regulatory authority and mission of preventing the importation and spread of infectious diseases in the U.S. and covers the range of legal requirements towards achieving the mission to appropriate public health interventions, guidance, and communication necessary to achieve its mission. They also are representative of DGMQ's mandate to provide scientific and programmatic leadership in achieving DGMQs mission.

Measurements are described for each annual measure of which this composite long-term measure is comprised. In order achieve the long-term measure each annual measure has to have reached its final target. Hence, while each annual measure shows a positive trend for past performance, only one of the annual measures has reached its target and is being measured by maintaining the target.

Achieving the targets in all four annual measures is ambitious because of competing priorities and because each measure is ambitious. Given that all four annual measures directly align with DGMQs mission, DGMQ staff is dedicated to continue working towards their progress and focus their energy towards achieving the targets for all measures simultaneously.

Long-term Objective 16.5, Performance Measure 2

The majority (57 percent) of TB cases diagnosed in the U.S. are diagnosed in persons born outside the U.S. Medical screening for TB is legally required of applicants of U.S. immigration in order to receive a

visa and enter the U.S. The overseas TB screening algorithms were last released in 1991 and had become inadequate to meet the challenges of modern TB control. For example, studies demonstrated that the 1991 instructions were insensitive in detecting all cases of TB disease, preventing importation of TB into the U.S., or detecting cases of drug resistant TB, including multidrug resistant TB (MDR TB). For these reasons, the algorithms were updated in 2007. Assessments of the performance of this measure therefore begin with implementation of the 2007 TB TI. The updated algorithm is being implemented in countries prioritized on factors including immigration volume and burden of TB. Improving TB screening of this population is an opportunity to appropriately diagnose and treat persons with TB disease before they arrive in the U.S. and identify persons at risk for having TB disease for prompt stateside follow-up. Improving the TB screening should contribute to decreasing the burden of TB in the U.S. among foreign-born populations overall.

The outcome being measured is the proportion of overseas applicants for U.S. immigration screened according to modernized tuberculosis (TB) screening protocols. Because all immigrants coming from a country which has implemented the revised TB TI will be screened accordingly, the number of arriving immigrants from that country and those screened for TB under the revised TB TI is identical.

In FY 2008, CDC met the target of 30 percent due to targeted implementation efforts revised TB TIs in countries with large immigrant volumes. At the end of FY 2008, DGMQ had implemented the 2007 Technical Instructions for Tuberculosis Screening and Treatment (TB TI, http://www.cdc.gov/ncidod/dq/panel_2007.htm) in only 11 countries. However, based on FY 2008 immigration statistics, immigrants from those eight countries represent 32 percent of the arriving immigrant population. For future years, CDC will continue to target countries that are large source countries for immigration. To maintain momentum, CDC will ultimately require additional resources in order to provide similar increases in proportion screened by implementing the 2007 TB TI in a larger number of countries simultaneously.

Long-term Objective 16.5, Performance Measure 3

With globalization of the world's economy the risk of translocation of infectious disease via travel and transportation is increasing. In 2006, there were 35 million individual travelers departing the United States (U.S.) to go overseas; these travelers took more than 63 million trips of at least one night abroad. Our ability to protect the U.S. from the introduction of infectious diseases depends at least in part on CDC's ability to educate U.S. travelers and healthcare providers about immunizations, medications, and other precautions to ensure safe and healthy travel while abroad and upon returning to the U.S. Because the highest disease risk is for travel to Africa and Asia, CDC currently focuses its outreach and educational activities on travelers to those two continents.

This measure is designed to ensure that travelers leave the U.S. and return to the U.S. healthy, both to protect their own health and that of others. The indicator for this measure is relative likelihood. The above ratios for Africa and Asia will be compared to travel to an area where there is a low(er) likelihood of seeking pre travel advice (Eastern Europe) to compare the relative likelihood of a traveler seeking pre travel health advice for a particular region. The result should be read as: In (year), compared to travelers to Eastern Europe, travelers to (Asia or Africa) were X times more likely to have sought pre travel advice.

Our efforts to increase the proportion of U.S. travelers to Asia and Africa seeking pre travel advice will be challenging because of annual increases in the number of international travelers going abroad from the U.S.; Reports of introduction and spread of infectious diseases via travel and transportation due to globalization; Increase in proportion of Visiting Friends and Relatives travelers: within U.S. travelers there is a subset of travelers we term travelers visiting friends and relatives (VFR travelers). VFRs are people born in an underdeveloped or developing country, who now reside in the U.S. and are returning to their country of origin to visit friends and relatives. Our data show that VFRs do not heed pre travel advice for vaccinations and antimalarial prophylaxis at the same rate as business or tourist travelers do.

With the changing demographics of the U.S. population the number of VFR travelers will be increasing every year.

In order to overcome these challenges and meet the ambitious targets developed, DGMQ will increase efforts to reach and educate travelers and healthcare providers through continued enhancements to CDC's travel health website and publication of the Yellow Book. In addition, DGMQ will expand outreach to State Health Departments, health insurance companies, travel industry, student travel associations, and missionary associations.

FY 2008 actuals will not be available until January 2010 because the data set from the International Trade Administration is not available until that time and the significant time required to analyze data. CDC therefore requests that its annual reporting date for this measure be moved to December 2009 and all subsequent years.

Long-term Objective 16.5, Performance Measure 4

The majority (57 percent) of tuberculosis cases diagnosed in the U.S. are diagnosed in persons born outside the U.S. Tuberculosis (TB) represents the largest burden of infectious disease in immigrant and refugee populations. The overseas medical examination identifies persons with TB and those at risk of having TB and in need of prompt follow-up after arrival in the U.S. Improving TB follow-up evaluation of this population is an opportunity to appropriately diagnose and treat persons with TB disease soon after they arrive in the U.S. and minimize secondary transmission to others. Improving the TB follow-up evaluation should contribute to decreasing the burden of TB in the U.S. among foreign-born populations.

The team devoted to increasing the proportion of arriving immigrants and refugees receiving a domestic evaluation will build relationships with collaborators to enhance follow up reporting, contact tracing, and agreement for screening and treatment guidelines. Collaborators include: CDC Division of Tuberculosis Elimination, the Advisory Council for the Elimination of Tuberculosis, National Tuberculosis Controllers Association, STOP TB USA, and state and local health departments performing the domestic evaluations.

Due to a change in the reporting format from California during 2008 the program is still working to manually enter data. Because of the change in format, data from California must be entered manually from paper copy forms. This is a time consuming process and the program is working with California to get data submitted electronically. Data should be available for reporting in a few months (i.e. February of 2010). While working with California to get data submitted electronically, future reporting dates have been revised to December to allow CDC to obtain the necessary data.

Long-term Objective 16.5, Performance Measure 5

Maintaining low mortality in imported nonhuman primates (NHPs) means they are healthier when they arrive in the U.S., thus decreasing the likelihood that people will be exposed to/become infected with zoonotic pathogens carried by NHPs. Generally, NHPs are imported for scientific research, education or exhibition. Outbreaks of serious illness can result in the euthanasia of the entire shipment, resulting in an economic loss to the importer and a potential shortage of available animals for research. For example, a shipment of 100 NHPs could be lost to research if mortality were not kept low, resulting in a substantial economic loss to the importer at approximately, $6,000 per NHP. Additionally, if a researcher purchases 20 animals to add to his 80 that are already on a long term study and the animals became ill with an infectious disease, he would lose all 100 animals. Importing healthier animals results in less illness and death during the quarantine period and decreases the potential zoonotic disease exposure to people. NHPs can carry diseases of public health concern such as Ebola, shigella, salmonella and tuberculosis.

This measure gauges annual mortality of NHPs in quarantine in U.S. importer facilities by reviewing importer records and conducting site visits to importers. In the late 1980's mortality among imported NHP was around 20 percent and importers were not provided with clear and strict guidance as to the

proper shipment and keep of the animals. When DGMQ put out guidance, which continues to be refined, and implemented regular site visits to importers, mortality in imported NHP was reduced to less than one percent. The developed targets are ambitious because to maintain this low mortality rate, registered importers must be in good compliance with CDC regulations. Sites must be visited by CDC staff at least once per year, with all protocols reviewed and violation letters sent, with follow up and monitoring to ensure violators are in compliance with CDC's requirements. A mortality rate of zero is not realistic as animals will die for a variety of reasons that are outside regulatory control. An example of this would be a NHP that died as a result of trauma, stress due to shipment, or environmental factors such as getting overheated or cold.

A programmatic challenge is CDC staffing for regular inspections of each registered importer to assure compliance with our regulations. Inspections are necessary as issues are usually identified that need correction or clarification from the importer to assure that the risk to public health is low. In FY 2009, CDC maintained a rate of less than one percent mortality in imported NHP. To continue to meet future targets, DGMQ will cross-train CDC employees for facilities inspections; review and approve importer protocols on a regular basis; and update CDC nonhuman primate importation regulations to clarify requirements and to address problems that were not addressed in previous guidelines issued by CDC; and update CDC nonhuman primate importation regulations to clarify requirements and to address problems that were not addressed in previous guidelines issued by CDC.

Long-term Objective 16.5, Performance Measure 6

The first opportunity to detect and control imported infectious diseases is at international ports of entry. The 25 top US international airports and land borders account for about 85% of international arrivals in this country. A comprehensive communicable disease preparedness plan at such ports increases the likelihood that control will be successful. Such plans integrate the responses of all relevant agencies.

Existing plans have been developed through ongoing and oftentimes intense collaboration among a wide range of agencies, each of which would receive benefit from the plan in the event of a public health emergency at the port. The agencies include, but are not limited to: air and sea port authorities, local EMS, public health agencies at all levels, hospitals, US Department of Homeland Security (Customs and Border Protection (CBP), Transportation Security Administration (TSA), United States Coast Guard (USCG), local fire departments and law enforcement. Overall, the plans are designed to protect the U.S. population from the importation and spread of infectious diseases.

Preparedness for communicable disease emergencies at ports of entry is at the heart of DGMQs mission to control entry of infectious disease. Port preparedness plans help ensure CDC's ability to control public health emergencies.

