

# Value of Construction Put in Place: May 2002

*Annual*

Issued August 2002

C30/02-5

## Current Construction Reports



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Economics and Statistics Administration  
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## ACKNOWLEDGMENTS

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## CONTENTS

### INTRODUCTION

Description of Current Revisions . . . . .	1
Relationship of Value of Construction Put in Place to Structures in GDP . . . . .	1
Additional Data . . . . .	2

### CHARTS

Annual Value of Construction Put in Place: 1964-2001 . . . . .	4
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### TABLES

1. Annual Value of Construction Put in Place: 1997-2001 . . . . .	5
2. Annual Value of Public Construction Put in Place: 1997-2001 . . . . .	6

#### Value of Construction Put in Place

3a. Monthly—Not Seasonally Adjusted in Current Dollars: May 2000-May 2002 . . . . .	7
3b. Annual and Monthly—Not Seasonally Adjusted in Current Dollars: 1998-2001 . . . . .	9
4a. Monthly—Seasonally Adjusted Annual Rate in Current Dollars: May 2000-May 2002 . . . . .	13
4b. Monthly—Seasonally Adjusted Annual Rate in Current Dollars: 1998-2001 . . . . .	15
5a. Monthly—Seasonally Adjusted Annual Rate in 1996 Dollars: May 2000-May 2002 . . . . .	19
5b. Monthly—Seasonally Adjusted Annual Rate in 1996 Dollars: 1998-2001 . . . . .	21
6a. Monthly—Not Seasonally Adjusted in 1996 Dollars: May 2000-May 2002 . . . . .	25
6b. Annual and Monthly—Not Seasonally Adjusted in 1996 Dollars: 1998-2001 . . . . .	27

#### Value of Public Construction Put in Place

7a. Monthly—Not Seasonally Adjusted in Current Dollars: May 2000-May 2002 . . . . .	31
7b. Annual and Monthly—Not Seasonally Adjusted in Current Dollars: 1998-2001 . . . . .	32
8a. Monthly—Seasonally Adjusted Annual Rate in Current Dollars: May 2000-May 2002 . . . . .	36
8b. Monthly—Seasonally Adjusted Annual Rate in Current Dollars: 1998-2001 . . . . .	37
9a. Monthly—Seasonally Adjusted Annual Rate in 1996 Dollars: May 2000-May 2002 . . . . .	41
9b. Monthly—Seasonally Adjusted Annual Rate in 1996 Dollars: 1998-2001 . . . . .	42
10a. Monthly—Not Seasonally Adjusted in 1996 Dollars: May 2000-May 2002 . . . . .	46
10b. Annual and Monthly—Not Seasonally Adjusted in 1996 Dollars: 1998-2001 . . . . .	47

APPENDIXES

A.	Definitions . . . . .	A-1
B.	Data Sources, Assumptions, and Methods . . . . .	B-1
C.	Reliability of the Estimates . . . . .	C-1
D.	Adjustments for Seasonal Variations and Cost Changes . . . . .	D-1

# Introduction

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## **ANNUAL DATA BACK TO 1997 AND MONTHLY DATA BACK TO 1998 ARE SHOWN IN THIS REPORT**

Construction put in place during May 2002 was estimated at a seasonally adjusted annual rate of \$852.0 billion, 1 (±5) percent below the revised April estimate of \$858.2 billion. The May figure represents a 1 (± 5) percent increase over May 2001.

In constant (1996) dollars, the May annual rate was \$701.0 billion, 1 (±5) percent below the revised estimate of \$707.1 billion for April.

### **DESCRIPTION OF CURRENT REVISIONS**

In each May report, unadjusted value-in-place estimates are revised to incorporate additional data not previously available. Seasonally adjusted statistics are also revised using newly computed seasonal factors. The revised factors for January 1999-December 2001 were computed using data through April 2002. The revised factors for January-May 2002 were computed using data through May 2002. See Appendix D, Adjustments for Seasonal Variations and Cost Changes.

For comparison, Table A on page 3 shows the previously published and revised data for selected series back to 1998.

Annual statistics reflecting all revisions back to 1998 are shown in Tables 1 and 2. Monthly estimates for January 1998 through May 2002 are presented in Tables 3-10. Monthly and annual data back to 1964 are available upon request or on the Internet at [www.census.gov/const/www/c30index.html](http://www.census.gov/const/www/c30index.html).

### **RELATIONSHIP OF VALUE OF CONSTRUCTION PUT IN PLACE TO STRUCTURES IN GDP**

The estimates shown in this report differ from the estimates of structures components of the gross domestic product (GDP) as developed by the Bureau of Economic Analysis (BEA), because of differences in coverage, estimation procedures, classification, and the timing of revisions.

