141301893

## Memorandum

/s/ Bryan B Mitchell
Bryan B. Mitchell
 Principal Deputy Inspector General
Need for Improved Financial Reporting and Monitoring Related to National Institutes of Health Research Funds at Universities (A-06-91-00073)

Philip R. Lee, M.D.
Assistant Secretary for Health
Kenneth S. Apfel
Assistant Secretary
for Management and Budget

Attached for your review and comment is the management advisory report on our review of selected research projects awarded to universities throughout the United States. The objectives of this review were to determine: (1) if universities were using funds as set forth in the National Institutes of Health's (NIH) approved budgets; and (2) the need for improved NIH monitoring over research costs.

Our review showed that NIH funds were not always spent as budgeted. We also found that in many cases awarded funds were not used during the budget period and were carried forward to the next award period. Both practices are permissible under current Government regulations.

We identified trends which show that certain budgeted cost categories tended to be underspent while other cost categories were overspent. Generally, cost categories labeled personnel, other and travel were underspent while other cost categories labeled supply, equipment and consultant were overspent. Although the Public Health Service (PHS) has a requirement for prior approval for "significant rebudgeting," the term is not defined and consequently ignored. We believe that the absence of such provisions affects NIH's ability to monitor the cost of its research.

We also found that 52 of the 100 research projects reviewed, totaling about $\$ 18.5$ million, had unspent budget balances totaling $\$ 1,392,184$, about 7.5 percent, at the end of the award period. Projecting these results to the 11,453 research projects totaling about $\$ 2.7$ billion in our sample universe, we estimate that 5,956 awards would have unspent budget balances totaling $\$ 159,446,834$, about 5.9 percent of the total

Page 2
amount awarded. The NIH does not require that a separate budget be submitted showing the intended use of unspent budget balances. Officials of NIH advised us that these carry-over amounts did not appear out of line.

The Department of Health and Human Services (HHS) policy and regulations based on the office of Management and Budget (OMB) Circular A-110 preclude the PHS awarding agencies, such as NIH, from requiring periodic, detailed, line-item expenditure reports from its grantees. Therefore, NIH has little specific information as to how its funds are actually used and whether the actual use of the funds supported the scope of research approved by its peer review committees.

In Fiscal Year 1989, HHS declared that the absence of periodic, detailed, financial expenditure data on its grants was a material weakness for internal control purposes. In 1991, the HHS Office of the secretary requested OMB to allow HHS to amend its policies and regulations. This proposed amendment would have allowed PHS, including NIH, to require contractors and grantees to submit periodic, detailed, lineitem expenditure reports which could be used to monitor expenditures. In June 1991, OMB denied the request.

We agree that the absence of periodic expenditure data is a material weakness for internal control purposes. The OMB mandated forms provide little information that is useful in the management of research projects. In April 1992, OMB gave HHS permission to engage in a pilot project with selected universities to obtain detailed expenditure data by electronic transfer.

We are recommending that HHS expedite the pilot project for the electronic transfer of detailed expenditure data. we are also recommending that PHS define "significant rebudgeting," as used in its Grants Policy Statement. We are further recommending that $H H S$ require grantees to submit a revised budget for the use of unspent grant funds when a substantial carry-over of funds occurs from one budget period to another.

The Assistant Secretary for Management and Budget and the Office of the Assistant Secretary for Health concurred with the findings and recommendations made within this report.

We request that you provide the office of Audit Services with the status of actions taken on recommendations within 60 days from the date of this report. If you wish to discuss any of the issues raised in this report, please call me or have your

## Page 3

staff contact Daniel $W$. Blades, Assistant Inspector General for Public Health Service Audits, at (301)443-3582. To facilitate identification, please refer to common Identification Number A-06-91-00073 in all correspondence relating to this report.

Attachment

## Department of Health and Human Services

OFFICE OF INSPECTOR GENERAL

NEED FOR IMPROVED FINANCIAL REPORTING AND MONITORING RELATED TO NATIONAL INSTITUTES OF HEALTH RESEARCH FUNDS AT UNIVERSITIES



Nif 301993

- 's! Brvan B Mitchell

Bryan B. Mitchell
Principal Deputy Inspector General
Need for Improved Financial Reporting and Monitoring Related to National Institutes of Health Research Funds at Universities (A-06-91-00073)
To
Philip R. Lee, M.D.

Assistant Secretary for Health
Kenneth S. Apfel
Assistant Secretary
for Management and Budget

This management advisory report provides you with the results of our review of selected research projects awarded to universities throughout the United states. The objectives of this review were to determine: (1) if universities were using funds as set forth in the National Institutes of Health's (NIH) approved budgets; and (2) the need for improved NIH monitoring over research cost.

Our review showed that NIH funds were not always spent as budgeted. We also found that in many cases awarded funds were not used during the budget period and were carried forward to the next award period. Both practices are permissible under current Government regulations.

We identified trends which show that certain budgeted cost categories tended to be underspent while other cost categories were overspent. Generally, cost categories labeled personnel, other and travel were underspent while other cost categories labeled supply, equipment and consultant were overspent. With regard to the practice of shifting expenditures between budgeted line items, although the Public Health Service (PHS) has a requirement for prior approval for "significant rebudgeting," the term is not defined and consequently ignored. We believe that the absence of such provisions affects NIH's ability to monitor the cost of its research.

We also found that 52 of the 100 research projects reviewed, totaling about $\$ 18.5$ million, had unspent budget balances totaling $\$ 1,392,184$, about 7.5 percent, at the end of the award period. Projecting these results to the 11,453 research projects totaling about $\$ 2.7$ billion in our sample universe, we estimate that 5,956 awards would have unspent budget balances totaling $\$ 159,446,834$, about 5.9 percent of tre total amount awarded. The NIH does not require that a separeze

## Page 2

budget be submitted showing the intended use of unspent budget balances. Officials of NIH advised us that these carry-over amounts did not appear out of line.

The Department of Health and Human Services (HHS) policy and regulations based on the Office of Management and Budget (OMB) Circular A-110 preclude the PHS awarding agencies, such as NIH, from requiring periodic, detailed, line-item expenditure reports from its grantees. Therefore, NIH has little specific information as to how its funds are actually used and whether the actual use of the funds supported the scope of research approved by its peer review committees. We do not believe that Federal funds can be properly managed without periodic information regarding actual and intended use of those funds.

In Fiscal Year (FY) 1989, HHS declared that the absence of periodic, detailed, financial expenditure data on its grants was a material weakness for internal control purposes. In 1991, the HHS Office of the Secretary requested OMB to allow HHS to amend its policies and regulations. This proposed amendment would have allowed PHS, including NIH, to require contractors and grantees to submit periodic, detailed, lineitem expenditure reports which could be used to monitor expenditures. In June 1991, OMB denied the request.

We agree that the absence of periodic expenditure data is a material weakness for internal control purposes. The OMB mandated forms provide little information that is useful in the management of research projects. In April 1992, OMB gave the HHS permission to engage in a pilot project with selected universities to obtain detailed expenditure data by electronic transfer.

We are recommending that $H H S$ expedite the pilot project for the electronic transfer of detailed expenditure data. We are also recommending that PHS define "significant rebudgeting," as used in its Grants Policy Statement (GPS). We are further recommending that HHS require grantees to submit a revised budget for the use of unspent grant funds when a substantial carry-over of funds occurs from one budget period to another.

The Assistant Secretary for Management and Budget (ASMB) and the Office of the Assistant Secretary for Health (OASH) concurred with the findings and recommendations made within this report.

Page 3

## BACKGROUND

The NIH awarded approximately $\$ 6$ billion in health research and development during FY 1989. Domestic institutions of higher education received approximately 74 percent, or $\$ 4.4$ billion, of the NIH awards. Universities for which HHS has audit cognizance received $\$ 3.9$ billion.

Direct cost categories included in the grant applications are shown on the Notice of Grant Award. These include: personnel, consultant costs, equipment, supplies, domestic travel, foreign travel, inpatient care costs, outpatient care costs, alterations and renovations, consortium/contractual costs and other expenses. These cost categories are not reflected on the expenditure report which grantees are required to submit to NIH.

The expenditure report is referred to as a Financial Status Report (FSR) and it shows: outlays during the current and previous period, program income, the nonfederal share of outlays, total unliquidated obligations, the nonfederal share of unliquidated obligations, total Federal funds authorized, the unobligated balance of Federal funds and charges related to indirect costs. For purposes of this report, the terms spent and obligated are used interchangeably. The detail of current period expenditures shown on the FSR is limited to total amounts spent for direct and indirect costs. All NIH grantees currently have available an option to electronically submit the standard form FSR discussed above, otherwise a standard hard copy FSR would be submitted.

The PHS Grants Administration Manual, in Circular 89.02, section 3, Authorized Carry Over of Unobligated Balances, authorizes grantee organizations to carry over unobligated research grant funds remaining at the end of a budget period, unless the funds were previously restricted. However, the grantee must notify PHS whether they have elected to carry over unobligated balances and the amount to be carried over. Any unobligated balance which the grantee does not specify as carry-over shall be available for disposition by PHS.

The OMB Circular $A-110$ permits Federal agencies to restrict transfers of funds among direct cost categories when the transfer amount exceeds 5 percent. The HHS 'has waived this optional restriction and allows unrestricted transfers among direct cost categories.

In April 1992, OMB gave HHS permission to engage in a pilot project with selected universities to obtain detailed expenditure data by electronic transfer. The NIH is leading this project. The selection of schools, the basic system for electronic transfer and the detail of the data to be

Page 4
transmitted is under development. In addition, NIH officials informed us that reporting detailed expenditure data was discussed at the September 1992 meeting of the Federal Demonstration Project. The participants concluded that detailed expenditure data should not be reported for all grants and that a study should be made to determine which grants should require detailed expenditure reports.

## METHODOLOGY

The objectives of this review were to determine (1) if universities were using funds as set forth in NIH approved budgets and (2) the need for improved NIH monitoring over research cost. To accomplish this, we designed a statistical sampling plan that was used to randomly select a representative sample of NIH research projects. (See Appendix A for a description of our sampling methodology.)

The sample universe was 11,453 research projects awarded to 44 major universities during Calendar Year (CY) 1989. These 44 universities received about $\$ 2.7$ billion, 70 percent of the $\$ 3.9$ billion awarded to universities for which HHS was cognizant. From the 11,453 awards, we randomly selected 100 research projects totaling about $\$ 18.5$ million for review (see Appendix D). These 100 research projects were awarded to 39 of the 44 universities (see Appendix C).

We visited the 39 universities to determine the actual amount by cost category spent for each of the 100 research projects. We did not verify the expenditure information on the universities' reports. We then compared the amount of expenditures under each cost category to the amounts NIH approved in the budgets. We also computed the amount of carry-over budgeted funds based on the amounts awarded and actual expenditures. (See Appendix $B$ for computation of our sample results.)

Our review was conducted at the 39 universities, NIH in Bethesda, Maryland, and the Office of the Assistant Secretary for Health in Rockville, Maryland, during the period June 1991 through January 1993.

A draft copy of the report was provided on May 12,1993 to ASMB and OASH. Both ASMB and OASH concurred with the findings and recommendations made within this report (see Appendices $L$ and $M$, respectively).

## RESULTS OF REVIEW

## BUDGETED COSTS VERSUS ACTUAL EXPENDITURES

Our review showed that amounts budgeted for NIH research projects bore little relationship to the amounts spent. certain cost categories were underspent while others were overspent.