Preparedness is central to IOM's recommendations. The IOM recommended that CDC/DGMQ strategically lead the United States in its effort to minimize the effect of imported infectious disease. These port preparedness plans represent a concrete product of CDC's leadership and partnership with local agencies.

Preparedness plans are measured according to completeness of recommended elements met; a plan is considered to have met its target when it includes at least 95 percent of recommended elements and how each port would address each issue. The issues include command and control, who will respond, assignment of responsibilities, aircraft and ship movement, care for ill passengers (where, how, by whom, how to prevent exposure and infection of others), quarantine of exposed passengers, personal protection of responders, prophylaxis, security, media relations, legal issues, and aircraft/vessel decontamination. Actual execution of these issues is remarkably complex. An ad hoc approach invites less-than-optimal outcomes, loss of the public's confidence and support, and unnecessary morbidity, mortality, and expense.

Development of plans was initiated in 2005 at which time two plans were present (they had to be revised to an updated template) when DGMQ had the minimum critical staff for this activity. In 2004, there were only 30 members of DGMQ's field staff which increased to 60 by 2005, thus allowing DGMQ to dedicate more resources to plan development. By 2008, 83 field staff at CDC's quarantine stations dedicated a portion of their time towards plan development working towards the goal of 25 port preparedness plans by fiscal year FY 2015. In addition to field staff, DGMQ has initiated several activities to reach progress to date towards this goal including:

1. Each quarantine station initiated development of a plan for its port(s) in collaboration with local partners.

2. DGMQ headquarters staff has supported the individual stations by:

   - Gathering and compiling plans from ports;

   - Defining critical components;

   - Identifying lessons learned; and

   - Creating a template with 22 recommended elements to improve content and national consistency.

3. DGMQ produced and evaluated exercises of the plans at individual ports.

4. DGMQ created a Port Preparedness Team in order to focus resources on system-wide planning activities.

During FY 2008, DGMQ developed a port of entry public health emergency response plan template with sample information and text, and 22 recommended planning elements. Much has been accomplished in the development of public health emergency response plans at ports of entry. A follow up 2008 assessment of public health emergency response plans shows that 20 ports of entry where CDC quarantine stations are located (100 percent) do have a public health emergency response plan in place. However, only six of these ports of entry (30 percent) had adequately addressed all (95-100 percenet) of the recommended planning elements. DGMQ is working closely with these ports of entry to ensure that all plans reach the goal of incorporating at least 95 percent of all recommended elements.

Over the next 12 months, DGMQ will update and revise its quarantine station public health emergency response plan template in coordination with port of entry and community partners. Following the template plan update, quarantine stations will be asked to revise and update their port of entry response plans. During FY 2009, DGMQ will reevaluate quarantine station communicable disease response plans and provide recommendations for improvements, as needed.

Long-term Objective 16.5, Performance Measure 7

Priority one cities have the largest number of passenger volume via commercial aircraft or border crossings and are therefore at increased risk for introduction and spread of infectious diseases. Having a Memorandum of Agreement (MOA) in place allows rapid selection of a referral hospital if and when a passenger with a potentially communicable disease arrives. The MOA process ensures that the hospital has adequate facilities to care for such passengers without endangering the health of other patients or the wider community. CDC has worked with state health departments to identify and enlist appropriate hospitals in high priority cities.

This measure shows how CDC has prepared to provide clinical care for passengers, who enter the U.S. with a potentially quarantinable disease or a disease of public health significance. Specifically, it describes the availability of a hospital in a port city that is capable of providing care to such passengers in a safe manner (e.g., including demonstration of isolation capabilities). Excellent progress was made

initially because legacy hospitals could be enrolled based on the newly established Preparedness Criteria for Healthcare Facilities. Progress slowed because new hospitals needed to be identified, key regions have been unwilling to participate, and pediatric hospitals are more reluctant to agree than adult care hospitals.

In FY 2008, CDC exceeded the target of 170 hospital MOAs in priority 1 cities. Quarantine system expansion has allowed for growth in partnerships with state and local health departments and hospitals which contributed to CDC's success in exceeding this performance target.

Long-term Objective 16.5, Performance Measure 8

Each year about 600 million persons cross into the U.S. temporarily or permanently. Each of these entries poses some risk of introduction of communicable disease. CDC's Division of Global Migration and Quarantine (DGMQ) operates quarantine stations at 20 strategically selected ports of entry that cover approximately 85 percent of U.S. bound international travelers. However, DGMQ staff is not present at hundreds of ports and cannot visualize each and every person for signs of illness. DGMQ relies on conveyance operators or medical staff, the U.S. Coast Guard, and especially U.S. Customs and Border Protection (CBP) to be DGMQ's eyes and ears at all U.S. entry points. CBP, for example, conducts passive public health surveillance on every person entering the U.S. based on DGMQ guidance and training, and plays an important role in reporting ill travelers to CDC for public health response. The number of reports received by DGMQ is an indication of DGMQ's success at forming public health partnerships with these other entities. The partnerships reflected in these reports offer the reporting entities better access to DGMQ's expertise on issues that are of direct importance to their staff in the field. The general public benefits by the potential of limiting further disease spread from the affected individual(s) to others, by being made aware of their potential exposure risk, and by potentially receiving prophylaxis prior to disease onset after being exposed.

This is a direct measurement of the number of illnesses reported to DGMQ. The change in the number of reports is an indirect measure of the intensity of efforts to work directly with partners, whether through training, exercises, the formation of relationships between CDC staff and individuals in the field, or formal written reminders of reporting requirements. Targets developed are ambitious because reaching them will require intense training and educational efforts to reach partners. The targets are ambitious because of the challenge of limited staff to enhance interactions and trainings in ports far from quarantine stations, while at the same time performing routine work at the stations. Additional challenges include competing priorities of partners, high staff turn over at some ports, and a potential disincentive of conveyance operators to report illness on a conveyance.

The primary strategy towards achieving these targets include leveraging state and local public health agencies to train staff of CBP, U.S. Coast Guard, etc. at sites distant from quarantine stations; placing a DGMQ trainer at the CBP Academy at the Federal Law Enforcement Training Center; and developing and providing web-based training modules to be distributed to CBP Officers in the field for refresher training.

In FY 2009, CDC exceeded the target of 1,692 illnesses reported. The significant increase in FY 2009 is due to a new interface between the Maritime Illness & Death Reporting System (MIDRS) and QARS and the 2009 H1N1 pandemic. The MIDRS interface with QARS enabled the maritime industry (i.e. cruise lines) to more easily enter report of ill persons on maritime conveyances to CDC Vessel Sanitation and DGMQ, hence the large increase in total number of reports. The placement of the DGMQ trainer at the CBP Academy at the Federal Law Enforcement Training Center in 2008 has also been very effective in increased illness reporting. In addition to this trainer, quarantine system expansion has allowed for growth in partnerships and web-based training modules that have also contributed to CDC's success in exceeding this performance target. Targets have been adjusted in 2010 and 2011 based on current performance levels and factoring in increased in 2009 related to the H1N1 pandemic.

Long-term Objective 16.5, Efficiency Measure 4

An overseas medical examination, performed by more than 650 panel physicians worldwide, is required for immigrant visa and refugee status applicants, before migrating to the U.S. New immigrants and refugees arrive in the U.S. each year with this medical examination documentation. For immigrants and refugees arriving with a Class A/B medical condition, such as tuberculosis (TB), DGMQ notifies the local/state health department of their arrival to ensure medical follow up and electronically submit their medical information. This information is stored in the Electronic Disease Notification (EDN) system. The EDN system is replacing an untimely hard-copy mailing system prone to loss of information that used the U.S. postal service. Complete information from the thorough medical screening is entered for all refugees arriving in the U.S. each year, and for immigrants only those records indicating Class A/B conditions are being entered.

The EDN system is reliable, timely and secured to enable health officials to quickly receive information that requires follow up of immigrants and refugees with suspect TB and prevent the spread of infections diseases. The EDN system has demonstrated improvement in processing time and data quality compared to the old notification method. Prior to EDN, it often took one-two weeks to notify the states from the moment the alien arrived to the U.S. and, at times, even several weeks. Timelier information allows health departments to reach more patients in total and before they may have moved or have become infectious and in turn exposed others. .The efficiency measurement model illustrates the anticipated cost savings despite the significant increase of time spent on data entry, scanning and medical review to ensure quality.

In FY 2009, CDC exceeded the performance target by reducing costs to a little over $400,000 to run EDN. However, to better serve health departments as rates of entry into the U.S. increase, CDC will be required to hire additional data entry staff in FY 2010. These additional data entry staff will allow for the continuation of timely and high quality data entry.

STRATEGIC NATIONAL STOCKPILE

Measure	FY	Target	Result
16.E.2: Dollars saved per $1 invested in the Food and Drug Administration's (FDA) Shelf Life Extension Program (SLEP) for available projects. *(Outcome)*	2011	$20	Dec 31, 2011
	2010	$18	Dec 31, 2010
	2009	$28	$15 (Target Not Met but Improved)
	2008	$28	$10 (Target Not Met)
	2007	$26	$13 (Target Not Met)
	2006	$24	$20 (Target Not Met)

Unique Identifier	Data Source	Data Validation
16.E.2	CDC's SNS analysis of product Life Cycle Tools.	CDC's SNS coordinates with the FDA and maintains an internal tracking system for identification of products that may be eligible for the SLEP.

Efficiency Measure 16.E.2:

CDC will continue to partner with the U.S. Food and Drug Administration (FDA) on the Shelf Life Extension Program (SLEP). The return on investment (ROI) calculation for Strategic National Stockpile (SNS) participation in SLEP is based on each dollar spent on SLEP costs (e.g., testing, shipping, re-labeling). Cost avoidance projections do not reflect fluctuations in product handling costs or the actual amount of product eligible for FDA SLEP program. Combined, these variables account for the actual performance since the FY 2005 baseline of 22 dollars. For FY 2008, return on investment (ROI) was 10 dollars for each dollar spent on SLEP costs. In order to capture the true efficiency gained by participating in the program, the focus should be on the actual ROI. CDC will continue to pursue cost avoidance savings and explore long term strategies for assessing the value of extending shelf life in association with participation in the SLEP program in FY 2009.