#### **Coverage Differences**

GDP estimates of the structures components of gross private domestic fixed investment exclude the imputed

interest amount of the allowances for funds used during construction of public utility plants; these amounts are included in the value-in-place estimates. In addition, GDP estimates include the following items not included in the value-in-place series:

1. Expenditures on new manufactured homes.
2. Expenditures for petroleum and natural gas well drilling and exploration.
3. Expenditures for construction of mine shafts and mining exploration.
4. Brokers' commissions on the sale of new and existing structures.
5. Net value of purchases of used structures from the public sector by the private sector.
6. Expenditures for federal government structures located outside the United States.

#### **Estimation Procedures Differences**

Effective with the October 1997 comprehensive revision of the national income and product accounts (NIPAs), the estimates of the structures components of the GDP for 1997 are estimated as follows:<sup>1</sup>

#### **Private Structures**

Estimates of residential structures are the value-in-place estimates.

Estimates of all components of nonresidential buildings, except industrial buildings, are prepared by BEA as an extrapolation of a 1992 benchmark Input-Output account estimates using the corresponding value-in-place estimates. Input-Output account estimates are prepared by BEA every five years. For structures, most Input-Output estimates are based on the value-in-place estimates adjusted for coverage differences. The estimate of industrial buildings is the value-in-place estimate.

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<sup>1</sup>For additional information, see the December 1999 *Survey of Current Business*, pages 21-22 and Tables 5.6 and 5.7.

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Estimates of public utility structures are the value-in-place estimates, adjusted by BEA to exclude remaining allowances for funds used during construction (imputed interest).

The estimate of all other private nonresidential structures is prepared by BEA as an extrapolation of a 1992 benchmark estimate using the corresponding value-in-place series.

### **Government Structures**

Estimates of state and local structures are the value-in-place estimates.

Estimates of all components of federal structures are the value-in-place estimates except housing and military facilities; these two estimates are prepared by BEA from Department of Defense data.

### **Residential Improvements**

In the quarterly estimate of the GDP, Consumer Expenditure Survey (CES) estimates of residential improvements are not usually available. Consequently, BEA projects estimates for the current quarter and normally replaces the projections with the CES estimates in the annual NIPA revision.

### **Classification Differences**

BEA classifies dormitories, fraternity and sorority houses, etc. as private residential structures. They are classified in the educational component of private nonresidential buildings in the value-in-place series.

BEA classifies federal government expenditures for military family housing in the defense purchases component of GDP. These expenditures are classified in the housing component of the value-in-place series. BEA separates atomic energy related construction and hospital construction into the defense and nondefense components; they are not separated in the value-in-place series.

BEA classifies federal government expenditures on structures by the Coast Guard in the nondefense purchases component of GDP. These expenditures are classified in the military facilities component of the value-in-place series.

### **Timing of Revisions**

Because of differences in the timing of revisions, not all revisions to the value-in-place estimates have been incorporated in the NIPAs.

### **ADDITIONAL DATA**

Additional data related to the value of construction put in place can be found in the following publications:

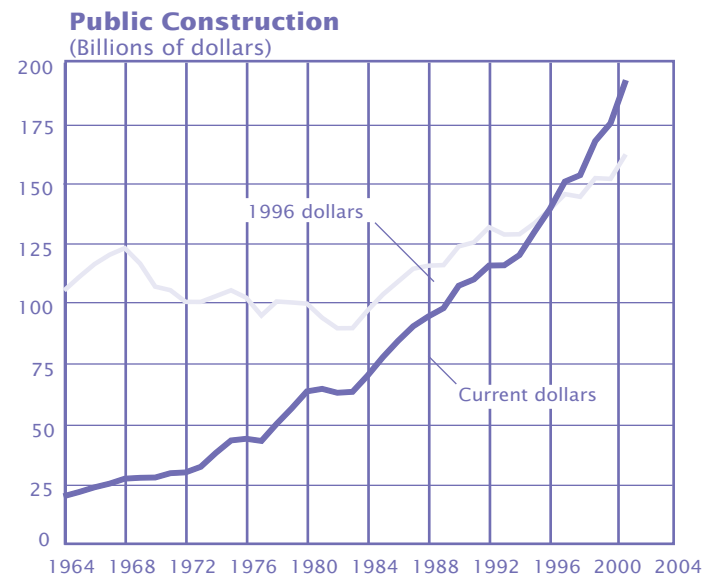
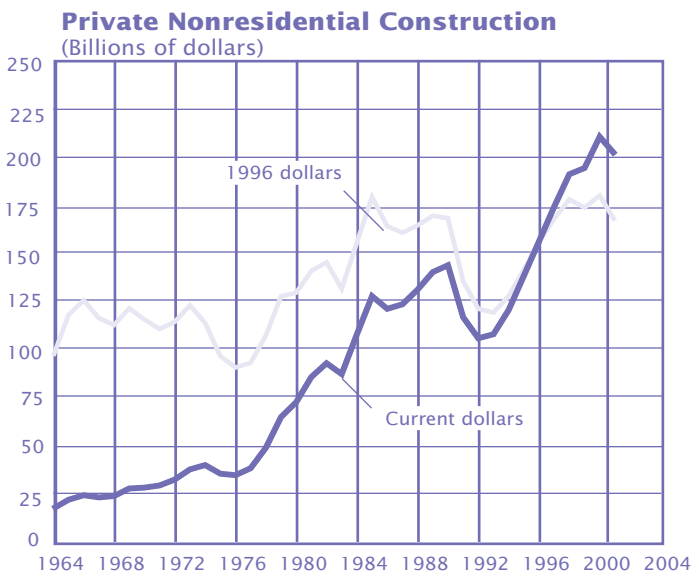
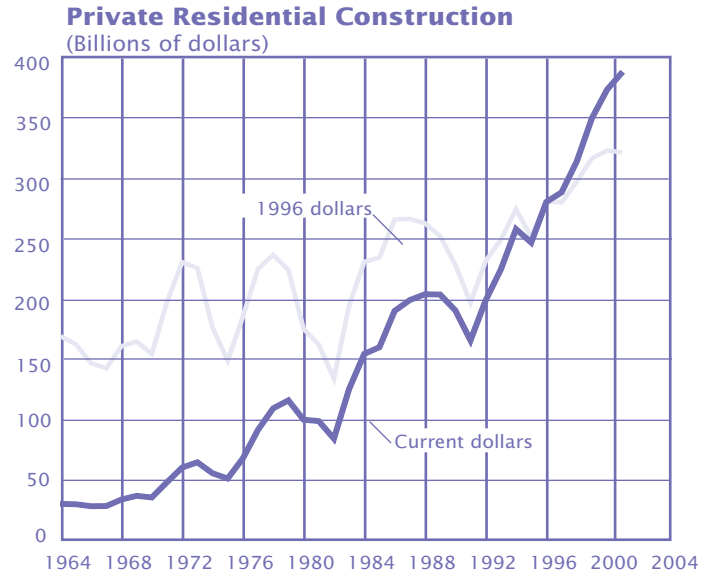
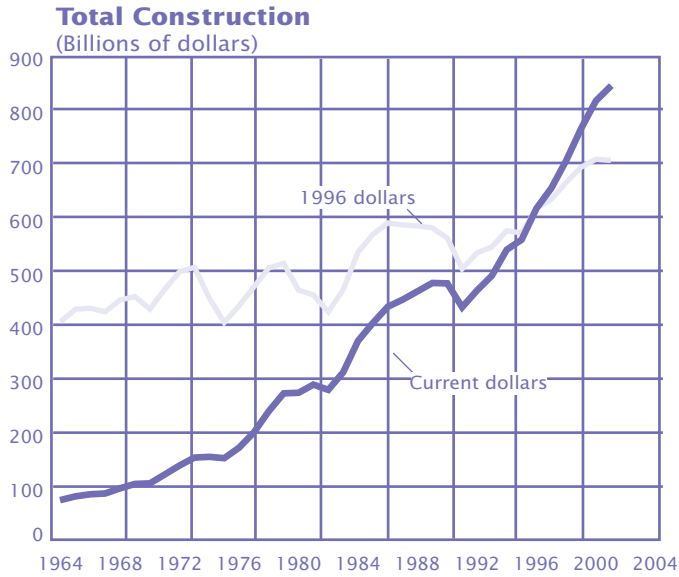
- Current Construction Reports, *Value of Construction Put in Place: June 2001*, C30/01-6, U.S. Department of Commerce, U.S. Census Bureau, Washington, DC, 2001; contains annual value of construction put in place for private nonresidential buildings by geographic area and detailed types of construction for 1993 to 2000.
- Current Construction Reports, *Value of New Construction Put in Place: October 1992*, C30/92-10, U.S. Department of Commerce, U.S. Census Bureau, Washington, DC, 1992; contains total time and monthly progress from start to completion for private nonresidential buildings and for state and local construction.
- Current Construction Reports, *Value of New Construction Put in Place in the United States, 1964 to 1980*, C30-80 supplement, U.S. Department of Commerce, U.S. Census Bureau, Washington, DC, 1981; contains annual data for 1915 to 1963.
- Current Construction Reports Special Study, *Expenditures for Nonresidential Improvements and Repairs: 1992*, U.S. Department of Commerce, U.S. Census Bureau, Washington, DC, 1994.