Appendix $D$ shows the variance between the amounts budgeted in the award and the amounts the universities' records showed as being expended against the award budget. In addition, Appendices $D$ through $K$ show how selected line-items of expenditures varied among the 100 awards. We found the following examples illustrate the trends of both over/underspending:

- "Personnel costs" for 63 of the 100 research projects reviewed were underspent by a total of \$1,140,061. "Personnel costs" were underspent by $\$ 10,000$ or more for 34 of the research projects. The amounts underspent on these 34 projects ranged from $\$ 10,171$ to $\$ 219,796$ (see Appendix E).
- "Other costs" for 63 awards were underspent by a total of $\$ 396,317$. Grantees for 44 awards spent less than 50 percent of the funds budgeted in this cost category (see Appendix F).
o "Domestic travel costs" for 56 awards were underspent by a total of $\$ 46,316$. Grantees for 17 awards spent no funds for travel although they had budgeted amounts ranging from $\$ 452$ to $\$ 1,890$ in this category (see Appendix G).
o "Supply costs" for 60 awards were overspent by a total of $\$ 610,761$. "Supply costs" were overspent by more than $\$ 5,000$ on 34 awards, ranging from $\$ 5,312$ to $\$ 44,539$. For 20 awards, actual expenditures for supplies were more than twice the amount budgeted (see Appendix H).
o "Equipment costs" for 38 awards were overspent by a total of $\$ 195,474$. For 23 of the 38 awards, no funds were budgeted for equipment; however, expenditures for equipment on these 23 awards ranged from $\$ 586$ to $\$ 17,578$ (see Appendix I).

Page 6

- "Contractual/consultant costs" for 19 awards were overspent by a total of $\$ 138,515$. For 12 of these 19 awards no funds were budgeted for contractual or consultant services. The amounts spent on these 12 awards ranged from $\$ 100$ to $\$ 16,780$ (see Appendices $J$ and $K$ ).

This over/underspending of cost categories occurred in the initial year of funding as well as in later years. In some cases, the projects had been funded for more than 20 years. We did not identify any relationship between the amount of over/underspending and the number of years a project had been funded.

The PHS GPS Chapter 8, Post Award Administration, allows recipients a certain degree of latitude in making postaward budget revisions. Unless otherwise restricted by the terms of the award, grantee institutions are permitted to rebudget within and between budget categories in the approved total direct cost budget of the project to meet unanticipated requirements or to accomplish certain programmatic changes.

Chapter 8-5, Prior Approval Authorities Retained by PHS for Research Grants, section 1, Change of Scope or Research Objectives, provides:
"The grantee organization is required to seek approval from the PHS awarding component when there is a change in the scope or research objectives of the project. Actions likely to be considered a change in scope or objectives include, but are not limited to, the following: ...(h) Significant rebudgeting whether or not it requires approval under rules governing budget changes."

The term "significant rebudgeting" is not defined and since this provision was added to the GPS, grantees have not requested prior approval before rebudgeting grant funds. For example:

- A $\$ 253,796$ grant was awarded to a university medical center during CY 1989. This was the 17 th year that NIH funded this grant. The NIH approved a budget which included $\$ 78,613$ for "personnel costs" and $\$ 64,138$ for "supply costs." The university actually spent $\$ 41,856$ for "personnel costs" and $\$ 107,230$ for "supply costs." The university's expenditures for "personnel costs" amounted to 53 percent of the amount budgeted, while supply expenditures were 167 percent of the amount budgeted.
o The NIH approved a grant to a university which included \$41,392 for "personnel costs" and \$26,577 for "other costs." The university actually spent \$64,403 for "personnel costs" and spent no funds for "other costs." This was the fifth year that NIH had funded the project.
- 

The NIH approved a budget for a grant to another university which contained no funds for "consultant costs" and $\$ 69,628$ for "other costs." The university spent $\$ 3,422$ for "consultant costs" and $\$ 21,789$ under the "other costs" category. This was the third year that NIH had funded this project.

## CARRY-OVER OF UNSPENT BUDGET BALANCES

Our review also showed that university researchers were not spending all funds awarded for use during CY 1989. When the amount awarded exceeds the amount spent, Federal regulations allow the university to carry over funds to the next year. Underspending primarily occurred in the cost categories for "personnel costs," "other costs," and "domestic travel costs."

The PHS Grants Administration Manual authorizes grantee organizations to carry over unobligated research grant funds remaining at the end of a budget period, unless the funds were previously restricted. However, the grantee must notify PHS whether they have elected to carry over unobligated balances and the amount to be carried over. There is no requirement that a separate budget be submitted showing the intended use of these carry-over funds.

We found that on 52 of the 100 research projects totaling about $\$ 18.5$ million, researchers did not use $\$ 1,392,184$, ar about 7.5 percent, of the funds awarded in the year budgeted. These unspent budget balances were carried over to the next budget period. Twenty-three projects carried over unspent budget balances ranging from $\$ 15,676$ to $\$ 427,865$ (see Appendix D).

Based on our sample of 100 , we estimate that 5,956 of the 11,453 research projects in our universe, totaling about $\$ 2.7$ billion, would have carry-over balances of unspent awards totaling $\$ 159,446,834$, or about 5.9 percent of total funds awarded. (See Ȧppendix B for computation of our sample results.)

Page 8
The following examples illustrate the conditions found:

- A $\$ 184,737$ grant was awarded to a university. This was the seventh year that NIH had funded this project. The university spent $\$ 137,764$ of the \$184,737 awarded. The university carried over $\$ 46,973$.
- A $\$ 253,259$ grant was awarded to another university. This was the third year that NIH had funded this project. The university spent $\$ 123,086$ and carried over $\$ 130,173$, more than 50 percent of the amount awarded.


## CONCLUSIONS

For many awards, NIH's approved budgets did not accurately reflect how researchers actually used NIH funds. When grantee organizations significantly rebudget funds awarded for research projects, they are required to obtain prior approval from PHS. However, the term "significant rebudgeting" is not defined in PHS policy. Also research funds were not always spent in the year budgeted and were carried forward to the next award period. Additionally, PHS does not have a requirement that a separate budget be submitted showing the intended use of carry-over funds.

The absence of actual line-item expenditure data, the ability to make unrestricted transfers of funds among direct cost categories, and the ability of grantees to carry over funds without a supporting budget, in our opinion, adversely affects NIH's ability to effectively: (1) monitor the actual use of its funds; and (2) evaluate whether unspent balances were reasonable. The HHS attempts to win OMB approval for more detailed expenditure reports have resulted in the approval to conduct a pilot program with selected universities to provide such data through electronic transfer. This program is still under development.

## RECOMMENDATIONS

We recommend that:
(1) The HHS expedite the pilot project for the electronic transfer of detailed expenditure data and continue to work with OMB for approval to gather detailed expenditure data on all research grants and contracts;
(2) the PHS define "significant rebudgeting" as used in the PHS Grants Policy Statement, Chapter 8-5, section 1.h.; and
(3) the HHS require grantees to submit a revised budget for the use of unspent grant funds when a substantial carry-over of funds occurs from one budget period to another.

## Auditee Response

In its written response (see Appendix L), ASMB concurred with our finding regarding the lack of data on the actual costs of research funded by NIH, and that the recommendations should improve NIH's ability to monitor the expenditures of its grantees.

The OASH also concurred with our findings and recommendations in its written response (see Appendix M), and provided the following detailed comments.

Recommendation Number One
OASH Comment
The OASH agreed with the objective of the pilot project for gathering detailed expenditure data on all research granta and contracts. However, the institutions designated to take part in the project have declined to participate. Nonetheless, OASH is exploring alternative approaches to the current financial reporting requirements, including categorical expenditure reporting.

Additional Comments by the Office of Audit Services
We encourage OASH to continue its effort in exploring alternative approaches to the current financial reporting requirements. We also request OASH to keep us informed of its progress with identifying an alternative approach, and seceling approval from OMB for obtaining detailed expenditure data on all research grants and contracts.

Recommendation Number Two
OASH Comment
The OASH agreed that it would be beneficial to provide additional guidance to grantees by defining, the term significant rebudgeting. The OASH intends to revise the PHS Grants Policy Statement to indicate that significant rebudgeting has occurred when the cumulative amount of transfers among direct cost categories for the current budget period exceeds 25 percent of the total amount awarded.

Additional Comments by the office of Audit Services
We believe that the threshold of 25 percent is reasonable. However, significant rebudgeting should occur when the total amount overspent or underspent in direct cost categories exceeds 25 percent of the total amount awarded for the current budget period. Using the cumulative, or net effect, of amounts over and underspent may offset significant differences in spending within a budget. This may create misleading results and sway conclusions about spending patterns.

Recommendation Number Three

## OASH Comment

The OASH agreed that it is appropriate to request revised budgets and additional documentation under certain instances when a substantial amount of carry-over occurs. The OASH also believes that the decision to require additional information should be left to the discretion of the Grants Management Officer (GMO), and plans to include similar language in the PHS Grants Policy Statements.

## Additional Comments by the office of Audit Services

We agree that requiring revised budgets and additional documentation for instances when immaterial amounts are carried over may not be warranted. We also agree that the GMO may be in the best position to determine when such a request is necessary. However, we believe that instructions for the carry over of funds should be clear and specifically require GMOs to instruct grantees to submit a revised budget for the use of unspent grant funds when a substantial carry-over of funds from one budget year to another occurs. Furthermore, decisions made by GMOs should be adequately documented, and reviewed and approved by a superior.

We request that you provide the Office of Audit Services with the status of actions taken on recommendations within 60 days from the date of this report. If you wish to discuss any of the issues raised in this report, please call me or have your staff contact Daniel W. Blades, Assistant Inspector General for Public Health Service Audits, at (301)443-3582. To facilitate identification, please refer to Common Identification Number A-06-91-00073 in all correspondence relating to this report.

| Sample Objective: | The objective of our sample was to determine whether colleges and universities used NIH research funds as budgeted for each line item of projects awarded. |
| :---: | :---: |
| Background | The NIH awarded approximately $\$ 6$ billion for |
| Information: | health research and development during |
|  | FY 1989. Domestic institutions of higher |
|  | education received approximately 74 percere, |
|  | or $\$ 4.4$ billion, of the NIH awards. |
|  | Universities for which hHS has audit |
|  | cognizance received $\$ 3.9$ billion. |
| Population: | The population consisted of 16,958 research |
| Population: | projects awarded to 128 colleges and |
|  | universities. The populations included only |
|  | research projects that were awarded: |
|  | During CY 1989; |
|  | to domestic colleges and universities |
|  | for which the office of Inspector |
|  | General was the cognizant audit agency |
|  | and |
|  | -- to those colleges and universities which |
|  | received the top 95 percent of NIH |
|  | funds. |

Sample Design:
A sample was selected using stratified random sampling. Two strata were identified. (fe sampled from the first strata and projected our results to this strata. We determined that it was not necessary to sample and project results from the second strata.

The first strata consisted of the 44 colleges and universities which were awarded the most funds. These schools were awarded 11,453 research projects amounting to \$2,729,490,868. The schools in the first strata received 70 percent of the funds awarded to the colleges and universities for which HHS was assigned audit cognizance.

Sample Size:

Source of Random Numbers:

Characteristics to be Measured:

Other Evidence:
Extrapolation:

The second etrata consiated of the romalning 84 colleges and universities. These chools recelved 5,505 research projects with awards totaling $\$ 955,390,481$. The schoole in the second strata received 25 percent of the tunds awarded to the colleges and universities for which hHS was assigned audit cognizance.

One hundred research projects wer selected from the first strata.

The offlce of Audit Services' Statistical Sampling Software was used to determine the random numbers for drawing the sample.

For each research project and cost category, we measured the difference between the amounts awarded by the PHS and the amounts actually spent by the universities.

None.
The total amount awarded by the PHS on the 100 sampled research projects was $\$ 18,514,980$. Fifty-two sampled projects had unspent budget balances totaling $\$ 1,392,184$. Based on our sample, we estimated that 5,956 awards would have unspent budget balances totaling $\$ 159,446,834$.