For FY 2009, ROI was 15 dollars for each dollar spent on SLEP costs, an increase over FY 2008. In order to capture the true efficiency gained by participating in the program, the focus should be on the actual ROI. CDC will continue to pursue cost avoidance savings and explore long term strategies for assessing the value of extending shelf life in association with participation in the SLEP program in FY 2010.

It is important to note that the performance targets reflect incremental progress and may not accurately capture the true efficiency gained by participating in the FDA SLEP program. For example, actual cost avoidance figures may be much higher or lower than targets due to the volume of stockpiled products eligible for SLEP during the planning period. Actual cost avoidance projections are also affected by fluctuation in handling costs.

LONG TERM OBJECTIVE 16.6: DECREASE THE TIME NEEDED TO PROVIDE COUNTERMEASURES AND HEALTH GUIDANCE TO THOSE AFFECTED BY THREATS TO THE PUBLIC'S HEALTH.

Measure	FY	Target	Result
16.6.3: Number of treatments/prophylaxis for the appropriate response to known terrorist threats or public health emergencies for chemical, biological, radiological and nuclear threats in millions. *(Outcome)*	2011	TBD per BARDA	
	2008	2.3, 60, 0.17	N/A
16.6.4: The number of successful annual exercises that test response to multiple events with a 12-hour response time. *(Outcome)*	2011	1	Dec 31, 2011
	2010	1	Dec 31, 2010
	2009	1	1 (Target Met)
	2008	1	1 (Target Met)
	2007	1	1 (Target Met)
	2006	1	1 (Target Met)
16.6.5: Number of trained and ready Technical Advisory Response Units (TARU) for response to multiple events. *(Output)*	2011	9	Dec 31, 2011
	2010	9	Dec 31, 2010
	2009	7	9 (Target Exceeded)
	2008	9	9 (Target Met)
	2007	7	6 (Target Not Met)
	2006	6	6 (Target Met)
16.6.6: Percentage of inventory discrepancies that are reduced by using quality inventory management systems. *(Outcome)*	2011	<5%	Dec 31, 2011
	2010	<5%	Dec 31, 2010
	2009	<5%	0.67% (Target Exceeded)
	2008	<5%	0.88% (Target Exceeded)
	2007	<5%	24.33% (Target Not Met)
	2006	<5%	0.33% (Target Exceeded)

Unique Identifier	Data Source	Data Validation
16.6.3 – 16.6.4	DSNS	DSNS maintains internal tracking systems to monitor its ability to deliver critical medical assets in a national emergency. A Stockpile Resource Planning (SRP) database and inventory system is used to track and validate stockpiled material.
16.6.5	DSNS	DSNS maintains internal tracking systems to monitor its ability to deliver critical medical assets in a

Unique Identifier	Data Source	Data Validation
		national emergency. An internal roster of Emergency Response Teams is updated daily.
16.6.6	DSNS	DSNS maintains internal tracking systems to monitor its ability to deliver critical medical assets in a national emergency. A Stockpile Resource Planning (SRP) database and inventory system is used to track and validate stockpiled material.

Long-term Objective 16.6, Performance Measure 3

The Division of Strategic National Stockpile (DSNS) in CDC's Office of Public Health Preparedness and Response went through OMB's program assessment process in 2005. Since that time, DSNS has undergone internal strategic planning processes first at the CDC Coordinating Center level and then a cascaded planning process at the program level. These strategic planning processes complimented CDC Goals for Public Health Preparedness. Also since the completion of the program assessment, the Pandemic and All Hazards Preparedness Act was passed and provides guidance for the development of medical countermeasure acquisition targets that will impact the Strategic National Stockpile (SNS). Acquisition targets for this measure are set by the Biomedical Advanced Research and Development Authority (BARDA) and are not publicly released.

Long-term Objective 16.6, Performance Measure 4

CDC conducted one exercise during the second half of FY 2009 to test its response operations and validate the ability to respond to multiple public health emergencies in a timely manner. The annual exercise to fulfill this measure requirement allowed SNS to test a 12 hour response capability during more than one event scenario, which strengthens CDC's preparedness capacity.

CDC has conducted one full scale anthrax exercise each year from FY 2005 through FY 2008, meeting the targets for this measure. CDC conducted a full scale anthrax exercise at the end of FY 2008 to test its response operations and validate the ability to respond to multiple public health emergencies in a timely manner. The annual full scale exercise allowed the Strategic National Stockpile (SNS) to test a twelve-hour response capability with more than one event. CDC plans to conduct annual exercises in FY 2010 and FY 2011 to meet future targets.

Long-term Objective 16.6, Performance Measure 5

As a result of a program evaluation, the Division of Strategic National Stockpile (DSNS) in The Coordinating Office for Terrorism Preparedness and Emergency Response (COTPER) developed new performance measures. The performance target for the following measures for FY 2007 was set at an approximate target level, and the deviation from that level is slight. There was no effect on overall program or activity performance. In FY 2008, CDC reduced its TARU target from nine in FY 2008 to seven in FY 2009 and projected sustainment of those seven teams through FY 2011. In FY 2009, CDC met its goal of nine trained and ready Technical Advisory Response Units (TARU) for response to multiple events. At the end of FY 2009, TARU capacity remains above the target level.

During FY 2009 DSNS reassessed the deployment strategy of Technical Advisory Response Unit (TARU) teams and decided to transition from the TARU fixed team structure to a pool of specialized DSNS responders in order to better support state and local jurisdictions. This new strategy allows the DSNS to deploy tailored teams of technical specialists in the same strategic manner as TARU while continuing to provide the highest level of support needed to support our partners and stakeholders during an event. Full implementation of the new deployment strategy is expected in FY 2010.

Long-term Objective 16.6, Performance Measure 6

As a result of OMB's program assessment and Strategic National Stockpile (SNS) planning process, CDC developed performance measures to track inventory discrepancies. The discrepancy percentage represents the total number of instances where the locations for items identified for that quarter's inventory do not exactly match with the inventory report for that item. In FY 2006, inventory discrepancies were reduced to 0.33 percent, exceeding the target of less than five percent. In FY 2007, discrepancies were at the rate of 24.33 percent. This large discrepancy rate was caused by a single clerical error and no SNS items were lost as a result of that error. As of the fourth quarter of FY 2008, the SNS discrepancy target has been met with a 0.88 percent actual rate. As of the fourth quarter of FY 2009, the SNS discrepancy target has been met with a 0.67 percent actual rate. Over the past three fiscal years, systems and inventory management processes have been implemented to improve program performance, resulting in a more consistent accuracy rate. Future strategies are being explored to introduce electronic data collection systems to enhance inventory accuracy and accountability.

STRATEGIC PLAN

As the nation's prevention agency and a leader in improving public health across the world, CDC's prevention and control efforts have saved lives, reduced disparities, lowered costs, and improved the quality of life for millions of people. Consistent with its commitment to continuous improvement, the agency embraces the challenge to realize ever greater public health impact.

CDC's vision for a safer, healthier nation is accomplished through five strategic priorities:

1. **Strengthening epidemiology and surveillance** – Quality surveillance data serve as the foundation for program planning and evaluation in public health practice. CDC's data collection, analysis and dissemination serves as a key resource nationally and across the globe in detecting emerging threats, monitoring ongoing health issues and their risk factors, and identifying and monitoring the implementation of strategies to prevent disease and promote health.

2. **Supporting state and local public health** - Strong state and local systems, the cornerstone of public health practice across the country, are critical to meeting public health needs in a timely, efficient, and effective manner.

3. **Providing leadership in global health –** With international travel, interdependent food systems, and global migration, the health of people across the world increasingly impact the health and safety of Americans. In this increasingly interconnected world, CDC plays a key role in US contributions to global health that, in turn, serve to strengthen and protect the health of our nation. Our vision for global health is healthier, safer, and longer lives worldwide through science-based public health action.

4. **Applying effective health policy** – As we further develop our understanding of effective ways to improve the health of our nation, it has become increasingly clear that the policies we promote and implement nationally as well as at state and local levels have an important impact on health. CDC promotes the use of evidence-based policy to realize maximum public health impact. Our goal is to bring about policies that result in demonstrable improvements in public health— globally and at the federal, state and, local levels.

5. **Addressing the leading causes of death and disability** – Through a focus on the leading causes of premature death, disability, and injury and the health disparities associated with these health outcomes, CDC can substantially impact the health of the nation overall.

Essential to these strategic priorities is a commitment to scientific excellence, the highest standards of quality and ethical practice, the elimination of health disparities, and the preparation of skilled public health practitioners and scientists. These five strategic priorities support the effective implementation of our scientific and programmatic activities and the agency's budget is aligned with agency priorities. CDC is currently realigning and strengthening its organization to best accomplish its mission. Our new offices of Surveillance, Epidemiology and Laboratory Services and State and Local Support are designed to better address our strategic priorities and to focus and strengthen our work in these areas. CDC's National Centers conduct and support the highest quality science that drives the agency's work as well as support planning, management and evaluation of health programs. The new Center for Global Health

will coordinate and expand our efforts to achieve goals to improve health, including disease eradication and elimination targets and expand CDC's global health programs that focus on the leading causes of mortality, morbidity and disability, especially chronic disease and injuries. As always, CDC's program Divisions and National Centers are responsible for planning and implementing scientific and programmatic activities, overseeing their quality, and monitoring their impact. The agency's planning and performance measurement cycle is aligned with the federal budget cycle and CDC will continue to be guided by Administration and Congressional intent to ensure that categorical disease dollars target the appropriate activities.

Supporting HHS Strategic Goals and Objectives

As an operating division of HHS, CDC makes significant contributions to the development and advancement of the HHS Strategic Plan 2007–2012. Our strategic priorities have been informed by the strategic goals and objectives of the Department and the Secretary's Priorities.