Table A. **Comparison of Previously Published Data with Revised Data for Selected Construction Categories, 1998-2001**

Year	Total construction		Total private construction		Total residential construction		Total nonresidential buildings		Total public construction		Total state and local construction		Total federal construction	
	Previous published	Revised	Previous published	Revised	Previous published	Revised	Previous published	Revised	Previous published	Revised	Previous published	Revised	Previous published	Revised
1998 .....	704,724	705,685	551,383	551,383	314,607	314,607	190,710	190,710	153,341	154,302	139,023	139,984	14,318	14,318
1999 .....	763,786	765,876	596,280	596,331	350,562	350,562	193,935	193,935	167,507	169,545	153,505	155,519	14,002	14,025
2000 .....	815,414	820,345	640,554	641,783	374,274	374,457	210,140	208,241	174,860	178,561	161,053	164,396	13,807	14,165
2001 .....	861,181	842,539	666,519	650,030	395,716	388,705	208,699	201,094	194,662	192,509	180,308	177,527	14,354	14,981

## Annual Value of Construction Put in Place: 1964-2001



Source: U.S. Census Bureau, Value of Construction Put in Place.

**Table 1. Annual Value of Construction Put in Place: 1997-2001**

[Millions of dollars]

Type of construction	Current dollars					Constant (1996) dollars				
	1997	'1998	'1999	'2000	'2001	1997	'1998	'1999	'2000	'2001
<b>Total construction</b> .....	<b>653,429</b>	<b>705,685</b>	<b>765,876</b>	<b>820,345</b>	<b>842,539</b>	<b>632,680</b>	<b>665,156</b>	<b>694,123</b>	<b>711,328</b>	<b>704,747</b>
<b>Private construction</b> .....	<b>502,734</b>	<b>551,383</b>	<b>596,331</b>	<b>641,783</b>	<b>650,030</b>	<b>487,197</b>	<b>519,859</b>	<b>540,220</b>	<b>556,426</b>	<b>542,782</b>
Residential buildings .....	289,014	314,607	350,562	374,457	388,705	280,720	297,960	317,236	323,977	322,305
New housing units .....	198,063	223,983	251,272	265,047	279,772	192,386	212,068	227,467	229,324	232,008
1 unit .....	175,179	199,409	223,837	236,788	249,086	170,154	188,785	202,620	204,867	206,557
2 units or more .....	22,883	24,574	27,434	28,259	30,686	22,232	23,283	24,848	24,457	25,451
Improvements .....	90,951	90,624	99,290	109,410	108,933	88,334	85,892	89,769	94,653	90,297
Nonresidential buildings .....	173,875	190,710	193,935	208,241	201,094	167,610	177,644	173,429	178,074	166,587
Industrial .....	37,624	40,484	32,639	31,801	29,046	36,267	37,720	29,206	27,194	24,072
Office .....	34,305	42,226	47,582	55,605	52,020	33,058	39,333	42,552	47,534	43,112
Hotels, motels .....	12,898	14,816	15,951	16,293	14,421	12,438	13,794	14,274	13,944	11,948
Other commercial .....	51,809	53,598	56,915	60,381	60,297	49,948	49,915	50,870	51,635	49,933
Religious .....	5,777	6,594	7,371	8,019	8,310	5,565	6,139	6,590	6,858	6,880
Educational .....	8,693	9,698	9,645	11,375	12,629	8,375	9,039	8,621	9,726	10,454
Hospital and institutional .....	13,546	13,793	13,530	14,434	15,114	13,066	12,853	12,102	12,342	12,518
Miscellaneous <sup>1</sup> .....	9,223	9,501	10,301	10,332	9,259	8,892	8,850	9,214	8,841	7,670
Farm nonresidential .....	3,815	4,284	5,059	5,988	6,134	3,675	3,989	4,519	5,115	5,076
Public utilities .....	33,638	39,212	44,066	50,144	51,114	32,883	37,818	42,534	46,641	46,230
Telecommunications .....	12,416	12,458	18,404	18,799	18,538	12,159	12,188	18,305	18,272	17,440
Other public utilities .....	21,222	26,754	25,662	31,345	32,576	20,725	25,631	24,229	28,370	28,789
Railroads .....	4,922	5,736	4,670	4,263	4,149	4,745	5,463	4,311	3,781	3,595
Electric light and power .....	11,325	12,381	14,585	21,149	22,515	11,122	11,883	13,892	19,280	19,990
Gas .....	4,006	7,372	4,918	4,930	4,969	3,911	7,072	4,625	4,411	4,374
Petroleum pipelines .....	969	1,265	1,489	1,003	943	947	1,213	1,401	897	830
All other private <sup>2</sup> .....	2,392	2,570	2,709	2,954	2,983	2,309	2,447	2,501	2,619	2,584
<b>Public construction</b> .....	<b>150,695</b>	<b>154,302</b>	<b>169,545</b>	<b>178,561</b>	<b>192,509</b>	<b>145,483</b>	<b>145,297</b>	<b>153,904</b>	<b>154,902</b>	<b>161,965</b>
Buildings .....	69,860	72,418	80,418	88,566	96,967	67,400	67,517	71,928	75,772	80,280
Housing and redevelopment ..	5,299	5,187	4,653	4,308	4,751	5,150	4,913	4,218	3,726	3,940
Industrial .....	999	1,010	925	1,157	1,556	965	941	827	990	1,288
Educational .....	33,552	35,001	42,427	49,814	55,752	32,340	32,589	37,904	42,588	46,148
Hospital .....	4,977	3,923	4,026	4,135	4,053	4,802	3,656	3,600	3,538	3,355
Other <sup>3</sup> .....	25,033	27,297	28,387	29,151	30,855	24,144	25,418	25,378	24,930	25,549
Highways and streets .....	42,602	44,676	48,851	49,262	54,026	41,093	42,249	44,559	42,764	45,415
Military facilities .....	2,556	2,530	2,125	2,441	2,843	2,466	2,377	1,922	2,105	2,372
Conservation and development ..	5,625	5,466	6,088	6,063	7,122	5,431	5,237	5,682	5,494	6,371
Sewer systems .....	10,515	9,943	9,864	8,807	8,751	10,152	9,526	9,214	7,982	7,828
Water supply facilities .....	6,493	6,678	6,541	5,993	7,152	6,347	6,405	6,147	5,327	6,138
Miscellaneous public <sup>4</sup> .....	13,045	12,591	15,658	17,429	15,648	12,594	11,985	14,453	15,459	13,561