## 8NMPLE RESULTB

Sample Population ..... 11,453
standard Sample Size ..... 100
Value of Research Project Sampled ..... $\$ 18,514,980$
Sample Research Projects with Unspent Budget Balances ..... 52at the 90 Conildence Lovel
Upper Linit ..... 6,935
Lower Limit ..... 4,966
Amount of Unspent Budget Balances
on 52 Research Projects with Unspent Budget Balances $\$ 1,392,184$at the 90 confldence Level
\$247,754,830
Upper Limit\$71,138,837
Estimated Number of Research Projects with Unspent Budget Balances ..... 5,956
Estimated Amount of Unspent Budget Balances ..... $\$ 159,446,834$

## LISTING OF 39 COLLEGES AND UNIVERSITIES VI8ITED

```
BOSTON UNIVERSITY
UNIVERSITY OF MASSACHUSETTS MEDICAL CENTER AT WORCESTER
HARVARD UNIVERSITY
YALE UNIVERSITY
NEY YORK UNIVERSITY MEDICAL CENTER
ROCKERPELLER UNIVERSITY
YESHIVA UNIVERSITY
MT. SINAI SCHOOL OF MEDICINE
VIRGINIA COMMONWEALTH UNIVERSITY
UNIVERSITY OF VIRGINIA
JOHNS HOPKINS UNIVERSITY
UNIVERSITY OF PITTSBURGH
UNIVERSITY OF PENNSYLVANIA
UNIVERSITY OF MIAMI
VANDERBILT UNIVERSITY
UNIVERSITY OF NORTH CAROLINA CHAPEL HILL
UNIVERSITY OF ALABAKA AT BIRMINGHNM
DUKE UNIVERSITY
EMORY UNIVERSITY
OHIO STATE UNIVERSITY
CASE WESTERN RESERVE UNIVERSITY
UNIVERSITY OF WISCONSIM AT MADISON
UNIVERSITY OF CHICAGO
UNIVERSITY OF MINNESOTA
UNIVERSITY OF MICHIGAN
UNIVERSITY OF TEXAS M.D. ANDERSON CANCER CENTER
BAYIOR COLLEGE OF MEDICINE
UNIVERSITY OF UTAH
UNIVERSITY OF COLORADO HEALTH SCIENCE CENTER
UNIVERSITY OF IOWA
KASHINGTON UNIVERSITY AT ST. LOUIS
UNIVERSITY OF WASHINGTON
UNIVERSITY OF SOUTHERN CALIFORNIA
UNIVERSITY OF ARIZONA
UNIVERSITY OF CALIFORNIA, BERKELEY
UNIVERSITY OF CALIPORNIA, DAVIS
UNIVERSITY OF CALIFORNIA, LOS ANGELES
UNIVERSITY OF CALIFORNIA, SAN DIRGO
UNIVERSITY OF CALIPORNIA, SAN PRANCISCO
```

| OIG SAMPLE NUMBER | AMOUNTS BUDGETED BY NHH | UNIVERSTTY EXPENDTURES | DIFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| 04614 | 6818,230.00 | \$400,406.00 | \$427,805.00 | 63.41\% |
| 04043 | 2253,250.00 | \$123,080.00 | \$130.173.00 | 48.009\% |
| 03302 | \$403,340.00 | \$367,709.00 | \$05,037.00 | 79.369 |
| 01837 | \$209.428.00 | 3134,106.00 | \$72,320.00 | 64.9796 |
| 02298 | \$130,121.00 | \$80, 303.:1 | \$56, 17.19 | 58.0996 |
| 03639 | \$267.781.00 | \$207,023.00 | \$50.138.00 | 80.56\% |
| 00202 | \$184.737.00 | \$137,764.00 | \$46.973.00 | 74.5790 |
| 11460 | \$168.099.00 | \$110,103.00 | \$45.896.00 | 70.58\% |
| 08716 | \$80.723.00 | \$18,647.00 | \$42.076.00 | 30.71\% |
| 00950 | \$140,099.00 | \$103,096.00 | \$36.104.00 | 74.2396 |
| 08706 | \$84,723.00 | \$49,213.00 | \$35,510.00 | 58.09\% |
| 02240 | \$119,029.00 | \$88.581.34 | \$20.447.06 | 75.05\% |
| 05601 | \$154.040.00 | \$125,850.00 | \$28,484.00 | $81.51 \%$ |
| 08278 | \$141.011.00 | \$116,761.96 | \$25,149.04 | $82.28 \%$ |
| 00073 | \$183,258.00 | \$168.219.06 | \$25,038.94 | 80.34\% |
| 08501 | \$136,055.00 | \$116,209.00 | \$ $\$ 20,840.00$ | 84.68\% |
| 02827 | \$167,421.00 | \$137,376.00 | \$20,046.00 | 87.27\% |
| 0277 | \$67,036.00 | \$47.918.00 | \$19,118.00 | 71.48\% |
| 08708 | \$146.487.00 | \$127,989.04 | \$17.477.36 | 87.09\% |
| 05896 | \$258,778.00 | \$242.438.00 | \$16,342.00 | 03.88\% |
| 03622 | \$130,844.00 | \$114,755.00 | \$16,089.00 | 87.70\% |
| 10722 | \$343,539.00 | \$327,657.00 | \$15.082.00 | 05.35\% |
| 04500 | \$151,138.00 | \$135,461.62 | \$15,678.48 | 89.83\% |
| 00823 | \$135,305.00 | \$125,895.00 | \$9,410.00 | 93.05\% |
| 02624 | \$80,897.00 | \$72.210.01. | \$8,686.09 | 89.28\% |
| 07241 | \$226.148.00 | \$217.780.64 | \$8,387.38 | 86.30\% |
| 04578 | \$535,308.00 | \$527,853.82 | \$7.454.18 | 98.81\% |
| 08209 | \$96,097.00 | \$89,445.00 | \$7,252.00 | 92.50\% |
| 07312 | \$166,642.00 | \$160,108.70 | \$6.443.30 | 96.13\% |
| 06425 | \$160.040.00 | \$153,608.00 | \$6.432.00 | 95.98\% |
| 09818 | \$92,927.00 | \$87.457.00 | \$5,470.00 | 94.1196 |
| 07420 | \$173.125.00 | \$168,022.00 | \$5,103.00 | 97.05\% |
| 00157 | \$222,016.00 | \$216.087.00 | \$5.028.00 | 97.74\% |
| 03423 | \$83,072.00 | \$78.138.46 | \$4.933.54 | 94.06\% |
| 02830 | \$ $\$ 69.174 .00$ | \$64,569.00 | \$4.605.00 | 93.34\% |
| 00881 | \$196,243.00 | \$191,047.00 | \$4.596.00 | 97.66\% |
| 02880 | \$157.562.00 | \$154.817.00 | \$2,745.00 | 98.26\% |
| 05863 | \$123,209.00 | \$120,711.00 | \$2,498.00 | 97.97\% |
| 01352 | \$189,840.00 | \$197,374.93 | \$2,465.07 | 98.77\% |
| 00173 | \$189,979.00 | \$187,653.00 | \$2,326.00 | 38.78\% |
| 05894 | \$22,653.00 | \$20,520.00 | \$2,133.00 | 90.58\% |
| 05444 | \$187,651.00 | \$185,575.00 | \$2,076.00 | 98.89\% |
| 08080 | \$1.012.229.00 | \$1,010,683.00 | \$1.540.00 | 89.85\% |
| 04164 | \$239,336.00 | \$238,034.00 | \$1,302.00 | 99.46\% |
| 10085 | \$119.064.00 | \$118,143.71 | \$920.29 | 99.23\% |
| 05867 | \$122,484.00 | \$121,792.00 | \$692.00 | 99.44\% |
| 04678 | \$65,112.00 | \$64,478.00 | \$634.00 | 99.03\% |
| 08170 | \$131,209.00 | \$130,924.91 | \$284.09 | 99.78\% |
| 00407 | \$96.791.00 | \$86,518.46 | \$272.54 | 99.72\% |
| 11079 | \$115,076.00 | \$114.918.03 | \$157.97 | 99.86\% |
| 01569 | \$79,208.00 | \$79,098.00 | \$110.00 | 99.86\% |
| 02044 | \$190.984.00 | \$180,948.00 | \$36.00 | 99 983\% |
| SUBTOTAL OF 52 |  |  |  |  |
| UNDERSPENT PROUECTS | S $\$ 10,139,022.00$ | \$8,746,838.00 | \$1,392,184.00 (1) | 86.27\% | ACTUAL UNIVERSTTY EXPENOTTURES FOR THE 100 PROUECTS REVIEWED


| OHG SAMPLE <br> NUMBER | AMOUNTS BUDGETED BY NIH | UNVERSTTY EXPENDTTURES | DIFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| 10123 | \$220,022.00 | 8914.800.48 | (\$94.187.48) | ${ }^{142.094}$ |
| 07064 | \$343,644.00 | 2430.806.00 | (387.221.00) | 128.384 |
| 01704 | \$03,240.00 | 8174,050.00 | ( 581.410 .00 ) | 187.314 |
| 00362 | \$103.067.00 | \$243.484.00 | ( 580.417 .00 ) | 149.324 |
| 03360 | \$103.201.00 | \$238,320.29 | (\$46.119.29) | 123.35\% |
| 00352 | \$02,056.00 | \$130.974.00 | (\$38.318.09) | 141.3896 |
| 04748 | \$88,732.00 | \$120.348.00 | (537.014.00) | 142.3096 |
| 10308 | \$02.346.00 | \$128,306.14 | ( $\$ 33.049 .14$ ) | 135.79\% |
| 01813 | \$126,986.00 | \$150,066.00 | (\$32.071.00) | 125.2646 |
| 00223 | \$145,984.00 | \$175,838.06 | ( 529.854 .60 ) | 120.45\% |
| 01816 | \$285,007.00 | \$312,091.00 | (\$27.084.00) | 109.484 |
| 09873 | \$144,345.00 | \$170.987.30 | ( 526.042 .30 ) | 118.4890 |
| 07463 | \$73.956.00 | \$100,004.00 | (\$26.049.00) | 135.22\% |
| 09161 | \$129,431.00 | \$152,530.00 | (\$23.108.00) | 117.85\% |
| 08940 | \$183.101.00 | \$190,360.00 | ( $\$ 16.160 .00$ ) | 108.83\% |
| 01108 | \$106,441.00 | \$210.456.00 | ( $\$ 14.015 .00$ ) | 107.13\% |
| 00568 | \$308.058.00 | \$413.861.09 | (\$13.593.90) | 103.40\% |
| 01788 | \$197.300.00 | \$210.490.00 | (\$13,130.00) | 106.854 |
| 09016 | \$172,290.00 | \$185.084.00 | (\$12.785.00) | 107.424 |
| 02402 | \$104.331.00 | \$116,210.92 | (\$11.879.92) | $111.30 \%$ |
| 00064 | \$108,514.00 | \$116,565.56 | (\$10.051.56) | 109.44\% |
| 05091 | \$224,821.00 | \$234,318.00 | (59,497.00) | 104.22\% |
| 05420 | \$237.378.00 | \$246,479.00 | (58.101.00) | 103.41\% |
| 10880 | \$392,280.00 | \$398,807.08 | (58.618.08) | 101.66\% |
| 09613 | \$183,922.00 | \$188,938.00 | ( $\$ 5.018 .00$ ) | 102.7346 |
| 00023 | \$208,637.00 | \$212,160.00 | ( $\mathbf{3}, 510.00$ ) | 101.09\% |
| 00071 | \$104,095.00 | \$188,840.00 | ( $\$ 2.745 .00$ ) | 101.414 |
| 02206 | \$89,768.00 | \$02.123.00 | ( $\$ 2,355.00$ ) | 102.624 |
| 07885 | \$145,363.00 | \$147,580.50 | ( $\$ 2.217 .50$ ) | 101.53\% |
| 05173 | \$123,231.00 | \$125,442.00 | ( $\$ 2.211 .00$ ) | 101.79\% |
| 00441 | \$146,204.00 | \$148.403.13 | ( $\$ 2.180 .13$ ) | 101.50\% |
| 02146 | \$183.798.00 | \$185,705.00 | ( $\$ 1,807.00$ ) | 101.164 |
| 04323 | \$152.212.00 | \$153,914.67 | ( $\$ 1.702 .87$ ) | 101.12\% |
| 10397 | \$101.259.00 | \$102,460.00 | ( $\$ 1.201 .98)$ | 101.19\% |
| 11143 | \$130,307.00 | \$131,229.00 | (5822.00) | 100.71\% |
| 11298 | \$229.296.00 | \$228,382.00 | (\$58.00) | 100.04\% |
| 07138 | \$82,180.00 | \$92,224.02 | (\$44.02) | $100.05 \%$ |
| 06301 | \$236,885.00 | \$236,886.00 | (\$1.00) | 100.00\% |
| SUBTOTAL OF 38 |  |  |  |  |
| OVERSPENT PROUECTS | \$6,605,554.00 | \$7,409,579.39 | (\$804,025.39) | 112.17\% |
| 08031 | \$288,043.00 | \$288,043.00 | \$0.00 | $100.00 \%$ |
| 08558 | \$253,796.00 | \$253,796.00 | \$0.00 | 100.00\% |
| 10971 | \$249,460.00 | \$249,459.99 | \$0.01 | 100.00\% |
| 11011 | \$200,708.00 | \$200,708.00 | \$0.00 | 100.00\% |
| 09580 | \$170.523.00 | \$170,523.00 | 50.00 | 100.00\% |
| 09957 | \$168,668.00 | \$168,688.00 | 50.00 | 100.00\% |
| 06458 | \$142,977.00 | \$142.977.00 | \$0.00 | 100.00\% |
| 01738 | \$126.969.00 | \$128,969.00 | \$0.00 | 100.00\% |
| 05467 | \$118.556.00 | \$118.556.00 | \$0.00 | 100.00\% |
| 07092 | \$52,704.00 | \$52,704.00 | \$0.00 | 100.00\% |
| SUBTOTAL OF 10 |  |  |  |  |
| NO VARIANCE PROUECTS | S \$1,770,404.00 | \$1,770,403.99 | \$0.01 | 100.00\% |
| TOTAL OF 100 |  |  |  |  |
| PRQJECTS REVIEWED | \$18,514,980.00 (1) | \$17,926,821.38 | \$588,158.62 | 96.82\% |