Each of our each of our strategic priorities support:

- Improve health care quality, safety, cost and value (HHS Strategic Objective 1.3)

- Preventing the spread of infectious diseases (HHS Strategic Objective 2.1);

- Protecting the public against injuries and environmental threats (HHS Strategic Objective 2.2);

- Promote and encourage preventive health care, including mental health, lifelong healthy behaviors and recovery (HHS Strategic Objective 2.3);

- Prepare for and respond to natural and man-made disasters (HHS Strategic Objective 2.4);

- Promote the economic independence and social well-being of individuals and families across the lifespan (HHS Strategic Objective 3.1);

- Protect the safety and foster the well-being of children and youth (HHS Strategic Objective 3.2);

- Encourage the development of strong, healthy and supportive communities (HHS Strategic Objective 3.3);

- Addressing the needs, strengths, and abilities of vulnerable populations (HHS Strategic Objective 3.4);

- Conducting and overseeing applied research to improve health and well-being (HHS Strategic Objective 4.3); and,

- Communicating and transferring research results into clinical, public health, and human service practice (HHS Strategic Objective 4.4).

In addition, our five strategic priorities align clearly align significantly with other goals and objectives as illustrated in Table 1.

Supporting Healthy People 2010 National Health Objectives

CDC will continue to support the Healthy People effort through Healthy People 2020 is committed to the success of Healthy People process and to assist in the success of achieving Healthy People 2020 aims, both through the process of setting and prioritizing goals and objectives as well as supplying the vast bulk of the data used to measure progress. Through our engagement in the development process and CDC's integration of Healthy People measures into our strategic and operational planning efforts, the Agency is strategically aligned with and responsive to the health objectives of the nation.

LINKS TO HHS AND CDC STRATEGIC PLANS

	CDC STRATEGIC GOALS				
	Surveillance and Epidemiology	State and Local Support	Global Health	Health Policy	Leading Causes
HHS STRATEGIC GOALS					
GOAL 1: Health Care: Improve the safety, quality, affordability and accessibility of health care, including behavioral health care and long-term care.	X	X	X	X	X
1.1 Broaden health insurance and long-term care coverage.	-	-	-	X	-
1.2 Increase health care service availability and accessibility.	-	X	X	X	X
1.3 Improve health care quality, safety, cost and value.	X	X	X	X	X
1.4 Recruit, develop and retain a competent health care workforce.	X	X	X	X	
GOAL 2: Public Health Promotion, Disease Prevention, Emergency Preparedness: Prevent and control disease, injury, illness and disability across the lifespan, and protect the public from infectious, occupational, environmental and terrorist threats.	X	X	X	X	X
2.1 Prevent the spread of infectious diseases.	X	X	X	X	X
2.2 Protect the public against injuries and environmental threats.	X	X	X	X	X
2.3 Promote and encourage preventive health care, including mental health, lifelong healthy behaviors and recovery.	X	X	X	X	X
2.4 Prepare for and respond to natural and man-made disasters.	X	X	X	X	
GOAL 3: Human Services: Promote the economic and social well-being of individuals, families and communities.	X	X	X	X	X
3.1 Promote the economic independence and social well-being of individuals and families across the lifespan.	X	X	X	X	X
3.2 Protect the safety and foster the well-being of children and youth.	X	X	X	X	X
3.3 Encourage the development of strong, healthy and supportive communities.	X	X	X	X	X

	CDC STRATEGIC GOALS				
	Surveillance and Epidemiology	State and Local Support	Global Health	Health Policy	Leading Causes
HHS STRATEGIC GOALS					
3.4 Address the needs, strengths and abilities of vulnerable populations.	X	X	X	X	X
GOAL 4: Scientific Research & Development: Advance scientific and biomedical research and development related to health and human services.	**X**	**X**	**X**	**X**	**X**
4.1 Strengthen the pool of qualified health and behavioral science researchers.	X	X	X	-	-
4.2 Increase basic scientific knowledge to improve human health and development.	X	X	X	-	-
4.3 Conduct and oversee applied research to improve health and well-being.	X	X	X	X	X
4.4 Communicate and transfer research results into clinical, public health and human service practice.	X	X	X	X	X

ADDITIONAL ITEMS

FULL COST TABLE

Unique ID	Goals and Performance Area	FY 2009	FY 2010	FY 2011
FY 2011 BUDGET SUBMISSION				
CENTERS FOR DISEASE CONTROL AND PREVENTION				
SUMMARY OF FULL COST				
(DOLLAR IN MILLIONS)				
HHS Strategy Goal 1				
HHS Strategy Goal 1.3				
INFECTIOUS DISEASES				
Preparedness, Detection, and Control of Infectious		**$19.2**	**$4.1**	**$4.3**
4.1	Goal 1	$1.4	$1.5	$1.6
4.1.1	*Measure 1*	$0.3	$0.3	$0.3
4.2	Goal 2	$17.8	$2.6	$2.7
4.2.1	*Measure 1*	$1.2	$1.7	$1.7
4.2.3	*Measure 3* [5]	TBD	TBD	TBD
ENVIRONMENTAL HEALTH AND INJURY				
Environmental Health		**$130.0**	**$132.1**	**$123.8**
10.1	Goal 1	$130.0	$132.1	$123.8
10.1.3	*Measure 3*	$7.5	$7.7	$7.2
	Sub-total	**$149.2**	**$136.2**	**$128.1**
HHS Strategy Goal 2				
HHS Strategy Goal 2.1				
INFECTIOUS DISEASES				
Immunization and Respiratory Diseases [1]		**$4,171.0**	**$4,426.5**	**$4,287.9**
Immunization Grant Program		*$3,995.0*	*$4,250.0*	$4,145.8
1.1	Goal 1[1]	$1,974.5	$2,102.0	$2,054.3
1.1.1	*Measure 1*	$197.5	$210.2	$205.4
1.1.2	*Measure 2*	$29.6	$31.5	$30.8
1.1.3	*Measure 3*	$29.6	$31.5	$30.8
1.1.4	*Measure 4*	N/A	$31.5	$30.8
1.2	Goal 2[1]	$1,974.5	$2,102.0	$2,054.3
1.2.1	*Measure 1*	$543.0	$578.0	$564.9
1.2.2	*Measure 2*	$49.4	$52.5	$51.4
1.3	Goal 3	$45.9	$46.0	$37.1
1.3.1	*Measure 1*	$1.4	$1.4	$1.1
1.3.2	*Measure 2*	$1.4	$1.4	$1.1
1.4	Goal 4	N/A	N/A	N/A
1.4.1	*Measure 1*	N/A	N/A	N/A
Influenza		*$176.0*	*$176.5*	$142.1
1.6	Goal 1	$176.0	$176.5	$142.1
1.6.2	Measure 2	$39.6	$39.7	$32.0
HIV/AIDS, Viral Hepatitis, STD and TB Prevention		**$936.4**	**$975.4**	**$989.6**
HIV/AIDS, Research and Domestic		$890.5	$928.9	$943.7
2.1	Goal 1	$536.7	$561.7	$572.5
2.1.1	*Measure 1*	$536.7	$561.7	$572.5
2.1.2	*Measure 2*	$2.3	$2.4	$2.4
2.1.3	*Measure 3*	$274.2	$298.2	$304.0
2.1.4	*Measure 4*	$112.2	$124.1	$126.5
2.1.5	*Measure 5*	$56.1	$48.9	$36.6
2.1.6	*Measure 6*	$24.2	$25.3	$25.8
2.1.7	*Measure 7*	$20.0	$24.2	$24.6
2.1.8	*Measure 8*	$20.0	$20.9	$21.3
2.2	Goal 2	$35.3	$36.6	$37.0
2.2.1	*Measure 1* [2]	$2.3	$3.1	$3.1
2.2.2	*Measure 2*	$2.3	$3.1	$3.1
2.3	Goal 3	$141.1	$146.5	$148.0
2.3.1	*Measure 1* [2]	$141.1	$146.5	$148.0
2.3.2	*Measure 2*	$141.1	$146.5	$148.0
2.4	Goal 4	$151.2	$157.0	$158.7
2.4.1	*Measure 1* [2]	$151.2	$157.0	$158.7
2.4.2	*Measure 2*	$75.5	$87.0	$87.9
2.4.3	*Measure 3*	$151.2	$157.0	$158.7
2.5	Goal 5	$26.2	$27.2	$27.5
2.5.1	*Measure 1* [2]	$19.8	$21.5	$21.7
2.5.2	*Measure 2*	$6.3	$6.8	$6.9
2.5.3	*Measure 3*	$19.8	$21.5	$21.7
2.5.4	*Measure 4*	$6.3	$6.8	$6.9