<sup>1</sup>Revised.

<sup>1</sup>Includes amusement and recreational buildings, bus and airline terminals, animal hospitals and shelters, etc.

<sup>2</sup>Includes privately owned streets and bridges, parking areas, sewer and water facilities, parks and playgrounds, golf courses, airfields, etc.

<sup>3</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, civic centers, passenger terminals, space facilities, postal facilities, etc.

<sup>4</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc.

**Table 2. Annual Value of Public Construction Put in Place: 1997-2001**

[Millions of dollars]

Type of construction	Current dollars					Constant (1996) dollars				
	1997	'1998	'1999	'2000	'2001	1997	'1998	'1999	'2000	'2001
<b>Total public construction . . . .</b>	<b>150,695</b>	<b>154,302</b>	<b>169,545</b>	<b>178,561</b>	<b>192,509</b>	<b>145,483</b>	<b>145,297</b>	<b>153,904</b>	<b>154,902</b>	<b>161,965</b>
<b>State and local construction . . . . .</b>	<b>136,608</b>	<b>139,984</b>	<b>155,519</b>	<b>164,396</b>	<b>177,527</b>	<b>131,891</b>	<b>131,792</b>	<b>141,107</b>	<b>142,484</b>	<b>149,147</b>
Total buildings . . . . .	63,752	66,392	74,948	83,408	91,852	61,508	61,894	67,031	71,356	76,044
Housing and redevelopment . . . . .	4,622	4,649	4,229	3,926	4,330	4,492	4,403	3,834	3,395	3,591
Educational . . . . .	33,533	34,986	42,411	49,785	55,718	32,322	32,575	37,890	42,563	46,119
Hospital . . . . .	3,725	2,914	3,175	3,413	3,389	3,596	2,715	2,838	2,920	2,805
Other <sup>1</sup> . . . . .	21,872	23,844	25,133	26,284	28,415	21,099	22,200	22,469	22,478	23,528
Highways and streets . . . . .	42,347	44,419	48,600	48,925	53,743	40,847	42,006	44,330	42,471	45,177
Conservation and development . . . . .	2,256	1,930	2,053	2,003	2,427	2,178	1,849	1,916	1,815	2,172
Sewer systems . . . . .	10,515	9,943	9,864	8,807	8,751	10,152	9,526	9,214	7,982	7,828
Water supply facilities . . . . .	6,493	6,678	6,541	5,993	7,152	6,347	6,405	6,147	5,327	6,138
Miscellaneous nonbuilding <sup>2</sup> . . . . .	11,245	10,622	13,513	15,260	13,602	10,859	10,112	12,469	13,534	11,788
<b>Federal construction . . . . .</b>	<b>14,087</b>	<b>14,318</b>	<b>14,025</b>	<b>14,165</b>	<b>14,981</b>	<b>13,592</b>	<b>13,505</b>	<b>12,796</b>	<b>12,418</b>	<b>12,818</b>
Total buildings . . . . .	6,107	6,026	5,469	5,158	5,115	5,892	5,624	4,896	4,416	4,236
Housing . . . . .	677	538	424	382	421	658	510	384	331	349
Industrial . . . . .	999	1,010	925	1,157	1,556	965	941	827	990	1,288
Educational . . . . .	19	15	15	29	35	19	14	14	25	29
Hospital . . . . .	1,251	1,009	850	722	664	1,206	941	762	618	550
Other <sup>3</sup> . . . . .	3,161	3,454	3,255	2,867	2,440	3,045	3,217	2,909	2,452	2,021
Highways and streets . . . . .	255	257	251	337	283	246	243	229	292	238
Military facilities . . . . .	2,556	2,530	2,125	2,441	2,843	2,466	2,377	1,922	2,105	2,372
Conservation and development . . . . .	3,368	3,536	4,035	4,061	4,695	3,252	3,387	3,766	3,679	4,200
Miscellaneous public <sup>4</sup> . . . . .	1,800	1,969	2,145	2,169	2,046	1,735	1,873	1,983	1,925	1,773