NOTE TO APPENDIX D:
1.) THE 7.5 PERCENT OF UNUSED BALANCE IS FOUND BY DIVIDING $\$ 1,392,184 \mathrm{BY} \$ 18,514,980$.

| OG SAMPLE NUMBER | AMOUNTS BUDGETED BY NIH | UNIVERSTY EXPENDTTURES | DIFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| 04.14 | 634,462.08 | 314,680.00 | 210,7\%.00 | 65374 |
| 01837 | 80,189.00 | 27,628.00 | 61.561 .00 | 30.944 |
| 00202 | 108,160.00 | 81,780.00 | 47,364.00 | 85.38\% |
| 08940 | 406.697.00 | 464.800.00 | 40,907.00 | 01.72\% |
| 02240 | 71,618.00 | 30,798.11. | 40.822 .50 | 43.00\% |
| 0455t | 78,613.00 | 41.850.00 | 36.767 .00 | 63.24\% |
| 03302 | 250.184.00 | 221.419 .46 | 34.784 .64 | 86.43\% |
| 11296 | 102.440.00 | 68,026.00 | 34.414 .00 | 66.414 |
| 06173 | 62,777.00 | 31,000.00 | 31.771 .00 | 49.30\% |
| 04576 | 267.081 .00 | 237.888.08 | 29.104 .02 | 80.07\% |
| 07684 | 249,420.00 | 220,605.00 | 28.826.00 | 88.44\% |
| 05601 | 69,020.00 | 40.842 .00 | 28,078.00 | 50.32\% |
| 02296 | 74.202 .00 | 49.729 .17 | 24.472.83 | 67.02\% |
| 08943 | 71.084 .00 | 47.821 .00 | 24.143 .00 | 68.45\% |
| 05200 | 61.509.00 | 28,109.00 | 23,400.00 | 54.57\% |
| $01 \$ 16$ | 167.021 .00 | 145.283.00 | 21.738 .00 | 86.98\% |
| 05420 | 112,420.00 | 90,818.00 | 21,002.00 | 80.78\% |
| 08796 | 40,979.00 | 20,234.00 | 20,745.00 | 49.38\% |
| 02880 | 81.198.00 | 00.471.00 | 20.725 .00 | 74.48\% |
| 07241 | 105,389.00 | 84.918.32 | 20,450.68 | 80.50\% |
| 00173 | 73,004.00 | 54,194.00 | 19.710 .00 | 73.33\% |
| 11450 | 65.041 .00 | 47.130.00 | 18.511 .00 | 71.80\% |
| 07312 | 70,236.00 | 63,467.78 | 16,767.22 | 78.13\% |
| 10722 | 202,802.00 | 187,712.00 | 15,000.00 | 92.56\% |
| 02146 | 97.207 .00 | 82.492.00 | 14.715.00 | 84.86\% |
| 08276 | 73,942.00 | 50,356.33 | 14.685.67 | 20.27\% |
| 08501 | 49,455.00 | 35.577.00 | 13,878.00 | 71.94\% |
| 00073 | 86.232.00 | 72.545 .21 | 13.686.79 | 84.13\% |
| 08716 | 14.214.00 | 1,021.00 | 13.193.00 | 7.18\% |
| 11011 | 94,986.00 | 81,008.26 | 13,177.74 | 88.01\% |
| 03822 | 80,657.00 | 70.211.00 | 10.446.00 | 87.05\% |
| 02827 | 85,013.00 | 74.633.00 | 10,380.00 | 87.79\% |
| 02624 | 64,905.00 | 54,645.23 | 10.259.77 | 84.19\% |
| 09871 | 94,253.00 | 84.082.00 | 10.171 .00 | 89.214 |
| 08031 | 109,519.00 | 100.492.24 | 9,026.76 | 91.76\% |
| 05425 | 71,855.00 | 63,453.00 | 8,402.00 | 88.31\% |
| 02206 | 52,535.00 | 44,744.00 | 7.791 .00 | 85.17\% |
| 01569 | 50,632.00 | 43,000.00 | 7.832.00 | 84.93\% |
| 06798 | 69,598.00 | 62,158.15 | 7,439.85 | 89.31\% |
| 00967 | 82.818 .00 | 75,573.76 | 7.044 .24 | 91.474 |
| 10133 | 50,248.00 | 43,524.62 | 6,723.38 | 86.62\% |
| 09580 | 72,765.00 | 68,853.00 | 5,912.00 | 91.88\% |
| 04323 | 69.023.00 | 63,144.09 | 5.878 .91 | 91.48\% |
| 09818 | 49,300.00 | 43,773.00 | 5,527.00 | 88.79\% |
| 06301 | 124.353.00 | 119,117.00 | 5,236.00 | 95.79\% |
| 0277 | 29.290.00 | 24,347.00 | 4.943.00 | 83.12\% |
| 08949 | 85,422.00 | $80,818.00$ 112.488 .88 | 4,604.00 | 94.61\% |
| 10971 | 116,899.00 | 112,436.88 | 4,462.12 | 96.18\% |
| 02402 | 54,550.00 | 50,187.74 | 4.371 .28 | 91.99\% |
| 07885 | 81,200.00 | 76,876.75 | 4,323.25 | $94.68 \%$ |
| 02830 | 54,050.00 | 49,803.00 | 4.247 .00 | 92.14\% |
| 04678 | 50.400 .00 | 46,404.00 | 3,996.00 | 92.07\% |
| 04164 | 126,989.00 | 123,141.00 | 3.848 .00 | 96.97\% |
| 07420 | 104,926.00 | 101,303.00 | 3,623.00 | 96.55\% |
| 00441 | 97,359.00 | 23,744.98 | 3,614.02 | 96.29\% |
| 00823 | 61.613 .00 | 58,526.00 | 3,087.00 | 94.99\% |
| 01738 | 67,940.00 | 65,019.00 | 2,921.00 | 95.70\% |
| 10398 | 58,732.00 | 56,540.34 | 2,191.66 | 96.27\% |
| 11079 | 39.546 .00 | 37,387.88 | 2,158.12 | 94.54\% |
| 00157 | 91,568.00 | 89,450.00 | 2.118 .00 | 97.69\% |
| 08170 | 61.702 .00 | 59,973.44 | 1.728.56 | 97.20\% |
| 00407 | 61.501 .00 | 60,510.66 | 990.34 | 98.39\% |
| 10085 | 59,493.00 | 59,464.20 | 28.80 | 99.95\% |
| SUBTOTAL OF 63 |  |  |  |  |
| UNDERSPENT PROJECTS | \$ $\$ 6,345.470 .00$ | \$5,205,408.68 | \$1,140,061.32 | 8203\% |