	FY 2011 BUDGET SUBMISSION ENTERS FOR DISEASE CONTROL AND PREVENTION SUMMARY OF FULL COST (DOLLAR IN MILLIONS)			
Unique ID	**Goals and Performance Area**	**FY 2009**	**FY 2010**	**FY 2011**
Viral Hepatitis		*$0.4*	*$0.4*	*$0.4*
2.6	Goal 6	$0.4	$0.4	$0.4
2.6.1	*Measure 1*	$0.1	$0.0	$0.0
2.6.2	*Measure 2*	$0.1	$0.1	$0.2
2.6.3	*Measure 3*	$0.2	$0.2	$0.2
2.6.4	*Measure 4*	$0.0	$0.1	$0.1
SexuallyTransmitted Diseases		*$25.3*	*$25.4*	*$25.7*
2.7	Goal 7	$25.3	$25.4	$25.7
2.7.1	*Measure 1*	$14.4	$14.5	$14.6
2.7.2	*Measure 2*	$4.6	$4.6	$4.6
2.7.3	*Measure 3*	$5.1	$5.1	$5.1
2.7.4	*Measure 4*	$4.8	$4.8	$4.9
2.7.5	*Measure 5*	$9.6	$9.7	$9.8
2.7.6(a)	*Measure 6(a)*	$6.8	$6.9	$6.9
2.7.6(b)	*Measure 6(b)*	$1.8	$1.8	$1.8
2.7.7	*Measure 7*	-	-	-
2.7.8	*Measure 8*	$1.0	$1.0	$1.0
Tuberculosis		*$20.2*	*$20.7*	*$19.8*
2.8	Goal 8	$20.2	$20.7	$19.8
2.8.1	*Measure 1*	$20.2	$20.7	$19.8
2.8.2	*Measure 2*	$6.5	$8.3	$7.9
2.8.3	*Measure 3*	$1.8	$4.1	$4.0
2.8.4	*Measure 4*	$0.8	$4.1	$4.0
Zoonotic, Vector-Borne, and Enteric Diseases		**$41.4**	**$57.1**	**$0.4**
3.1	Goal 1	$41.4	$57.1	$0.4
3.1.1	*Measure 1*	$24.9	$34.3	$34.3
GLOBAL HEALTH				
Global Health - GAP		**$51.3**	**$54.3**	**$56.4**
13.A.1	Goal 1	$33.4	$31.8	$33.1
13.A.1.1	*Measure 1*	$4.0	$3.8	$4.0
13.A.1.2	*Measure 2*	$2.3	$2.2	$2.3
13.A.1.3	*Measure 3*	$3.0	$2.9	$3.0
13.A.1.4	*Measure 4*	$2.3	$2.2	$2.3
13.A.2	Goal 2	$17.8	$22.4	$23.3
13.A.2.1	*Measure 1*	$2.1	$2.7	$2.8
13.A.2.2	*Measure 2*	$1.2	$1.6	$8.6
13.A.2.3	*Measure 3*	$1.6	$2.0	$2.1
13.A.2.4	*Measure 4*	$1.2	$1.6	$1.6
Global Health - Immunization		**$64.8**	**$120.8**	**$125.6**
13.B.1	Goal 3	$45.1	$86.5	$90.0
13.B.1.1	*Measure 1*	$5.4	$10.4	$10.8
13.B.1.2	*Measure 2*	$2.3	$4.3	$4.5
13.B.1.3	*Measure 3*	$4.5	$8.7	$9.0
13.B.2	Goal 4	$19.7	$34.3	$35.7
13.B.2.1	*Measure 1*	$1.6	$2.7	$2.9
13.B.2.2	*Measure 2*	$0.2	$0.3	$0.4
Global Health - Malaria		**$4.9**	**$5.2**	**$5.4**
13.C.1	*Goal 5*	$4.9	$5.2	$5.4
13.C.1.1	*Measure 1*	$1.2	$1.3	$1.4
13.C.1.2	*Measure 2*	$0.7	$0.8	$0.8
13.C.1.3	*Measure 3*	$0.5	$0.5	$0.5
Afghan Health Initiative		***TBD***	***TBD***	***TBD***
13.D.1.1	*Measure 1[3]*	*TBD*	*TBD*	*TBD*
13.D.1.2	*Measure 2[3]*	*TBD*	*TBD*	*TBD*
13.D.1.3	*Measure 3[3]*	*TBD*	*TBD*	*TBD*
13.D.1.4	*Measure 4[3]*	*TBD*	*TBD*	*TBD*
13.D.1.5	*Measure 5[3]*	*TBD*	*TBD*	*TBD*
13.D.1.6	*Measure 6[3]*	*TBD*	*TBD*	*TBD*
13.D.1.7	*Measure 7[3]*	*TBD*	*TBD*	*TBD*
13.D.1.8	*Measure 8[3]*	*TBD*	*TBD*	*TBD*
TERRORISM				
16.5	Preparedness Goal 5	$110.7	$113.2	$106.7
16.5.1	*Measure 1*	N/A	N/A	N/A
16.5.2	*Measure 2*	$3.8	$3.9	$3.6
16.5.3	*Measure 3*	$3.9	$4.0	$3.7
16.5.4	*Measure 4*	$2.9	$2.9	$2.8
16.5.5	*Measure 5*	$1.2	$1.2	$1.2
	Sub-total	*$5,467.4*	*$5,839.2*	*$5,655.9*

Unique ID	Goals and Performance Area	FY 2009	FY 2010	FY 2011
FY 2011 BUDGET SUBMISSION **CENTERS FOR DISEASE CONTROL AND PREVENTION** **SUMMARY OF FULL COST** **(DOLLAR IN MILLIONS)**				
HHS Strategy Goal 2.2				
ENVIRONMENTAL HEALTH AND INJURY				
Environmental Health		**$219.5**	**$223.1**	**$209.2**
10.1	Goal 1	$130.0	$132.1	$123.8
10.1.1	*Measure 1*	$14.5	$14.7	$13.8
10.2	Goal 2	$89.6	$91.0	$85.3
10.2.1	*Measure 1*	$13.1	$13.3	$12.5
10.2.2	*Measure 2*	$16.2	$16.5	$15.4
Injury Prevention and Control		**$158.6**	**$162.3**	**$158.1**
11.1	Goal 1	$117.4	$120.1	$117.0
11.1.1	*Measure 1*	$20.0	$20.4	$19.9
11.1.2	*Measure 2*	$25.1	$25.7	$25.0
11.2	Goal 2	$41.2	$42.2	$41.1
11.2.1	*Measure 1*	$0.7	$0.8	$0.7
11.2.2	*Measure 2*	$0.3	$0.3	-
11.2.3	*Measure 3*	$0.5	$0.5	$0.5
OCCUPATIONAL SAFETY AND HEALTH				
12.1	Goal 1	$340.5	$356.2	$397.3
12.1.3	*Measure 3*	$255.4	$267.2	$298.0
12.2	Goal 2	$113.5	$118.7	$132.4
12.2.2	*Measure 2*	$13.6	$14.2	$15.9
12.2.3	*Measure 3*	N/A	N/A	N/A
	Sub-total	*$832.1*	*$860.4*	*$897.0*
HHS Strategy Goal 2.3				
HEALTH PROMOTION				
Chronic Disease Prevention and Health Promotion		**$745.4**	**$786.3**	**$776.4**
Cancer				
5.1	Goal 1	$333.5	$351.8	$347.4
5.1.1	*Measure 1*	$125.4	$132.3	$130.6
5.1.2	*Measure 2*	$125.4	$132.3	$130.6
5.1.3	*Measure 3*	$125.4	$132.3	$130.6
5.1.4	*Measure 4*	$83.7	$88.3	$87.2
Tobacco				
5.2	Goal 2	$108.0	$113.9	$112.5
5.2.1	*Measure 1*	$108.0	$113.9	$112.5
5.2.2	*Measure 2*	$86.4	$91.1	$90.0
Diabetes				
5.3	Goal 3	$83.1	$87.7	$86.6
5.3.1	*Measure 1*	$41.6	$43.9	$43.3
5.3.2	*Measure 2*	$41.6	$43.9	$43.3
Heart Disease and Stroke				
5.4	Goal 4	$72.6	$76.6	$75.6
5.4.1	*Measure 1*	$72.6	$76.6	$75.6
5.4.2	*Measure 2*	$36.3	$38.3	$37.8
5.4.3	*Measure 3*	$36.3	$38.3	$37.8
Nutrition and Physical Activity				
5.5	Goal 5	$52.6	$55.4	$54.7
5.5.1	*Measure 1*	$26.3	$27.7	$27.4
5.5.2	*Measure 2*	$52.6	$55.4	$54.7
School Health				
5.6	Goal 6	$95.6	$100.8	$99.5
5.6.1	*Measure 1*	$22.9	$24.2	$23.9
5.6.2	*Measure 2*	$38.7	$40.8	$40.3
5.6.3	*Measure 3*	$17.9	$18.9	$18.6
5.6.4	*Measure 4*	$2.3	$2.4	$2.4
Birth Defects, Developmental Disabilities, Disability		**$152.6**	**$157.8**	**$154.9**
6.1	Goal 1	$65.6	$71.2	$71.1
6.1.3	*Measure 3*	$0.4	$0.8	$0.8
6.1.4	*Measure 4*	$0.7	$2.5	$2.5
6.2	Goal 2	$87.0	$86.6	$83.8
6.2.3	*Measure 3*	$4.5	$6.6	N/A
6.2.5	*Measure 5*	N/A	N/A	$6.2
PREVENTIVE HEALTH AND HEALTH SERVICES		**$97.3**	**$99.5**	**$100.5**
	Sub-total	*$995.3*	*$1,043.6*	*$1,031.8*

	FY 2011 BUDGET SUBMISSION CENTERS FOR DISEASE CONTROL AND PREVENTION SUMMARY OF FULL COST (DOLLAR IN MILLIONS)			
Unique ID	**Goals and Performance Area**	**FY 2009**	**FY 2010**	**FY 2011**
HHS Strategy Goal 2.4				
HEALTH INFORMATION SERVICES				
Health Marketing		-	-	**Retired**
9.2	Goal 2	-	-	Retired
9.2.1	*Measure 1*	-	-	Retired
TERRORISM				
16.2	Preparedness Goal 2	$135.3	$138.4	$130.4
16.2.1	*Measure 1*	$18.7	$36.5	$34.4
16.2.2	*Measure 2*	$18.7	$36.5	$34.4
16.3	Preparedness Goal 3	$109.1	$111.7	$105.2
16.3.1	*Measure 1*	$7.3	$7.5	$7.1
16.3.2	*Measure 2*	$8.2	$8.4	$7.9
16.3.3	*Measure 3*	$2.3	$2.3	$2.2
16.3.4	*Measure 4*	$2.3	$2.3	$2.2
16.3.5	*Measure 5*	N/A	N/A	N/A
16.3.6	*Measure 6*	N/A	N/A	N/A
16.4	Preparedness Goal 4	$99.9	$102.2	$96.3
16.4.1	*Measure 1*	$0.1	$0.3	$0.3
16.5	Preparedness Goal 5	$110.7	$113.2	$106.7
16.5.6	*Measure 6*	$3.5	$3.6	$3.4
16.5.7	*Measure 7*	$6.2	$6.3	$6.0
16.5.8	*Measure 8*	$7.1	$7.2	$6.8
16.5.9	*Measure 9*	N/A	N/A	N/A
16.6	Preparedness Goal 6	$673.2	$688.9	$649.2
16.6.1	*Measure 1*	$8.8	$9.0	$8.4
16.6.2	*Measure 2*	$12.8	$13.1	$12.3
16.6.3	*Measure 3*	$480.0	$491.2	$462.9
16.6.4	*Measure 4*	$18.2	$18.6	$17.5
16.6.5	*Measure 5*	$18.2	$18.6	$17.5
16.6.6	*Measure 6*	$480.0	$491.2	$462.9
16.6.7	*Measure 7*	N/A	N/A	N/A
16.9	Preparedness Goal 9	$99.9	$102.2	$96.3
16.9.1	*Measure 1*	N/A	N/A	N/A
16.9.2	*Measure 2*	N/A	N/A	N/A
16.9.3	*Measure 3*	N/A	N/A	N/A
16.9.4	*Measure 4*	N/A	N/A	N/A
	Sub-total	**$1,228.1**	**$1,256.7**	**$1,184.3**
HHS Strategy Goal 3				
HHS Strategy Goal 3.4				
PUBLIC HEALTH IMPROVEMENT AND LEADERSHIP				
Office of Minority Health		**$2.8**	**$2.8**	**$2.8**
14.B.1	Goal 1	$0.7	$0.7	$0.7
14.B.1.1	*Measure 1*	$0.2	$0.2	$0.2
14.B.2	Goal 2	$0.7	$0.7	$0.7
14.B.2.1	*Measure 1*	$0.2	$0.2	$0.2
14.B.3	Goal 3[2]	$0.7	$0.7	$0.7
14.B.3.1	*Measure 1*	$0.0	$0.0	$0.0
14.B.3.2	*Measure 2*	$0.0	$0.0	$0.0
14.B.3.3	*Measure 3*	$0.0	$0.0	$0.0
14.B.3.4	*Measure 4*	$0.0	$0.0	$0.0
14.B.4	Goal 4	$0.7	$0.7	$0.7
14.B.4.1	*Measure 1*	$0.1	$0.1	$0.1
14.B.4.2	*Measure 2*	$0.1	$0.1	$0.1
	Sub-total	**$2.8**	**$2.8**	**$2.8**