<sup>1</sup>Revised.

<sup>1</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, passenger terminals, civic centers, etc.

<sup>2</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc.

<sup>3</sup>Includes federal office buildings, prisons, courthouses, space facilities, postal facilities, etc.

<sup>4</sup>Includes federal airport facilities, fish and wildlife preservation facilities, VA cemeteries, etc.

Table 3a. Monthly Value of Construction Put in Place: May 2000-May 2002—Not Seasonally Adjusted in Current Dollars

[Millions of dollars]

Period	Total construction	Private construction															All other private <sup>5</sup>		
		Total <sup>1</sup>	Residential buildings					Nonresidential buildings										Public utilities <sup>4</sup>	
			Total <sup>2</sup>	New housing units			Total	Industrial	Office	Hotels, motels	Other commercial	Religious	Educational	Hospital and institutional	Miscellaneous <sup>3</sup>	Total		Telecommunications	
				Total	1 unit	2 units or more													
<b>YEAR TO DATE</b>																			
May 2001	316,957	248,319	143,096	104,861	92,811	12,050	83,734	12,630	23,208	6,099	23,786	3,195	4,640	6,264	3,912	(NA)	7,499	1,009	
May 2002	320,756	247,742	153,546	111,598	97,569	14,029	70,714	7,283	16,599	4,765	23,230	3,346	5,395	6,592	3,504	(NA)	(NA)	1,153	
Percent change	1	(Z)	7	6	5	16	-16	-42	-28	-22	-2	5	16	5	-10	(NA)	(NA)	14	
<b>MONTHLY DATA</b>																			
2000: May <sup>f</sup>	71,014	56,115	33,472	23,250	20,743	2,507	17,806	2,791	4,822	1,421	5,027	636	1,012	1,181	919	(NA)	1,527	215	
June <sup>f</sup>	74,214	58,220	35,145	24,111	21,552	2,559	18,098	2,859	4,689	1,441	5,287	691	1,037	1,204	890	(NA)	1,683	234	
July <sup>f</sup>	73,468	57,499	34,347	24,199	21,882	2,317	17,934	2,740	4,650	1,387	5,274	717	1,096	1,208	863	(NA)	1,403	246	
August <sup>f</sup>	77,601	59,180	34,773	24,286	21,903	2,384	18,892	2,820	4,970	1,376	5,609	734	1,207	1,260	916	(NA)	1,583	308	
September <sup>f</sup>	76,882	58,419	34,049	23,806	21,491	2,315	18,744	2,793	5,151	1,329	5,628	710	993	1,271	870	(NA)	1,891	307	
October <sup>f</sup>	75,163	58,297	33,981	23,335	20,961	2,374	18,770	2,842	5,076	1,330	5,613	761	990	1,299	859	(NA)	1,655	310	
November <sup>f</sup>	70,689	55,671	32,004	22,684	20,286	2,398	18,138	2,791	5,111	1,310	5,121	696	961	1,307	843	(NA)	1,764	288	