| OHG SAMPLE | AMOUNTS BUDGETED |
| :---: | :---: | :---: | :---: | :---: |
| NUMBER |  |$\quad$| UY NIH |
| :---: |


| OHG SAMPLE NUMBER | AMOUNTS BUDGETED BY NIH | UNIVERSTTY EXPENDTTURES | DIFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| 05539 | 183.675 .08 | E.320.00 | 154.247.00 | 17.8746 |
| 08043 | 109,028.00 | \$21.789.00 | \$47.830.00 | 31.299 |
| 00060 | 128.577 .00 | \$0.00 | \$26.577.00 | 0.004 |
| 04614 | \$18.601.00 | 5036.00 | \$17.926.00 | 3.4346 |
| 08001 | \$16.813.00 | \$020.00 | \$14.993.00 | 3.97\% |
| 03302 | \$33.948.00 | \$10,388. 82 | \$14.569.18 | 57.11\% |
| 06429 | \$36.510.00 | \$22.427.00 | \$13,083.00 | 63.16\% |
| 01352 | \$11.830.00 | 30.00 | \$11.839.00 | 0.00\% |
| 00073 | \$13.172.00 | \$1,860.57 | \$11.306.43 | 14.17\% |
| 01813 | \$10.836.00 | \$0.00 | \$10.830.00 | 0.00\% |
| 10880 | \$14.901.00 | \$5.034.05 | \$9.958.05 | 33.59\% |
| 01788 | \$8,689.00 | \$0.00 | \$8.689.00 | 0.00\% |
| 02044 | \$10.152.00 | \$1.813.02 | \$8.338.08 | 17.88\% |
| 07864 | \$13,771.00 | \$5,626.00 | \$8,245.00 | 40.13\% |
| 04576 | \$26,724.00 | \$18,654.63 | \$8.089.47 | 69.80\% |
| 01108 | \$7.973.00 | 50.00 | \$7.973.00 | 0.00\% |
| 05887 | \$8,650.00 | $\$ 0.00$ | \$8,050.00 | 0.00\% |
| 05896 | \$8,360.00 | \$1.739.00 | \$8.611.00 | 20.83\% |
| 00167 | \$13.075.00 | \$6.727.00 | \$6.348.00 | 51.45\% |
| 09671 | \$9,446.00 | \$3,291.00 | \$8,154.00 | 34.84\% |
| 00823 | \$5,762.00 | \$0.00 | \$5,752.00 | 0.00\% |
| 02827 | \$0,856.00 | \$4.473.00 | \$5,383.00 | 45.38\% |
| 01815 | \$4,800.00 | \$0.00 | \$4,800.00 | 0.00\% |
| 08558 | \$10,586.00 | \$8.141.00 | \$4.445.00 | 58.01\% |
| 00202 | \$8.184.00 | \$3.920.00 | \$4.264.00 | 47.90\% |
| 08796 | \$5,927.00 | \$1,801.00 | \$4,128.00 | 30.39\% |
| 00513 | \$7.040.00 | \$3,069.00 | \$3,971.00 | 43.59\% |
| 04164 | \$4,476.00 | \$8834.00 | \$3.641.00 | 18.64\% |
| 08031 | \$13,230.00 | 59,608.35 | \$3,621.65 | 72.83\% |
| 02402 | \$5,253.00 | \$1.850.00 | \$3,603.00 | 31.41\% |
| 05425 | \$8.951.00 | \$3,428.00 | \$3.523.00 | 49.32\% |
| 07420 | \$5,000.00 | \$1,588.00 | \$3,432.00 | 31.38\% |
| 02295 | \$8,800.00 | \$5,372.12 | \$3,427.88 | 61.05\% |
| 03423 | \$4.536.00 | \$1.188.48 | \$3.347.52 | 26.20\% |
| 00352 | \$4,335.00 | \$1.487.62 | \$2.867.38 | 33.86\% |
| 07133 | \$3,190.00 | \$421.41 | \$2.768.59 | 13.21\% |
| 01837 | \$2,684.00 | \$0.00 | \$2.884.00 | 0.00\% |
| 08352 | \$3,097.00 | \$581.00 | \$2,538.00 | 18.11\% |
| 09616 | \$3,041.00 | \$936.00 | \$2,105.00 | 30.78\% |
| 05091 | \$2,700.00 | \$887.00 | \$2,013.00 | 25.44\% |
| 08223 | \$3,612.00 | \$1,774.50 | \$1,837.50 | 49.13\% |
| 09818 | \$4,468.00 | \$2,655.00 | \$1.813.00 | 59.42\% |
| 05444 | \$1.778.00 | \$0.00 | \$1.778.00 | 0.00\% |
| 01738 | \$1.653.00 | \$0.00 | \$1.853.00 | 0.00\% |
| 05894 | \$1,999.00 | \$421.00 | \$1,578.00 | 21.06\% |
| 05883 | \$1,795.00 | \$308.00 | \$1.489.00 | 17.05\% |
| 04748 | \$2,200.00 | \$859.00 | \$1,341.00 | 39.05\% |
| 04569 | \$1,817.00 | \$608.41 | \$1.208.59 | 33.48\% |
| 02777 | \$1,608.00 | \$444.00 | \$1.162.00 | 27.65\% |
| 08170 | \$4,880.00 | \$3,750.87 | \$1,129.13 | 76.86\% |
| 06708 | \$2,885.00 | \$1.768.61 | \$1,126.39 | 61.08\% |
| 09873 | \$1.517.00 | \$397.85 | \$1,119.15 | 26.23\% |
| 10971 | \$6,230.00 | \$5,261.50 | \$968.50 | 84.45\% |
| 03822 | \$3,200.00 | \$2,322.00. | \$878.00 | 72.56\% |
| 09580 | \$2,399.00 | \$1,537.00 | \$862.00 | 64.07\% |
| 00173 | \$44,755.00 | \$43,906.00 | \$849.00 | 98.10\% |
| 01569 | \$800.00 | \$0.00 | \$800.00 | 0.00\% |
| 00854 | \$1,820.00 | \$905.86 | \$714.14 | 55.9296 |
| 11079 | \$3,034.00 | \$2,342.91 | \$691.09 | 77.22\% |
| 11143 | \$3,780.00 | \$3,362.82 | \$417.18 | 88.96\% |
| 08715 | \$300.00 | 592.00 | \$208.00 | 30.67\% |
| 07453 | \$538.00 | \$423.00 | \$115.00 | 78.62\% |
| 04678 | \$3.100.00 | \$3,030.00 | \$70.00 | 97.74\% |
| SUBTOTAL OF 63 |  |  |  |  |
| UNDERSPENT PROJECTS | S \$638,450.00 | \$242,133.20 | \$396,316.80 | 37.93\% |


| OIG SAMPLE NUMBER | AMOUNTS BUDGETED BY NIH | UNIVERSTY EXPENDTTURES | DIFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| $6{ }^{\text {dre }}$ | \$23.53.60 | \$83.408.00 | (350.568.06) | 348.806 |
| 00458 | \$14.220.00 | \$30.287.06 | (\$16.087.00) | 212.094 |
| 08568 | \$85.041.00 | \$100.270.03 | (\$15.235.03) | 117.014 |
| 02146 | \$8,801.00 | \$17.747.00 | (58.856.00) | $199.81 \%$ |
| 07312 | \$7.638.00 | \$16.285.78 | (58.747.78) | 216.05\% |
| 04323 | \$3.150.00 | \$8,089.70 | ( $\mathbf{5 5 , 8 3 9 . 7 9 \text { ) }}$ | 285.30\% |
| 11011 | \$2.100.00 | \$7,968.12 | ( 56.808 .12 ) | 388.89\% |
| 00023 | \$0.150.00 | \$13,109.00 | (\$4.013.00) | 143.83\% |
| 10133 | \$15.215.00 | \$18,850.49 | ( 53.641 .49 ) | 123.93\% |
| 11450 | \$2.004.00 | \$8,292.00 | (33.388.00) | 216.67\% |
| 08200 | \$1.584.00 | \$4,288.00 | ( $\$ 2.884 .00$ ) | 269.44\% |
| 08949 | \$4.400.00 | \$7,045.00 | ( $\$ 2.845 .00$ ) | 160.11\% |
| 10308 | \$1.013.00 | \$3,615.14 | ( $\$ 2.802 .14$ ) | 358.87\% |
| 05173 | \$1,949.00 | \$4,385.00 | (\$2.416.00) | 223.96\% |
| 08278 | \$2,543.00 | \$4,495.17 | ( 51.962 .17 ) | 170.77\% |
| 00981 | \$7.354.00 | \$9.130.00 | (\$1.770.00) | 124.15\% |
| 07241 | \$3,980.00 | \$5,689.06 | (\$1.729.96) | 143.69\% |
| 08161 | \$811.00 | \$2.421.00 | (\$1,810.00) | 298.52\% |
| 02208 | \$1.611.00 | \$2,875.00 | ( $\$ 1.264 .00$ ) | 178.46\% |
| 02830 | \$800.00 | \$1.652.00 | ( $\mathbf{1} 1.052 .00$ ) | 275.33\% |
| 02880 | \$2.802.00 | \$3,828.00 | (51.028.00) | 138.22\% |
| 00407 | 5881.00 | \$1,943.30 | (5962.30) | 198.09\% |
| 05467 | \$1.503.00 | \$1.032.00 | (\$429.00) | 128.54\% |
| 10722 | \$7.772.00 | \$8,040.00 | ( $\$ 288.00$ ) | 103.45\% |
| 10085 | \$1,350.00 | \$1,517.25 | (\$187.25) | 112.30\% |
| 03350 | \$18,727.00 | \$18.807.43 | (580.43) | 100.43\% |
| 10397 | \$2.156.00 | \$2,195.94 | (\$398.94) | 101.8546 |
| 07885 | \$6.000.00 | \$8.038.51 | (\$38.51) | 100.64\% |
| 00441 02240 | \$0.00 | \$240.00 | (\$240.00) | - |
| 02240 | 50.00 | \$15.00 | (\$15.00) | - |
| SUBTOTAL OF 30 OVERSPENT PROJECTS | \$239.229.00 | \$393,391.57 | (\$154, 162.57) | 164.44\% |
| TOTAL OF 100 |  |  |  |  |
| PROJECTS REVIEWED(1) | ) \$877,679.00 | \$635,524.77 | \$242,154.23 | 72.41\% |

NOTE TO APPENDIX F:
1.) SEVEN OF THE RESEARCH PROJECTS DID NOT HAVE AMOUNTS BUDGETED OR UNIVERSTTY EXPENDITURES INCURRED FOR OTHER COSTS.

| OHG SAMPLE NUMBER | AMOUNTS BUDGETED BY NIH | UNIVERSTTY EXPENDTURES | DIFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| 0880 | 57,040.00 | \$2,617.00 | \$1.523.00 | 35.73\% |
| 04014 | \$0.000.00 | \$3.180.00 | \$2.820.00 | 63.00\% |
| 02827 | \$2,440.00 | \$17.00 | \$2,623.00 | 0.64\% |
| 04678 | 86,086.00 | \$4.430.18 | \$2,637.85 | 03.589 |
| 08568 | \$1.890.00 | \$0.00 | \$1,800.00 | 0.00\% |
| 00081 | \$5,096.00 | \$3,279.00 | \$1.816.00 | 64.36\% |
| 00873 | \$1.900.00 | \$178.00 | \$1.782.00 | 9.0896 |
| 00613 | \$1.780.00 | \$0.00 | \$1.760.00 | 0.00\% |
| 06468 | \$1.470.00 | \$0.00 | \$1.470.00 | 0.00\% |
| 02249 | \$1,350.00 | 30.00 | \$1,360.00 | 0.00\% |
| 11450 | \$1,320.00 | \$0.00 | \$1,320.00 | 0.00\% |
| 01560 | \$1,200.00 | \$0.00 | \$1.200.00 | 0.0096 |
| 03423 | \$1.158.00 | \$0.00 | \$1,158.00 | 0.0096 |
| 06001 | \$1,128.00 | \$0.00 | \$1,128.00 | 0.00\% |
| 08940 | \$1.056.00 | \$0.00 | \$1.056.00 | 0.00\% |
| 08706 | \$1.573.00 | \$597.00 | \$978.00 | 37.06\% |
| 02145 | \$1,416.00 | \$444.00 | \$972.00 | 31.36\% |
| 06173 | \$000.00 | \$0.00 | \$900.00 | 0.0096 |
| 06352 | \$895.00 | \$0.00 | \$895.00 | 0.00\% |
| 10133 | \$1,980.00 | \$1,070.05 | \$889.06 | 54.50\% |
| 09580 | \$875.00 | \$0.00 | \$875.00 | 0.00\% |
| 09067 | \$800.00 | \$0.00 | \$800.00 | 0.00\% |
| 10397 | \$784.00 | \$0.00 | \$784.00 | 0.00\% |
| 00816 | \$720.00 | \$0.00. | \$720.00 | 0.00\% |
| 01738 | \$851.00 | \$0.00 | \$651.00 | 0.0096 |
| 01837 | \$1.421.00 | \$805.00 | \$616.00 | 56.65\% |
| 04164 | \$1.790.00 | \$1.194.00 | \$596.00 | 66.70\% |
| 05429 | \$4.515.00 | \$3,935.00 | \$580.00 | 87.15\% |
| 00023 | \$2,970.00 | \$2,391.00 | \$579.00 | 80.51\% |
| 03302 | \$8.095.00 | \$7,528.28 | \$588.74 | 93.00\% |
| 07312 | 5986.00 | \$454.23 | \$531.77 | 48.07\% |
| 01813 | \$452.00 | \$0.00 | \$452.00 | 0.00\% |
| 08170 | \$700.00 | \$271.67 | \$428.33 | 38.81\% |
| 08715 | \$1.500.00 | \$1.080.00 | \$420.00 | 72.00\% |
| 00157 | \$1.538.00 | \$1,123.00 | \$415.00 | 73.02\% |
| 11143 | \$800.00 | \$388.50 | 5411.50 | 48.56\% |
| 08031 | \$2,700.00 | \$2,300.40 | \$399.60 | 85.20\% |
| 07885 | \$800.00 | \$416.40 | \$383.60 | 52.05\% |
| 00173 | \$2.520.00 | \$2.164.00 | \$356.00 | 85.87\% |
| 01198 | \$2,292.00 | \$1,949.00 | \$343.00 | 85.039\% |
| 09161 | \$869.00 | \$555.00 | \$314.00 | 63.87\% |
| 02830 | \$1,000.00 | \$729.00 | \$271.00 | 72.90\% |
| 00202 | \$968.00 | \$720.00 | \$248.00 | 74.38\% |
| 0277 | \$727.00 | \$506.00 | \$221.00 | 69.60\% |
| 06073 | \$890.00 | \$698.00 | \$182.00 | 78.43\% |
| 02044 | \$1.620.00 | \$1.436.62 | \$183.48 | 88.67\% |
| 11296 | \$1.408.00 | \$1,225.00 | \$183.00 | 87.00\% |
| 02295 | \$880.00 | \$703.00 | \$177.00 | 79.89\% |
| 10971 | \$965.00 | \$813.16 | \$151.84 | 84.27\% |
| 07654 | \$2.100.00 | \$1.995.00 | \$105.00 | 95.009\% |
| 07420 | \$500.00 | \$404.00 | \$96.00 | 30.8096 |
| 05444 | \$1.068.00 | \$992.00 | \$76.00 | 92.88\% |
| 01788 | \$1.355.00 | \$1,296.00 | \$59.00 | 85.65\% |
| 02402 | \$949.00 | \$900.74 | \$48.26 | 94.91\% |
| 10722 | \$784.00 | \$774.00 | \$10.00 | 88.72\% |
| 05425 | \$486.00 | \$481.00 | \$5.00 | 98.97\% |
| SUBTOTAL OF 56 |  |  |  |  |
| UNDERSPENT PROJECTS | S \$102,257.00 | \$55,941.08 | \$46,315.92 | 54.71\% |