Unique ID	Goals and Performance Area	FY 2009	FY 2010	FY 2011
FY 2011 BUDGET SUBMISSION **CENTERS FOR DISEASE CONTROL AND PREVENTION** **SUMMARY OF FULL COST** **(DOLLAR IN MILLIONS)**			
HHS Strategy Goal 4			
HHS Strategy Goal 4.1				
OCCUPATIONAL SAFETY AND HEALTH				
Occupational Safety and Health		**$113.5**	**$118.7**	**$132.4**
12.2	Goal 2	$113.5	$118.7	$132.4
12.2.1	*Measure 1*	$14.8	$15.4	$17.2
PUBLIC HEALTH IMPROVEMENT AND LEADERSHIP				
Office of Workforce and Development		**$118.8**	**$123.5**	**$106.1**
14.D.1	Goal 1	$118.8	$123.5	$106.1
14.D.1.1	*Measure 1*	$106.9	$111.1	$95.5
	Sub-total	**$232.3**	**$242.2**	**$238.5**
HHS Strategy Goal 4.2				
INFECTIOUS DISEASES				
Preparedness, Detection, and Control of Infectious		**$0.2**	**$11.5**	**$9.3**
	Immunization Program	$0.2	$11.5	$9.3
1.5	Goal 5	$0.2	$11.5	$9.3
1.5.1	*Measure 1*	$0.2	$11.5	$9.3
HEALTH PROMOTION				
Birth Defects, Developmental Disabilities, Disability		**$152.6**	**$157.8**	**$154.9**
6.1	Goal 1	$65.6	$71.2	$71.1
6.1.5	*Measure 5*	N/A	$4.2	$4.1
6.2	Goal 2	$87.0	$86.6	$83.8
6.2.4	*Measure 4*	$4.4	$3.8	$3.5
HEALTH INFORMATION SERVICES				
Health Statistics		**$160.2**	**$177.7**	**$189.8**
7.1	Goal 1	$160.2	$177.7	$189.8
7.1.1	*Measure 1*	N/A	$3.6	$3.8
7.1.2	*Measure 2*	$8.0	$8.9	$9.5
7.1.3	*Measure 3*	$8.0	$8.9	$9.5
ENVIRONMENTAL HEALTH AND INJURY				
Environmental Health		**$130.0**	**$132.1**	**$123.8**
10.1	Goal 1	$130.0	$132.1	$123.8
10.1.2	*Measure 2*	$20.1	$20.5	$19.2
OCCUPATIONAL SAFETY AND HEALTH				
	Occupational Safety and Health	**$340.5**	**$356.2**	**$397.3**
12.1	Goal 1	$340.5	$356.2	$397.3
12.1.2	*Measure 2*	$23.8	$24.9	$27.8
PUBLIC HEALTH IMPROVEMENT AND LEADERSHIP				
Office of Workforce and Development		**N/A**	**N/A**	**N/A**
14.D.2	Goal 2	N/A	N/A	N/A
14.D.2.1	*Measure 1*	N/A	N/A	N/A
	Sub-total	**$783.5**	**$835.3**	**$875.1**
HHS Strategy Goal 4.3				
HEALTH PROMOTION				
Birth Defects, Developmental Disabilities, Disability		**$152.6**	**$157.8**	**$154.9**
6.1	Goal 1	$65.6	$71.2	$71.1
6.1.2	*Measure 2*	$10.2	$12.9	$13.2
6.2	Goal 2	$87.0	$86.6	$83.8
6.2.2	*Measure 2*	$2.4	$1.8	$1.8
OCCUPATIONAL SAFETY AND HEALTH				
Occupational Safety and Health		**$340.5**	**$356.2**	**$397.3**
12.1	Goal 1	$340.5	$356.2	$397.3
12.1.1	*Measure 1 [4]*	$51.1	TBD	TBD
	Sub-total	**$493.0**	**$514.0**	**$552.3**
HHS Strategy Goal 4.4				
HEALTH PROMOTION				
Birth Defects, Developmental Disabilities, Disability		**$87.0**	**$86.6**	**$83.8**
6.2	Goal 2	$87.0	$86.6	$83.8
6.2.1	*Measure 1*	$12.1	$10.4	$11.8
HEALTH INFORMATION SERVICES				
Health Marketing		**$24.4**	**$24.4**	**Retired**
9.1	Goal 1	$3.5	$3.5	Retired
9.1.1	*Measure 1*	$1.7	$1.7	Retired
9.3	Goal 3	$20.9	$20.9	Retired
9.3.1	*Measure 1*	$1.7	$1.7	Retired
9.1	Goal 1 [5]	*TBD*	*TBD*	*TBD*
9.1.1	*Measure 1 [5]*	*TBD*	*TBD*	*TBD*
9.1.2	*Measure 1 [5]*	*TBD*	*TBD*	*TBD*
	Sub-total	**$111.4**	**$111.0**	**$83.8**
	Total [6]	**$10,295.0**	**$10,841.4**	**$10,521.6**

[1] *Includes VFC funding.*

[2] *This is an overarching long-term measure.*

[3] *The activities covered by these goals & measures are funded by other areas within CDC.*

[4] *Currently under review - 2010 and 2011 targets have not yet been established to allow determination of full cost.*

[5] *New or replacement measure; full cost percentages have not yet been estimated.*

[6] *Total funding reflects increased amounts due to some CDC goals supporting multiple HHS strategic objectives. Also, estimates have not yet been provided for some newly approved measures.*

N/A signifies retired goals and measures, measures Full Cost was not calculated for, or measures not reported in a fiscal years.

<u>Note</u>: *Full cost estimates are not necessarily reflective of direct programmatic funding levels for a given fiscal year. Estimates incorporate programmatic professional judgments of the portion of budget associated with performance goals and measures. In addition, overhead estimates are applied based on staffing levels. Programmatic methodologies are refined each year, which may contribute to variation across fiscal years.*

SUMMARY OF FINDINGS AND RECOMMENDATIONS FROM COMPLETED EVALUATIONS

Evaluations Included in HHS Program Evaluations Database for FY 2009

1. **Can the Role of Care Coordination (Case Management) within the Spina Bifida Clinic System be Assessed and Evaluated to Show Improved Access and Care for Patients and Caregivers?**
   a. Link: http://www.cdc.gov/ncbddd/birthdefects/SpinaBifida.htm

2. **How would you assess the overall quality, usefulness of information, impact on the quality of life of the person who is paralyzed, and likelihood of recommending the Paralysis Resource Center?**
   a. Link: http://cdd.unm.edu/dhpd/images/2008%20Client%20Satisfaction%20Summary%201-09-09.pdf

3. **How are Prevention Research Centers structured; how do they relate to their academic institution; what are their partner communities like; and how do PRCs and their communities develop and implement research?**
   a. Link: http://www.cdc.gov/prc/pdf/esfall2009-full.pdf

4. **What indicators can be used to measure the success of Heart Disease and Stroke Prevention Programs work to control high blood pressure**?
   a. Link: http://www.orau.gov/hsc/hdspinstitute/2008/presentations/Session13-25-HDSPIndicators.pdf

5. **How can Heart Disease and Stroke Prevention program partnerships be evaluated?**
   a. Link: http://www.cdc.gov/DHDSP/state_program/evaluation_guides/evaluating_partnerships.htm

6. **What are the performance indicators that support the Division of Diabetes Translation (DDT) in documenting Diabetes Prevention and Control Program efforts toward achieving the diabetes national goals?**
   a. Summary: The project developed foundational materials for the development of indicators for the successful evaluation of diabetes prevention and control efforts. Logic models were developed for three of the four Division of Diabetes Translation goals: "Prevent Diabetes", "Prevent complications, disabilities and burden associated with diabetes" and "Eliminate diabetes related health disparities". These logic models identified the short, intermediate and long term outcomes which would need to be measured. A logic model work group with representation from across the Division led these efforts. An extensive literature review process was undertaken that included published sources, diabetes national information sources as well as the practice based evidence of partners. A database was also developed and populated with proposed grantee efforts and corresponding indicators. This work was undertaken as the Division's orientation changed from a focus on direct services to a prevention focus and a population level public health impact. A different set of indicators was needed to measure the outcomes of this work, in place of the clinical indicators that were previously used.

The logic models identified causal pathways to accomplish the Division goals. The support identified for these causal pathways from published research, the findings of the Diabetes Primary Prevention Initiative, as well as the practice based evidence generated by the state grantees will become the sources for a subsequent indicator identification process, to be completed through an expert panel review process, initiated by the Division. The Division has learned that the next step in the indicator development process must focus on a further development of the activities section of the logic model that reflects the interventions undertaken in the areas of health systems, communications, social, environmental, policy and systems approaches at the community level. This will result in modifications and further articulation of the short, intermediate and long term outcomes to be accomplished. The development of a set of indicators will provide a level of uniformity in the measurement of impact of grantee efforts, and will enable a national level evaluation of the diabetes prevention and control efforts.