December <sup>f</sup>	62,052	49,021	26,484	19,681	17,385	2,296	16,933	2,633	4,879	1,214	4,686	623	877	1,276	745	(NA)	2,040	257	
2001: January <sup>f</sup>	57,605	45,545	25,535	18,736	16,512	2,223	16,219	2,600	4,670	1,206	4,328	608	874	1,225	708	(NA)	1,392	199	
February <sup>f</sup>	55,427	43,641	24,034	18,253	15,992	2,262	15,933	2,361	4,453	1,218	4,523	604	848	1,191	736	(NA)	1,311	200	
March <sup>f</sup>	63,253	50,136	28,735	21,316	18,909	2,407	17,223	2,659	4,871	1,228	4,787	637	921	1,285	836	(NA)	1,432	192	
April <sup>f</sup>	67,269	52,384	30,741	22,423	19,960	2,463	17,149	2,564	4,632	1,213	5,033	665	966	1,263	814	(NA)	1,527	200	
May <sup>f</sup>	73,402	56,612	34,051	24,133	21,437	2,696	17,210	2,446	4,582	1,235	5,116	682	1,031	1,301	818	(NA)	1,837	218	
June <sup>f</sup>	77,893	59,744	36,315	25,391	22,686	2,704	17,906	2,676	4,684	1,276	5,273	702	1,149	1,299	847	(NA)	1,596	246	
July <sup>f</sup>	78,176	59,659	36,265	26,138	23,511	2,627	17,597	2,601	4,369	1,286	5,443	734	1,146	1,239	780	(NA)	1,503	294	
August <sup>f</sup>	80,180	60,679	37,213	26,528	23,797	2,731	17,433	2,530	4,179	1,249	5,464	775	1,227	1,245	766	(NA)	1,697	310	
September <sup>f</sup>	77,939	59,252	36,844	25,978	23,380	2,598	16,972	2,527	4,010	1,193	5,393	751	1,146	1,253	698	(NA)	1,474	306	
October <sup>f</sup>	77,060	58,967	36,544	25,475	22,793	2,682	16,883	2,214	4,173	1,159	5,354	752	1,148	1,311	772	(NA)	1,639	283	
November <sup>f</sup>	71,783	55,295	34,215	24,456	21,761	2,694	15,846	1,924	3,889	1,120	5,058	738	1,114	1,247	758	(NA)	1,578	265	
December <sup>f</sup>	62,551	48,115	28,214	20,946	18,347	2,598	14,723	1,944	3,508	1,040	4,526	662	1,060	1,256	727	(NA)	1,553	270	
2002: January <sup>f</sup>	58,703	45,304	27,355	19,821	17,148	2,674	13,810	1,568	3,437	969	4,312	656	1,003	1,194	671	(NA)	1,190	208	
February <sup>f</sup>	57,051	43,613	25,681	19,279	16,768	2,511	13,636	1,439	3,216	954	4,395	643	1,022	1,275	692	(NA)	1,208	220	
March <sup>f</sup>	63,375	49,765	30,951	22,771	20,088	2,683	14,038	1,454	3,318	919	4,644	661	1,051	1,323	668	(NA)	1,274	234	
April <sup>f</sup>	68,134	52,848	33,286	24,093	21,099	2,994	14,621	1,422	3,371	981	4,892	692	1,164	1,375	725	(NA)	1,297	247	
May <sup>p</sup>	73,493	56,212	36,274	25,634	22,467	3,167	14,611	1,401	3,256	942	4,987	695	1,156	1,427	747	(NA)	(NA)	245	
<b>PERCENT CHANGE</b>																			
April 2002-May 2002	8	6	9	6	6	6	(Z)	-1	-3	-4	2	(Z)	-1	4	3	(NA)	(NA)	-1	