| OIG SAMPLE NUMBER | AMOUNTS BUDGETED BY NIH | UNIVERSTTY EXPENDTTURES | DIFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| T1011 | \$675.00 | 53.65 .78 | (\$2.013.76) | 831.67\% |
| 03022 | \$750.00 | \$3.013.00 | ( $\$ 2.203 .00$ ) | 401.73\% |
| 10860 | 81.342.00 | \$3,217.77 | (\$1.876.77) | 230.77\% |
| 08501 | \$800.00 | \$2,670.00 | ( $\$ 1.770 .00$ ) | 321.2546 |
| 03639 | \$3,801.00 | \$6,540.00 | ( $\$ 1.730 .00$ ) | 145.75\% |
| 00071 | \$1,155.00 | \$2.856.00 | (\$1,701.00) | $24727 \%$ |
| 04746 | \$500.00 | \$2.081.00 | (\$1.581.00) | 410.2046 |
| 07241 | \$1,320.00 | \$2.729.23 | (\$1,400.23) | 206.78\% |
| 04078 | \$700.00 | \$2.030.00 | (\$1.330.00) | 200.00\% |
| 08708 | \$918.00 | \$2.123.21 | (\$1.205.21) | $231.20 \%$ |
| 05803 | \$750.00 | \$1.823.00 | (\$1.073.00) | 2430740 |
| 10398 | \$705.00 | \$1,714.16 | (\$1,009.16) | 243.14\% |
| 01352 | \$1,000.00 | \$1.951.33 | (\$851.33) | 125.13\% |
| 02880 | \$ $\$ 090.00$ | \$1,860.00 | (\$879.00) | 188.70\% |
| 00823 | \$840.00 | \$1,610.00 | (\$881.00) | 232.87\% |
| 07463 | \$528.00 | \$1.338.00 | (\$810.00) | 253.41\% |
| 04509 | \$1,384.00 | \$2.130.84 | (\$746.84) | 153.98\% |
| 01816 | \$ $\$ 800.00$ | \$1,350.00 | (\$550.00) | 168.75\% |
| 08223 | \$1,355.00 | \$1.885.49 | (\$530.49) | 139.15\% |
| 05209 | \$528.00 | \$1,030.00 | (\$502.00) | $195.08 \%$ |
| 08278 | \$1,350.00 | \$1,841.18 | (\$401.18) | 136.38\% |
| 09950 | \$4,325.00 | \$4.800.02 | (\$475.02) | 110.989 |
| 11079 | \$ $\mathbf{7 1 8 . 0 0}$ | \$1.178.00 | (\$462.06) | 184.53\% |
| 10085 | \$540.00 | \$988.36 | (\$448.36) | 183.03\% |
| 04323 | \$1,350.00 | \$1.778.79 | (\$428.79) | 131.76\% |
| 09818 | \$730.00 | \$1.161.00 | ( 5421.00 ) | 157.87\% |
| 02206 | \$885.00 | \$1,279.00 | (\$384.00) | 142.91\% |
| 05867 | \$800.00 | \$1,103.00 | (\$303.00) | 137.88\% |
| 03350 | \$1.470.00 | \$1.707.95 | (\$237.95) | 116.19\% |
| 00407 | \$1.092.00 | \$1,302.50 | (\$210.50) | 119.28\% |
| 05891 | \$1,288.00 | \$1.432.00 | (\$134.00) | 110.32\% |
| 00654 | \$630.00 | \$753.48 | (\$123.48) | 119.60\% |
| 06556 | \$5,218.00 | \$5,290.29 | (\$81.28) | 101.56\% |
| 00441 | \$1.575.00 | \$1,007.51. | (\$32.51) | 102.06\% |
| 07133 | \$1.460.00 | \$1.483.44 | (\$23.44) | 101.81\% |
| 05467 | \$1.444.00 | \$1,449.00 | (\$5.00) | 100.35\% |
| 02624 | \$0.00 | \$851.89 | (\$859.89) | - |
| 05896 | \$0.00 | \$407.00 | (\$407.00) | - |
| SUBTOTAL OF 38 OVERSPENT PROJECTS | \$45,543.00 | \$76,764.24 | $(\$ 31,221.24)$ | 168.55\% |
| TOTAL OF 100 |  |  |  |  |
| PROJECTS REVIEWED $(1,2)$ | 2) $\$ 147,800.00$ | \$132,705.32 | \$15,094.68 | 89.79\% |

NOTES TO APPENDIX G:
1.) FIVE OF THE RESEARCH PROJECTS DID NOT HAVE AMOUNTS BUDGETED

OR UNIVERSITY EXPENDITURES INCURRED FOR DOMESTIC IRAVEL COSTS.
2.) NO VARIANCE FOR SAMPLE NUMBER 05894 HAVING $\$ 486$ BUDGETED FOR DOMESTIC TRAVEL.

## SUPPLY COSTS TO AMOUNTS EXPENDED BY THE UNIVERSTIES

| OHG SAMPLE NUMBER | AMOUNTS BUDGETED BY NIH | UNIVERSTTY EXPENDTTURES | DIFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| OWTL | \$2.275.00 | \$27.828.00 | \$55.378.00 | 32.736 |
| 00485 | \$27.039.00 | \$2.816.00 | \$24.222.01 | 10.42\% |
| 06868 | \$27,861.00 | \$5,242.01 | \$22,018.09 | 18.82\% |
| 08980 | \$85.407.00 | \$04,042.00 | \$20.786.00 | 76.60\% |
| 00050 | \$11.011.00 | (\$0,294.67) | \$17.305.67 | -67.17\% |
| 08715 | \$10,312.00 | \$2.034.00 | \$18.378.00 | 16.19\% |
| 02296 | \$15,840.00 | \$2,884.26 | \$12,056.74 | 18.21\% |
| 08796 | \$23,600.00 | \$11.150.62 | \$12,409.14 | 47.364 |
| 00613 | \$24,204.00 | \$12,307.00 | \$11,807.00 | 51.22\% |
| 07133 | \$20,804.00 | \$9,741.40 | \$11.082.61 | 48.83\% |
| 08043 | \$11,350.00 | \$1.223.00 | \$10.133.00 | 10.77\% |
| 05467 | \$10.954.00 | \$2,630.00 | \$8,424.00 | 23.10\% |
| 05863 | \$20,135.00 | \$12.734.00 | \$7.401.00 | 63.24\% |
| 00941 | \$29,364.00 | \$23,143.00 | \$8,221.00 | 78.81\% |
| 11480 | \$14.218.00 | \$8,442.00 | \$5,776.00 | 59.38\% |
| 06091 | \$7.766.00 | \$2,586.00 | \$5.180.00 | 33.30\% |
| 09816 | \$5,616.00 | \$542.00 | \$5,074.00 | 9.85\% |
| 10880 | \$42,986.00 | \$38,991.00 | \$3,996.00 | 90.71\% |
| 00023 | \$29,898.00 | \$25,805.00 | \$3,891.00 | 86.90\% |
| 11143 | \$8,474.00 | \$4.095.74 | \$3,778.26 | 55.41\% |
| 03302 | \$8,475.00 | \$5,255.87. | \$3.219.13 | 62.02\% |
| 02044 | \$23.699.00 | \$20,794.43 | \$2,904.57 | 87.74\% |
| 08276 | \$8,000.00 | \$6,557.94 | \$2.442.08 | 72.87\% |
| 09161 | \$11.989.00 | \$ $\$ 0,704.00$ | \$2,285.00 | 80.94\% |
| 00301 | \$14,400.00 | \$12.391.00 | \$2,009.00 | 88.05\% |
| 06352 | \$26,953.00 | \$25,756.00 | \$1.197.00 | 95.56\% |
| 10085 | \$13,500.00 | \$12,334.41 | \$1.166.50 | 91.37\% |
| 10397 | \$8,880.00 | \$7.871.82 | \$1,008.18 | 88.65\% |
| 05807 | \$1,000.00 | \$0.00 | \$1.000.00 | 0.00\% |
| 02830 | \$8,400.00 | \$7,002.00 | \$798.00 | 90.50\% |
| 03622 | \$1,500.00 | \$969.00 | \$531.00 | 64.60\% |
| 05895 | \$1,200.00 | \$697.00 | \$503.00 | 58.08\% |
| 00407 | \$ $\$ 455.00$ | $\$ 0.00$ | \$455.00 | 0.00\% |
| 03350 | \$14.700.00 | \$14.337.80 | \$362.04 | 97.54\% |
| 02777 | \$10.829.00 | \$10.486.00 | \$343.00 | 96.83\% |
| 09873 | \$1,960.00 | \$1.922.12 | \$37.88 | 98.07\% |
| 04323 | \$12,780.00 | \$12,758.85 | \$21.15 | 99.8396 |
| 04500 | \$9,224.00 | \$9.208.35 | \$17.65 | 99.81\% |
| SUBTOTAL OF 38 |  |  |  |  |
| UNDERSPENT PROJECTS | S \$696,831.00 | \$411,786.39 | \$285,044.61 | 59.09\% |