7. **What are the replicable policy and system change strategies implemented in state Heart Disease and Stroke Prevention Programs that achieve intended outcomes?**
   a. <u>Summary:</u> The purpose of this project was to identify and confirm policy and system based promising practices in heart disease and stroke prevention. The determination of promising practices is based on evidence that these practices have the potential for public health impact on the burden of heart disease and stroke and are adaptable to other geographic settings. Specifically that they were innovative, well implemented, and achieved short term outcomes.

      Funded state programs were extended an invitation to apply to participate. Of the interventions selected, two were intended to improve emergency response, two were intended to improve control of high blood pressure, two were intended to improve the quality of care and one to improve the spread of policy and system change across a region.

      To identify promising practices, a comprehensive evaluation of each of the selected state-funded interventions was conducted by RTI International. Each selected intervention participated in the development of an intervention logic model, evaluation questions, and indicators. The evaluations merged aspects of two common evaluation frameworks: the CDC Evaluation Framework and the RE-AIM Framework. Results were summarized and rated by panel of evaluation experts.

      One of the seven interventions emerged as a promising practice, and three as practices with promising processes. The evaluation helped identify interventions worth sharing as well as criteria, definitions, and methods for identifying promising practices.

8. **Are there improved health outcomes and cost savings for HTN in federally qualified health centers (FQHCs) that implement the Chronic Care Model?**
   a. <u>Summary:</u> The primary objective of this study was to determine whether the Chronic Care Model (CCM) which offers enhanced patient care is an effective strategy to improve blood pressure and lipid (cholesterol) levels. The second objective is to assess its cost-effectiveness. We assessed changes in key clinical indicators in two ways:

      We compared differences over time among patients reported to have been exposed to the CCM and compared the changes over time among a similar group of patients not exposed

to the CCM. FQHCs are important because they serve low-income diverse populations that are at high risk for diabetes, heart disease, heart attack, and stroke.

We found that both hypertension and cholesterol control improved among patients when compared to usual care. The costs that most healthcare providers would need are about $500 per-person per-year to implement similar enhanced care programs to a large population. We also found the clinics to be cost-effective. A cost-tool was produced that can be used by state health departments working with Medicaid and Medicare data, and with healthcare provider plans. The tool will be available to health plans and other users who want to determine cost-effectiveness of interventions they are conducting.

9. **What do we need to know to design future diabetes screening programs in high risk populations?**
   a. <u>Summary:</u> The purpose of this study was to provide information regarding: (1) resources used with the current activities in the areas of diabetes awareness and screening in the Diabetes Detection Initiative (DDI) clinics, and (2) the perceived economic benefit of diabetes screening to individuals targeted by the DDI.

   The Diabetes Detection Initiative (DDI) was a pilot project sponsored by the Department of Health and Human Services to investigate the feasibility of widespread screening for diabetes. Individuals were encouraged to determine their risk for undiagnosed diabetes using a customized paper risk assessment tool adapted from the American Diabetes Association. The results of this assessment provided the individual with a clear message regarding the need for appropriate blood testing to confirm their risk. A finger stick/capillary blood test was part of the medical assessment that took place at a health care site and this result, combined with other information, informed the health care provider of the need for further testing to diagnose diabetes. Ten pilot locations were involved in the pilot implementation, one in each federal administrative region.

   Patients preferred to be screened for diabetes in a clinic setting. As for a preference for tests – patients valued tests which were accurate and did not take a long time; choosing the finger stick test over other methods. The values of the various test attributes varied by ethnicity, income level, and whether or not the patient has a family history of diabetes. The test that was regarded as most valuable was a finger stick test and patients are willing to pay $23 to $73, depending on income level and ethnicity. Paper tests are valued between $12 and $22. The value of a venous blood draw ranges from $7 to $28. The 2-hour glucose tolerance test is valued between $2 and $18.

   Information obtained from this study will be very helpful for policymakers in designing future diabetes screening programs for low income populations, such as those targeted by the DDI.

10. **What were states funded for nutrition, physical activity and obesity programs, able to accomplish with a modest amount of funding?**
   a. <u>Summary:</u>   This study focused on the 28 states that received CDC cooperative agreements during the period between FY2003 and FY2007 (RFA number 03022) for state nutrition, physical activity and obesity programs. An OMB-approved online data collection system was developed for the purpose of collecting consistent data across all funded states. Resource materials and reports posted on state web-pages as well as

evaluation reports that states provided from their interventions were reviewed. In addition, case study interviews were conducted by telephone with 21 of the states.

Study results showed that funded states built capacity by increasing staffing, leveraging funds and building partnerships. States developed programs led by a strong core staff of highly qualified program managers and physical activity and nutrition coordinators. Core staff positions were primarily filled with master's-trained professionals. These strong core teams were backed by other key positions that states hired as needed, including epidemiologists, evaluators, and worksite coordinators.

The programs developed state plans which helped to put all partners on the same page, prioritize activities of interest, and provide "a strategic map for activities." State plans helped implement programs including more than 250 interventions and numerous resources and the passing of more than 164 bills and 300 local policies. While communities and schools were the most popular settings, states implemented interventions in a wide variety of settings, including worksites, childcare facilities, hospitals and healthcare facilities, and faith-based organizations. Those states that received more funding were able to implement interventions in more settings.

For every $1 of CDC funding, states were able to leverage $2 of support. In just 6 months (July 1–December 31, 2007), states were able to coordinate $32.6 million across funding sources to support the implementation of their state plans. This accounted for a two-to-one return on CDC's investment of $16.1 million for the entire 2007–2008 funding year.
Partnerships were key in promoting policy and environmental changes. A range of public and private partnerships contributed to state capacity building, state plan development and implementation, and program dissemination, enabling states to extend their reach and activities in ways that would not have been feasible without partners. In many cases, the state programs were able to achieve success because of the strength of the partnerships in which they were engaged. States with more active partnerships were able to leverage significantly more resources for obesity prevention (median of $5.6 million vs. $1.1 million), and implement more than three times the number of local policy changes (13.3 vs. 3.4 policies).

11. **Will the SWAT (Swift Worksite Assessment and Translation) methodology identify promising practices for promoting healthy weight among employees at small to medium sized worksites?**
    a. http://www.cdc.gov/nccdphp/dnpa/hwi/program_design/swat/

12. **How successful is the uptake of CDC's latest infection control recommendations for dental practices and what factors influence the dissemination and implementation of these recommendations?**
    a. <u>Summary:</u> This evaluation assessed the existing level of infection control guideline implementation among dentists resulting from the publication and dissemination of CDC's 2003 Guidelines for Infection Control in Dental Health-Care Settings, 2003. This information will be used to develop CDC's future dental infection control research agenda and strategic plan to target available resources in ways that will foster and promote further awareness and adoption of the guidelines. The study (a mail survey of 6,500 active dentists working in private practices in the U.S.) evaluated the extent to which these guidelines had been implemented in private non-institutionally based dental

facilities, and assessed how implementation of the guidelines (in full or only in part) was related to: (1) characteristics of the dentists (demographic and educational but also including their knowledge of the guidelines, implementation, and attitudes regarding their importance), (2) characteristics of the way care delivery is organized in their offices or clinics (with particular attention to the business, staffing, and physical facility aspects), and (3) factors in the larger environment including regional practice standards, state's licensing requirements, and available opportunities for continuing dental education.

It was clear from the findings that implementation and knowledge of the recommendations in the CDC 2003 infection control guidelines were neither complete nor uniform across dentists. Of the four recommendations about which we asked questions in the survey, 5.4 percent of dentists had not implemented any, and only 10.5 percent had implemented all four. This analysis sought to go deeper into these differences to identify the measures or factors associated with greater and lesser levels of implementation and knowledge of the recommendations in the 2003 guidelines by dentists who own dental practices. Only two measures were statistically significant predictors across all three outcomes. They both have similar types of impacts – magnitude and direction – on all three outcomes as well. The two predictors were the attitude measure of how important infection control is to the dentist personally, and the number of sources of exposure the dentist had to the guidelines. The greater the importance of infection control to the dentist and the larger the number of dentist exposures to the guidelines, the greater the number of recommendations implemented and the greater the knowledge of procedures needing sterile water and topics recommended for the practice's infection control manual by the guidelines. These results suggest that CDC may want to revise how to disseminate its guidelines and reexamine its effort to motivate dentists to implement and know the content of its guideline recommendations.

13. **What are the community and structural level factors contributing to persistent high rates of congenital syphilis among Latinos in Maricopa County, Arizona?**
    a. <u>Summary:</u> The purpose of this rapid assessment was to identify and describe community and structural level factors contributing to persistent high rates of congenital syphilis among Latinas in Maricopa County, Arizona. During 2002-2007 Maricopa County ranked among the top five states in the US for rates of congenital syphilis, and had the highest rate of congenital syphilis in the US from 2003-2005. The majority of congenital syphilis cases were born in Maricopa County to Hispanic women. In 2007, a Maricopa County Board Order was initiated to promote prenatal syphilis screening at three points during pregnancy: at the first prenatal visit, during the third trimester, and at delivery. In early 2009, the Division of Sexually Transmitted Disease (STD) Prevention was asked to provide technical assistance in the form of a rapid ethnographic assessment, a team-based method of data collection that typically has a limited scope of investigation and a shortened time frame for data collection and analysis. The rapid assessment was carried out in March 2009 and included key informant interviews with 42 persons from health departments, health facilities, and community based organizations with experience working with Latinos.

    The rapid assessment identified the following contributing factors: low levels of knowledge and awareness about sexually transmitted diseases (STDs), including congenital syphilis, among Latinos; inconsistency among health care providers with regard to screening of pregnant women for syphilis, and insurance and cost barriers to receiving prenatal care services, especially for women who are not US citizens or legal

residents. Contributing social factors to STD transmission risk included the frequency with which Latino men migrate for work in the absence of a girlfriend or spouse, cultural norms which make it acceptable for men to have multiple sex partners, the perception among both men and women that condoms are primarily for contraception, and intimate partner violence and social isolation among recent immigrant women.

The assessment identified several barriers to prenatal care, especially for women who are not legal citizens or residents. These barriers include the high cost of medical services, lack of insurance, lack of awareness of alternative forms of financial support, and challenges with understanding the system for qualifying for services and providing necessary documentation. While some Latinas may delay seeking prenatal care until they experience problems, most women who interact with the health system remain in care unless other factors, such as availability, access, and cost become barriers. Social networks appear to be instrumental in introducing women to services, as many women receive advice and guidance regarding prenatal care from relatives and friends already familiar with providers and the health care system.

Working recommendations are being developed in collaboration with the County and State STD Programs; recommendations included working intensively with providers to increase awareness of congenital syphilis and the Board Order, adding dedicated staff at the County Health Department to coordinate congenital syphilis surveillance, case investigation and follow up, and strengthening outreach and targeted health communication to Latinos to increase awareness of STD and prenatal care services.

14. **What are health care providers' knowledge, attitudes, and practices regarding Sexually Transmitted Infections (STIs) and associated HIV risk, and capacity to integrate HIV prevention in STI care settings in South Africa?**
    a. <u>Summary</u>: The purpose of this project was to conduct a baseline survey among health care providers in South Africa to assess health care provider knowledge, attitudes, and practices regarding sexually transmitted infections (STIs) and associated HIV risk, and capacity to integrate HIV prevention in STI care settings. A self-administered survey was conducted among randomly selected clinicians providing direct STI care in public and private out-patient clinics in Gauteng Province, South Africa. In the public clinics, the clinic manager/supervisor completed a separate self-administered survey to evaluate the facility resources and capacity.

       Survey results revealed lack of knowledge of STI etiology and management (especially lack of awareness of Herpes Simplex Virus 2 as a cause of genital ulcer) and belief that STIs can transform into HIV and other misperceptions. The results suggest a need to enhance existing and develop new STI training curricula.

       With input from local STI/HIV program experts, investigators will develop and disseminate enhanced, culturally appropriate education materials for STI management that incorporate HIV/STI prevention activities and HIV testing. A follow-up assessment of providers will be conducted to evaluate the impact of the modified training curricula on STI clinical services in the final phase of the project.

15. **What is the relevance of the work of the NIOSH Construction Research Program to the most important safety and health problems in the workplace, and what impact has been achieved in the workplace?**

     a.   Link: http://www.cdc.gov/niosh/nas

16. **What is the relevance of the work of the NIOSH Health Hazard Evaluation Program to the most important safety and health problems in the workplace, and what impact has been achieved in the workplace?**
     a.   Link http://www.cdc.gov/niosh/nas

DISCONTINUED PERFORMANCE MEASURES

PANDEMIC INFLUENZA

Dropped Annual Measure	FY	Target	Result
1.6.1: By 2010, enhance preparedness for pandemic influenza by establishing influenza networks globally through bilateral cooperative agreements that are actively producing usable samples for testing as measured by geographic and population coverage.	2009	30 networks	45
	2008	30 networks	36
	2007	20 networks	30
	2006	9 networks	13
	2005	9 networks	12
	2004	N/A	9 networks; 1 with 100% geographic coverage; 70% population coverage; 8 with 10-40% geographic coverage and 10-40% population coverage per county network
	2003		1 network; 60% geographic coverage; 60% population coverage per country network

BIRTH DEFECTS, DEVELOPMENTAL DISABILITIES, DISABILITY AND HEALTH

Dropped Annual Measure	FY	Target	Result
6.E.1: Increase the percent of competitive (new) cooperative agreements/grants that are processed in less than or equal to 176 days (excluding extramural research).	2009	91%	0
	2008	91%	0
	2007	82%	0
	2006	73%	0
	2005		64%

HEALTH MARKETING

Dropped Annual Measure	FY	Target	Result
9.E.1: Provide "just-in-time" scientific information and education via multiple communication channels to thousands of health professionals, thereby reducing the cost and time of distributing the latest science based information.	2010	5% increase from previous year in number of subscribers and participants of CDC's professional communications projects and distance learning activities.	12/2010
	2009	5% increase from previous year in number of subscribers and participants of CDC's professional communications projects and distance learning activities.	272,197

	2008	5% increase from previous year in number of subscribers and participants of CDC's professional communications projects and distance learning activities.	207,000 (90% increase)
	2007	5% increase from previous year in number of participants registered in distance learning activities.	108,753 (9% increase)
	2006	5% increase from previous year in number of participants registered in distance learning activities.	99,409 (7% increase)
	2005	5% increase in number of participants registered in distance learning activities.	92,790 (9% increase)
9.1.1: Increase access and utilization of CDC.gov by public, partners, and other health care professionals.	*2010*	Baseline + 10%	12/2010
	2009	Baseline + 10%	682 million
	2008	Baseline + 5%	490 million
	2007	Establish Baseline	450 million
9.2.1: Increase the usage of CDC's online public health emergency alert systems, training materials, and other electronic resources/tools designed to provide information, educational materials, and real-time alerts as measured by the number of subscribers to Epi-X, HAN and national public health radio networks.	*2010*	Increase by 20% above baseline	12/2010
	2009	Increase by 20% above baseline	6,680
	2008	Increase by 15% above baseline	6,527 users
	2007	Increase by 5% above baseline	6,170 users
	2006	Baseline	4,372 users
9.3.1: Increase the number of multi-media broadcast outputs to partners and health professionals.	*2010*	Baseline + 10%	12/2010
	2009	Baseline + 10%	46
	2008	Baseline + 5%	43
	2007	Establish Baseline	40

ENVIRONMENTAL HEALTH

Dropped Annual Measure	FY	Target	Result
10.E.1: Number of Full Time Equivalent (FTE)'s providing program support through the Office of the Director per $1 million in total program budget.	*2009*	0.64	.53
	2008	0.64	.54
	2007	0.65	0.66
	2006	0.66	0.55

	2005	N/A	0.67
10.2.1: Percentage reduction in asthma hospitalizations in states funded for partial and full implementation per 100,000 people.	*2009*	Part A Enhanced: 9% Part B: 16%	Unable to report
	2008	Part A Enhanced: 8% Part B: 15%	Unable to report
	2007	Part A Enhanced: 7% Part B: 14%	Unable to report
	2006	Part A Enhanced: 6% Part B: 12%	Unable to report
10.2.3: Percentage increase in the capacity of state health departments to anticipate and prevent the spread of illness/disease outbreaks from food– and water-borne illness.	*2009*	100%	100%
	2008	90%	100%
	2007	50%	100%
	2006	35%	90%
	2005	N/A	86%
	2004	N/A	16%

INJURY PREVENTION AND CONTROL

Dropped Annual Measure	FY	Target	Result
11.E.1: Reduce the amount of time to submit funding packages for non-research funding opportunities to CDC's Procurement and Grants Office.	*2009*	7 days	8.2 days
	2008	13 days	13.5 days
	2007	26 days	21 days
	2006	Establish Baseline	52 days

OCCUPATIONAL SAFETY AND HEALTH

Dropped Annual Measure	FY	Target	Result
12.E.1: Percent of grant award/funding decisions made available to applicants within nine months of application receipt or deadline date, while maintaining a credible and efficient, two-level peer review system.	*2009*	75%	75%
	2008	72%	74%
	2007	69%	70%
	2006	66%	68%
	2005	60%	60%

OFFICE OF THE CHIEF OF PUBLIC HEALTH LAW PRACTICE

Dropped Annual Measure	FY	Target	Result
14.C.1.1: Complete national dissemination of the revised "Forensic Epidemiology" and "Public Health Emergency Law" training curricula.	*2010*	Complete provision of technical assistance to support implementation of both curricula	12/2010
	2009	Complete dissemination	Yes

		of both curricula to all state public health agencies	
	2008	Complete field testing and begin national dissemination of both curricula	Yes
	2007	Complete development of second editions of both curricula	Yes

BUILDINGS AND FACILITIES

Dropped Annual Measure	FY	Target	Result
15.E.1: Energy and water reduction.	*2009*	Energy 12%; Water 4%	Energy 20.9%, Water 4.4% (Both Exceeded)
	2008	Energy 9%; Water 2%	Energy 16.7%(Met); Water 2.4% (Exceeded)
	2007	Energy 03%; Water 30%	Energy 12.6% Reduction (Met); Water +43% (Unmet)
15.E.2: Deliver leased space below Atlanta's sub-market rate.	*2009*	10% under market	No new space in 09
	2008	10% under market	10%
	2007	10% under market	N/A
	2006	10% under market	-10%
15.1.1: Capital Projects - Aggregate of scores for capital projects rated on scope, schedule, budget, and quality.	*2009*	Greater than or equal to 90%	EVA implemented, scope schedule, and budget within 0.95 to 1.05 using EVA indexes.
	2008	Greater than or equal to 90%	=>90%
	2007	Greater than or equal to 90%	=>90%
	2006	Greater than or equal to 90%	=>90%
15.1.2: Placement of NCID & NCEH laboratorians in CDC standard space (Projects occupied or underway).	*2009*	NCID 70%	70%
	2008	NCID 70%; NCEH 100%	70%; 100%
	2007	NCID 70%; NCEH 100%	70%, 100%
	2006	NCID 70%; NCEH 100%	70%, 100%
15.1.3: Relationship of work orders (scheduled and unscheduled maintenance).	*2009*	Scheduled 95%; Unscheduled 5%	Unable to report
	2008	Scheduled 95%; Unscheduled 5%	95%, 5%
	2007	Scheduled 95%;	95%, 5%

		Unscheduled 5%	
	2006	Scheduled 95%; Unscheduled 5%	95%, 5%

UPGRADING STATE AND LOCAL CAPACITY

Dropped Annual Measure	FY	Target	Result
16.4.1: Percentage of LRN labs that report routine public health testing results through standards-based electronic disease surveillance systems and have protocols for immediate reporting by telephone for Category A agents (bacillus anthracis, yersina pestis, francisella tularensis, clostridium botulinum toxin and variola major) for which they conduct testing.	*2009*	100%	100%
	2008	100%	100%
	2007	100%	100%
	2006	100%	80%
	2005	100%	100%