## BUPPLY COSTS TO AMOUNTS EXPENDED BY THE UNIVERSTIES

| OHG SAMPLE NUMBER | AMOUNTS BUDGETED BY NIH | UNIVERSTY EXPENDTURES | DIFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| ठ1E18 | \$23.000.00 | 187.630 .00 | (544.359.08) | 293.685 |
| 08689 | 564.134.00 | \$107.230.00 | ( $543,092.00$ ) | 107180 |
| 08172 | \$19.061.00 | \$61.236.00 | (531.884.00) | 250.814 |
| 11208 | \$26.503.00 | \$53.530.00 | (\$27.036.00) | 202014 |
| 00067 | \$11.894.00 | \$35.815.22 | (\$23.921.22) | 301 12\% |
| 05091 | \$13.321.00 | \$36.027.00 | (\$22.706.00) | 270.454 |
| 10308 | \$1.946.00 | \$22.850.82 | (\$20.910.82) | 1174.55\% |
| 05429 | \$21.314.00 | \$40.864.00 | ( $\$ 19.560 .00$ ) | 191.72\% |
| 02240 | \$13,500.00 | \$32.734.94 | ( $\$ 19.234 .64$ ) | $242.48 \%$ |
| 08031 | \$37.800.00 | \$55.944.60 | (\$18.144.58) | $148.00 \%$ |
| 00362 | \$19.088.00 | \$37.021.80 | ( 517.935 .80 ) | 193.87\% |
| 07054 | \$25.470.00 | \$42.903.00 | (\$17.427.00) | 168.41\% |
| 02402 | \$14,568.00 | \$30,536.94 | (\$15.988.94) | 209.82\% |
| 04576 | \$56.303.00 | \$70,880.99 | ( 515.287 .90 ) | 127.80\% |
| 00671 | \$14.701.00 | \$20,845.00 | ( 515.084 .00 ) | 202.19\% |
| 01704 | \$14,310.00 | \$28.981.00 | (\$14.061.00) | 202.38\% |
| 07241 | \$33.686.00 | \$48,314.13 | (\$14.028.13) | 143.42\% |
| 04748 | \$12,460.00 | \$26,259.00 | ( $513,809.00$ ) | 210.924 |
| 01813 | \$10.688.00 | \$24,424.00 | (\$13,736.00) | 228.52\% |
| 02880 | \$22,800.00 | \$36.461.00 | (\$13.055.00) | 159.87\% |
| 08223 | \$16,351.00 | \$28.092.80 | (\$12.741.80) | 183.00\% |
| 01837 | \$22.202.00 | \$34.683.00 | (\$12.481.00) | 156.22\% |
| 05209 | \$13.065.00 | \$24.968.00 | (\$11.003.00) | 191.11\% |
| 08949 | \$18.920.00 | \$30.586.00 | (\$11.688.00) | 181.68\% |
| 01500 | \$7.473.00 | \$15,726.00 | (58,253.00) | 210.44\% |
| 09580 | \$25,463.00 | \$33,112.00 | (57.048.00) | 130.04\% |
| 10133 | \$3,920.00 | \$11.383.30 | (57.483.30) | 290.39\% |
| 00073 | \$21.802.00 | \$29.248.26 | (\$7.446.26) | 134.15\% |
| 01108 | \$26.009.00 | \$34,314.00 | (57.405.00) | 127.52\% |
| 02208 | \$8,444.00 | \$13.797.00 | ( $57,353.00$ ) | 214.11\% |
| 02146 | \$5,970.00 | \$12,854.00 | (56,884.00) | 211.96\% |
| 01738 | \$15.447.00 | \$21.946.00. | (58.499.00) | 142.07\% |
| 01788 | \$21,672.00 | \$27.662.00 | ( 55.990 .00 ) | 127.649\% |
| 01352 | \$38,558.00 | \$44,870.12 | ( 55.312 .12$)$ | $113.43 \%$ |
| 07885 | \$5,000.00 | \$9,727.02 | (54.727.02) | 194.54\% |
| 02827 | \$11.433.00 | \$15,947.00 | (\$4.514.00) | $139.48 \%$ |
| 11011 | \$22,448.00 | \$28,903.87 | (\$4.455.87) | 119.859 |
| 04184 | \$13.031.00 | \$17.349.00 | ( 54.318 .00 ) | 133.14\% |
| 00173 | \$1.440.00 | \$5.746.00 | ( 54.306 .00 ) | 399.03\% |
| 07312 | \$15,389.00 | \$18.539.30 | ( 54.150 .30 ) | 126.97\% |
| 10971 | \$24,394.00 | \$28,344.69 | ( 53.950 .69 ) | $116.20 \%$ |
| 11079 | \$17.948.00 | \$21,811.79 | ( 53.863 .79 ) | 121.534 |
| 07420 | \$5.000.00 | \$8.833.00 | ( 33.833 .00 ) | 176.66\% |
| 10722 | \$20.763.00 | \$24.534.00 | ( $\$ 3,771.00$ ) | 118.16\% |
| 09818 | \$3.115.00 | \$6.641.00 | ( 33.526 .00 ) | 213.19\% |
| 05425 | \$20.597.00 | \$23.732.00 | ( 3 3,135.00) | 115.22\% |
| 05444 | \$2,138.00 | \$5,050.00 | ( 52.814 .00 ) | 236.42\% |
| 08795 | \$1.786.00 | \$4.143.00 | ( $\$ 2.357 .00$ ) | 231.97\% |
| 04678 | \$6.200.00 | \$8,381.00 | (\$2.181.00) | 135.18\% |
| 00157 | \$18.594.00 | \$20.648.00 | (\$2.054.00) | 111.054\% |
| 00441 | \$2.187.00 | \$4.094.27 | ( $\$ 1.907 .27)$ | $187.21 \%$ |
| 00202 | \$13.771.00 | \$15,504.00 | (\$1,733.00) | 112.58\% |
| 00823 | \$21.647.00 | \$23,259.00 | (\$1.612.00) | 107.45\% |
| 07453 | \$1,672.00 | \$3.102.00 | ( 51.430 .00 ) | 185.53\% |
| 02824 | \$10,000.00 | \$11,364.00 | ( $51,364.00$ ) | 113.64\% |
| 00654 | \$5,351.00 | \$6,492.06 | (\$1.141.08) | 121.32\% |
| 08501 | \$23.235.00 | \$24.037.00 | (5802.00) | 103.45\% |
| 03639 | \$2,273.00 | \$2.791.00 | (\$518.00) | 122.79\% |
| 08170 03423 | $\begin{array}{r} \$ 1.120 .00 \\ \$ 428.00 \end{array}$ | $\begin{array}{r} \$ 1,206.15 \\ \$ 491.12 \end{array}$ | $(\$ 88.15)$ | 107.69\% 114.75\% |
| SUBTOTAL OF 60 |  |  |  |  |
| OVERSPENT PROJECTS | \$971,745.00 | \$1,582,505.88 | (\$610.760.88) | 162.85\% |
| TOTAL OF 100 |  |  |  |  |
| PROJECTS REVIEWED(1) | ) $\$ 1,668,576.00$ | \$1,994,292.27 ${ }^{\circ}$ | (\$325,716.27) | 119.52\% |

NOTE TO APPENDIX H:
1.) OIG SAMPLE NUMBERS 07092 AND 05894 DID NOT HAVE AMOUNTS EITHER AWARDED TO OR EXPENDED IN THE SUPPLY COSTS CATEGORY.

COMPARISON OF AMOUNTS BUDGETED BY NIH FOR

| ONG SAMPLE NUMBER | AMOUNTS BUDGETED BY NIH | UNIVERSTTY EXPENDTTURES | IFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| 63302 | \$17.621.00 | 10.00 | 818.685.00 | 0.00\% |
| 00067 | \$0,000.00 | \$0.00 | \$9.000.00 | 0.00\% |
| 02777 | \$4.080.00 | (\$3.74.00) | \$8.408.00 | -0.944 |
| 08031 | \$14.316.00 | \$9.960.26 | \$8.364.75 | 54.364 |
| 04614 | \$7,700.00 | \$0.00 | \$7,700.00 | 0.0046 |
| 06444 | \$11.704.00 | \$0,721.00 | \$4.983.00 | 67.42\% |
| 07241 | \$3.872.00 | \$0.00 | \$3.872.00 | 0.00\% |
| 11460 | \$7.172.00 | \$3,640.00 | \$3,626.00 | 49.44\% |
| 04164 | \$10.740.00 | \$7.155.00 | \$3,585.00 | $66.62 \%$ |
| 01108 | \$3.544.00 | \$0.00 | \$3,544.00 | 0.00\% |
| 07463 | \$3,080.00 | \$0.00 | \$3.080.00 | 0.00\% |
| 02044 | \$3,384.00 | \$525.05 | \$2.858.95 | 15.52\% |
| 03822 | \$8.850.00 | \$4.574.00 | \$2.276.00 | $66.77 \%$ |
| 06467 | \$2,008.00 | \$0.00 | \$2.008.00 | 0.00\% |
| 01738 | \$1,880.00 | \$0.00 | \$1.880.00 | 0.00\% |
| 00362 | \$1.790.00 | \$0.00 | \$1.790.00 | 0.00\% |
| 00023 | \$2,640.00 | \$1,275.00 | \$1.385.00 | 48.30\% |
| 04323 | \$3,150.00 | \$2.100.00 | \$1.050.00 | 68.67\% |
| 00016 | \$900.00 | 50.00 | \$900.00 | 0.00\% |
| 07420 | \$8,800.00 | \$9,187.00 | \$813.00 | 03.74\% |
| 02145 | \$2,262.00 | \$1.898.00 | \$384.00 | 83.81\% |
| 08943 | \$895.00 | \$585.00 | \$330.00 | 63.13\% |
| 00173 | \$4,320.00 | \$4,000.00 | \$320.00 | 92.59\% |
| 09950 | \$5.017.00 | \$4,837.71 | \$179.29 | 96.43\% |
| 00081 | \$2.858.00 | \$2.515.00 | \$143.00 | 94.82\% |
| 08278 | \$5,580.00 | \$5,496.00 | \$84.00 | 98.49\% |
| SUBTOTAL OF 26 |  |  |  |  |
| UNDERSPENT PROJECTS | S $\$ 151.549 .00$ | \$60,563.01 | \$90,985.99 | 39.96\% |
| 07654 | \$4,500.00 | \$52.599.00 | (\$48,089.00) | 1168.87\% |
| 04578 | \$11.932.00 | \$29.601.86 | (\$17,669.86) | 248.09\% |
| 05429 | \$2,258.00 | \$17,752.00 | ( $\$ 15,484.00$ ) | 788.18\% |
| 08980 | \$2,640.00 | \$12,178.00 | $(58,538.00)$ | 461.29\% |
| 05425 | \$16.200.00 | \$22,581.00 | (\$6,381.00) | 138.38\% |
| 01837 | \$35.524.00 | \$40,696.00 | (\$5,172.00) | 114.56\% |
| 02880 | \$1.800.00 | \$5,541.00 | ( $\$ 3,741.00$ ) | 307.83\% |
| 08795 | \$1.788.00 | \$5,085.00 | ( $\$ 3,299.00$ ) | 284.71\% |
| 08849 | \$2,024.00 | \$3,825.00 | ( $\$ 1,901.00$ ) | 193.929 |
| 08715 | \$9,500.00 | \$11.213.00 | ( $\$ 1.713 .00$ ) | 118.03\% |
| 00073 | \$1,335.00 | \$2,725.56 | (\$1,390.56) | 204.16\% |
| 01569 | \$3,495.00 | \$4.874.00. | (\$1,379.00) | 139.46\% |
| 09818 | \$1,350.00 | \$2.509.00 | (\$1.159.00) | 185.85\% |
| 08501 | \$4.658.00 | \$5,419.00 | (\$761.00) | 116.34\% |
| 11079 | \$8,247.00 | \$6,355.35 | (\$108.35) | 101.73\% |
| 10133 | \$0.00 | \$17.577.98 | (\$17.577.98) | - |
| 07133 | \$0.00 | \$12,315.89 | (\$12.315.89) | - |
| 06798 | \$0.00 | \$11,877.97 | ( $\$ 11.877 .97$ ) | - |
| 06458 | \$0.00 | \$4,818.32 | ( $\$ 4.818 .32$ ) | - |
| 01788 | \$0.00 | \$3,183.00 | $(\$ 3,183.00)$ | - |
| 00854 | \$0.00 | \$2,903.85 | ( $\$ 2,803.85$ ) | - |
| 05209 | \$0.00 | \$2,793.00 | ( $\$ 2,793.00$ ) | - |
| 00823 | \$0.00 | \$2,523.00 | (\$2.523.00) | - |
| 10871 | \$0.00 | \$2,416.39 | (\$2.416.39) | - |
| 00157 | \$ $\mathbf{0 . 0 0}$ | \$2,038.00 | (\$2.038.00) | - |
| 09161 | \$0.00 | \$1,995.00 | ( $\$ 1.995 .00$ ) | - |
| 09873 | \$0.00 | \$1,529.35 | (\$1.529.35) | - |
| 10307 | \$0.00 | \$1,515.56 | (\$1.515.56) | - |
| 05863 | \$0.00 | \$1.409.00 | (\$1.409.00) | - |
| 07312 | \$0.00 | \$1,342.00 | (\$1,342.00) | - |
| 07885 | \$0.00 | \$1.196.57 | ( $\$ 1.196 .57$ ) | - |
| 04748 | \$0.00 | \$1.193.00 | (\$1.193.00) | - |
| 06301 | \$0.00 | \$1,117.00 | ( $\$ 1.117 .00$ ) | - |
| 01352 | \$0.00 | \$983.80 | (\$983.80) | - |
| 02402 | \$0.00 | \$874.45 | (\$874.45) | - |
| 10880 | \$0.00 | \$775.18 | (\$775.18) | - |
| 10722 02208 | $\$ 0.00$ $\$ 0.00$ | $\$ 604.00$ $\$ 586.00$ | (\$604.00) $(\$ 586.00)$ | - |
|  |  |  |  |  |
| SUBTOTAL OF 38 OVERSPENT PROJECTS | - \$105.249.00 | \$300,723.08 | (\$195,474.08) | 285.73\% |
| $\begin{aligned} & \text { TOTAL OF } 100 \\ & \text { PROJECTS REVIEWED(1) } \end{aligned}$ | ) $\$ 256,798.00$ | \$361,286.09 | (\$104,488.09) | 140.69\% |

NOTE TO APPENDIX I:
1.) THIRTY-SIX OF THE RESEARCH PROJECTS OID NOT HAVE AMOUNTS BUOGETED OR UNIVERSITY EXPENDITURES INCURRED FOR EQUIPMENT COSTS.

| OIG SAMPLE NUMBER | AMOUNTS BUDGETED BY NIH | UNIVERSTTY EXPENDTTURES | DIFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| 8486 | \$64.312.00 | \$88.265.63 | \$15,676.4 | 75.71\% |
| 08885 | 302,008.00 | \$70.412.00 | \$13.880.00 | $35.30 \%$ |
| 00067 | \$8,100.00 | \$0.00 | \$8,100.00 | 0.00\% |
| 00950 | \$2.183.00 | 20.00 | \$2.103.00 | 0.00\% |
| 00167 | \$30.004.00 | \$28,218.00 | \$1.876.00 | 93.77\% |
| 08501 | \$4,375.00 | \$3,300.00 | \$1.075.00 | 75.4390 |
| SUBTOTAL OF 6 |  |  |  |  |
| UNDERSPENT PROJECTS | S \$202,272.00 | \$159,795.52 | \$42,476.48 | 79.00\% |
| 10139 | \$114.533.00 | \$103.494.70 | (\$48.081.70) | $142.75 \%$ |
| 11208 | \$3,740.00 | \$11,367.00 | (57.817.00) | 303.68\% |
| 00301 | \$9,300.00 | \$15.429.00 | (56.129.00) | 185.90\% |
| 08170 | \$21.874.00 | \$28.042.78 | (54.068.78) | $118.52 \%$ |
| 09873 | \$19,975.00 | \$20.417.32 | (\$442.32) | 102.21\% |
| 04578 | \$0.00 | \$10,780.00 | ( $\$ 18,780.00$ ) | - |
| 00202 | \$0.00 | \$7.913.00 | (\$7,913.00) | - |
| 04323 | \$0.00 | \$1.082.62 | (\$1,082.82) |  |
| SUBTOTAL OF 8 |  |  |  |  |
| OVERSPENT PRONECTS | \$169,522.00 | \$262,516.42 | (\$92,994.42) | 154.86\% |
| TOTAL OF 100 |  |  |  |  |
| PROJECTS REVIEWED(1,2) | ,2) $\$ 371,794.00$ | \$422,311.94 | (\$50,517.94) | 113.59\% |

NOTES TO APPENDIX J:
1.) EIGHTY-FIVE OF THE RESEARCH PROJECTS DID NOT HAVE AMOUNTS BUDGETED

| OHG SAMPLE NUMBER | AMOUNTS BUDGETED BY NIH | UNIVERSTTY EXPENDTTURES | DIFFERENCE | PERCENT |
| :---: | :---: | :---: | :---: | :---: |
| 04678 | 50.000.00 | \$0.00 | 18,000.00 | 0.0646 |
| 08806 | \$4.988.00 | \$000.00 | \$4.382.00 | 12.03\% |
| 07064 | \$3,000.00 | \$1,116.00 | 11.886.00 | 37.17\% |
| 11079 | \$3.636.00 | \$1.000.00 | \$1,036.00 | 63.75\% |
| 08501 | \$2.500.00 | \$1.000.00 | \$834.00 | 66.64\% |
| 02777 | \$756.00 | \$0.00 | \$766.00 | 0.00\% |
| 05867 | \$850.00 | \$0.00 | \$850.00 | 0.009 |
| 06568 | \$336.00 | \$200.00 | \$136.00 | 59.52\% |
| SUBTOTAL OF 8 |  |  |  |  |
| UNDEFASPENT PROUECTS | S \$24.764.00 | \$5,481.00 | \$19,283.00 | 22.13\% |
| 00173 | \$1.080.00 | \$22,009.00 | (\$20,929.00) | 2037.87\% |
| 00157 | \$2.325.00 | \$5.715.00 | (\$3.300.00) | 245.81\% |
| 03630 | \$0.00 | \$11,408.00 | (\$11.408.00) |  |
| 08943 | \$0.00 | \$3,422.00 | (\$3.422.00) | - |
| 00441 | \$0.00 | \$2,025.00 | ( $\$ 2.425 .00$ ) | - |
| 05200 | \$0.00 | \$1,800.00 | (\$1.800.00) | - |
| 00023 | \$0.00 | \$1.087.00 | ( $\$ 1,067.00$ ) | - |
| 11450 | \$0.00 | \$450.00 | (\$450.00) | - |
| 08798 | \$0.00 | \$200.00. | (\$200.00) | - |
| 10971 | \$0.00 | \$130.00 | (\$130.00) | - |
| 06420 | \$0.00 | \$100.00 | (\$100.00) | - |
| SUBTOTAL OF 11 |  |  |  |  |
| OVERSPENT PROJECTS | \$3,405.00 | \$48,926.00 | $(\$ 45,521.00)$ | 1436.89\% |
| TOTAL OF 100 |  |  |  |  |
| PROJECTS REVIEWED(1) | \$28,169.00 | \$54,407.00 | $(\$ 26,238.00)$ | 193.14\% |

NOTE TO APPENDIX K:
1.) EIGHTY-ONE OF THE RESEARCH PROJECTS DID NOT HAVE AMOUNTS BUDGETED OR UNIVERSITY EXPENDITURES INCURRED FOR CONSULTANT COSTS.

## APPENDIX L

## JN 211993

## MEMORANDUM TQ

BRYAN B. MITCHELL Principal Deputy Inspecbor General

Kenneth S. Apfel
Assistant Secretary for Management and Bugget
OIG Draft Report on Neel for Improved Financial Reporting and Monitoring Related to National Institutes of Health Research Funds at Oniversities

Thank you for sharing your draft report on the need for improved financial reporting and monitoring on NIH grants. The lack of data on actual costs of research funded by NIH is a cause for concern. We concur with your recommendations which should improve NIH's ability to monitor the expenditures of its grantees.


$$
\begin{aligned}
& 0060 \\
& \text { SOLOEdSN! } 30 \text { 30154! }
\end{aligned}
$$

## A16 . 11993

MENORANDUA
From: $\quad$ Director

Subject: Office of Inspector General (OIG) Draft Report "Need for Improved Financial Reporting and Monitoring Related to National Institutes of Health Research Funds at Universities"

To:
Deputy Inspector General for Audit Services, OIG/OS

Attached are the Public Health Service (PHS) comments on the subject draft report. We agree with the report's finding that there is a need for improvements in the financial reporting and monitoring of grant funds. We concur with the recommendation directed to PHS and are in agreement with the recommendations directed to the Office of the Secretary. our comments delineate the steps we have taken or plan to take to address the finding and recommendations.

Attachment


# PUBLIC HEALTH SERVICE (PHS) CQMMENTS ON THE OFFICE OF INSPECTOR GENERAL (OIG) DRAFT REPORT "NEED FQR IMPROVED FINANCIAL REPORTING AND MONITQRING RELATED TQ NATIONAL INSTITUTES OF HEALTH (NIH) RESEARCH FUNDS AT UNIVERSITIES," A-06-91-00073 

## General Comments

We concur with the finding that improvements are needed in the financial reporting and monitoring of grant funds. We have long recognized that the lack of detailed financial expenditure data potentially hinders our efforts to properly monitor expenditures and improve the stewardship of Federal funds. In the absence of authority to receive detailed expenditure data, we continue to review estimated budgets and progress reports to ensure the adequate monitoring of grant funds.

Although we understand the OIG's concern that grant funds are (l) not always used during the budget period but are carried forward to the next period, and (2) not always spent as budgeted, one needs to recognize that PHS awards funds on a project period basis, which is the estimated total time for the research activity to be completed. While research projects can last 12-18 months, many typically have project periods of 3-5 years. These projects are incrementally funded on a budget period basis, typically lasting 12 months. in a sense, these budget periods are artificial segmentations of the project period established to reflect the Federal budgetary practice of providing funding through appropriations on an annual basis.

The authority to carryover and rebudget funds provides the flexibility for providing continued funding at the anticipated levels when project delays occur or when expenditures deviate from the established budget. To further illustrate the flexibility in the process, PHS specifically allows a research grantee to extend the final budget period of the project up to one year in order to complete the project. Therefore, while it is important to monitor the extent to which funds are carried forward or rebudgeted, these actions alone do not necessarily signify problems with the research project.

We believe that it would be counterproductive to take a highly restrictive approach which could encourage recipients to place undue emphasis on ensuring that all expenditures are made prior to the end of each budget period.

## OIG Recommendation

1. We recommend that the Department of Health and Human Services (HHS) expedite the pilot project [approved by the

Office of Management and Budget (OMB) in April 1992] for the electronic transfer of detailed expenditure data and continue to work with OMB for approval to gather detailed expenditure data on all research grants and contracts.

## PHS Comment

We agree with the objective of this recommendation. In keeping with the request to obtain categorical expenditure reports, PHS and the Office of the Assistant Secretary for Management and Budget (OASMB) proposed to OMB that authority be granted to conduct a pilot project for the electronic transfer of detailed expenditure data. This pilot project was to be conducted through institutions participating in the Federal Demonstration Project (FDP). Despite our efforts, these institutions have declined to participate in this pilot project.

Nonetheless, we are exploring with NIH and OASMB alternative approaches to the current financial reporting requirements and formats, including categorical expenditure reporting, possibly with selected FDP participants.

## OIG Recommendation

2. We recommend that HHS require grantees to submit a revised budget for the use of unspent grant funds when a substantial carry-over of funds from one budget year to another occurs.

## PHS Comment

We agree that it is appropriate to request revised budgets and/or additional documentation in certain instances when a substantial amount of carryover occurs. However, in some instances projects are delayed and the initial approved budget is still appropriate. In other instances a single item approved for purchase is delayed. As a consequence, we plan to leave to the Grants Management Officer's (GMO) discretion the decision of requiring a revised budget or additional documentation. We plan to add language to the PHS Grants Policy Statement to state that GMOs shall request revised budgets or additional information if it is necessary to understand the circumstances for the unobligated balance.

## OIG Recommendation

3. We recommend that PHS define "significant rebudgeting" as used in the PHS Grants Policy Statement, Chapter 8-5, section l.h.

## PHS Comment

We concur with this recommendation and agree that it would be helpful to provide additional guidance to grantees by defining the term "significant rebudgeting" to indicate the level which may begin to suggest a possible change in project scope. We intend to revise the PHS Grants Policy Statement to indicate that "significant rebudgeting" has occurred when the cumulative amount of transfers among direct cost categories for the current budget period exceeds 25 percent of the total amount awarded.

This would not mean that, once this threshold has been reached, a change in the scope of the research project has occurred. However, it provides the grantee with better guidance as to when the GMO should be contacted to discuss issues regarding change of scope.