See footnotes at end of table.

∞ Table 3a. **Monthly Value of Construction Put in Place: May 2000-May 2002—Not Seasonally Adjusted in Current Dollars—Con.**

[Millions of dollars]

Period	Public construction												
	Total	Buildings						Highways and streets	Military facilities	Conservation and development	Sewer systems	Water supply facilities	Miscellaneous public <sup>7</sup>
		Total	Housing and redevelopment	Industrial	Educational	Hospital	Other public buildings <sup>6</sup>						
<b>YEAR TO DATE</b>													
May 2001	68,638	35,727	1,894	579	19,565	1,534	12,156	16,997	1,114	2,756	3,338	2,593	6,112
May 2002	73,014	40,067	2,053	778	22,886	2,058	12,293	16,653	1,044	3,117	3,561	2,662	5,910
Percent change	6	12	8	34	17	34	1	-2	-6	13	7	3	-3
<b>MONTHLY DATA</b>													
2000: May <sup>f</sup>	14,898	7,261	356	89	4,012	371	2,433	4,229	200	448	764	526	1,469
June <sup>f</sup>	15,994	7,948	376	97	4,620	371	2,485	4,583	197	510	844	486	1,426
July <sup>f</sup>	15,969	7,937	354	98	4,755	350	2,380	4,788	188	436	749	469	1,401
August <sup>f</sup>	18,421	8,634	384	109	5,198	356	2,586	6,091	211	525	808	567	1,586
September <sup>f</sup>	18,463	8,371	402	125	4,793	399	2,651	5,859	271	789	793	568	1,813
October <sup>f</sup>	16,866	8,004	418	75	4,407	344	2,761	4,989	146	479	805	597	1,844
November <sup>f</sup>	15,018	7,343	402	93	3,986	357	2,505	4,015	280	484	745	542	1,609
December <sup>f</sup>	13,031	7,068	375	99	3,971	290	2,332	2,913	210	500	620	471	1,249
2001: January <sup>f</sup>	12,060	6,650	375	123	3,623	302	2,227	2,431	216	529	608	426	1,200
February <sup>f</sup>	11,786	6,484	350	102	3,518	289	2,225	2,387	195	537	595	458	1,130
March <sup>f</sup>	13,118	6,938	362	114	3,776	294	2,392	3,089	214	578	648	509	1,141
April <sup>f</sup>	14,885	7,628	389	133	4,181	310	2,615	3,943	258	505	723	597	1,232
May <sup>f</sup>	16,790	8,028	417	108	4,468	338	2,696	5,146	232	607	764	603	1,410
June <sup>f</sup>	18,149	8,567	412	125	4,917	375	2,737	5,918	258	567	792	661	1,387
July <sup>f</sup>	18,518	9,069	367	125	5,670	345	2,562	5,946	239	540	751	654	1,319
August <sup>f</sup>	19,501	9,539	374	125	6,045	356	2,639	6,154	269	665	822	661	1,391
September <sup>f</sup>	18,687	9,144	403	211	5,418	383	2,728	5,466	303	901	777	693	1,403
October <sup>f</sup>	18,093	8,884	444	77	5,205	356	2,802	5,634	196	517	811	657	1,394
November <sup>f</sup>	16,488	8,228	427	115	4,629	350	2,707	4,601	245	607	803	649	1,355
December <sup>f</sup>	14,436	7,809	429	198	4,304	353	2,525	3,310	220	570	659	583	1,286
2002: January <sup>f</sup>	13,399	7,523	375	112	4,228	421	2,386	2,978	188	577	656	491	986
February <sup>f</sup>	13,439	7,646	378	174	4,311	383	2,402	2,767	183	613	661	494	1,074
March <sup>f</sup>	13,610	7,632	377	154	4,287	393	2,421	2,761	222	665	691	503	1,136
April <sup>f</sup>	15,286	8,302	444	171	4,774	421	2,493	3,550	214	629	745	565	1,281
May <sup>p</sup>	17,281	8,963	479	167	5,286	441	2,591	4,597	237	634	808	609	1,433
<b>PERCENT CHANGE</b>													
April 2002-May 2002	13	8	8	-2	11	5	4	29	11	1	8	8	12

NA Not available, but estimates are included in totals. <sup>p</sup>Preliminary. <sup>r</sup>Revised. Z Less than 0.5 percent.

<sup>1</sup>Includes farm nonresidential and other private categories, not shown separately. <sup>2</sup>Includes residential improvements, not shown separately. <sup>3</sup>Includes amusement and recreational buildings, bus and airline terminals, animal hospitals and shelters, etc. <sup>4</sup>Includes gas, electric, railroad, and petroleum pipelines, not shown separately. <sup>5</sup>Includes privately owned streets and bridges, parking areas, sewer and water facilities, parks and playgrounds, golf courses, airfields, etc. <sup>6</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, civic centers, passenger terminals, space facilities, postal facilities, etc. <sup>7</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc.

Table 3b. Annual and Monthly Value of Construction Put in Place: 1998-2001—Not Seasonally Adjusted in Current Dollars

[Millions of dollars]

Type of construction	1998												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> . . . . .	705,685	46,015	44,147	50,605	55,163	59,215	65,693	66,371	67,997	68,093	65,764	61,819	54,805
<b>Private construction</b> . . . . .	551,383	36,829	35,114	40,732	43,903	47,123	51,097	51,059	52,033	51,568	50,629	48,412	42,884
Residential buildings . . . . .	314,607	20,688	18,914	23,063	24,792	27,499	29,291	29,924	30,076	29,938	29,351	27,868	23,205
New housing units . . . . .	223,983	14,230	13,693	16,295	17,440	18,410	19,867	21,069	21,394	21,517	21,329	20,741	17,999
1 unit . . . . .	199,409	12,383	11,835	14,322	15,383	16,358	17,763	18,904	19,320	19,373	19,113	18,645	16,012
2 units or more . . . . .	24,574	1,847	1,858	1,973	2,057	2,051	2,104	2,166	2,074	2,144	2,217	2,096	1,987
Improvements . . . . .	90,624	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings . . . . .	190,710	13,540	13,622	14,659	15,559	15,676	16,850	16,419	17,005	17,016	17,271	16,864	16,230
Industrial . . . . .	40,484	2,960	3,000	3,363	3,349	3,345	3,506	3,340	3,640	3,614	3,583	3,417	3,367
Office . . . . .	42,226	3,127	3,087	3,185	3,431	3,549	3,762	3,533	3,483	3,598	3,835	3,865	3,772
Hotels, motels . . . . .	14,816	999	989	1,065	1,158	1,099	1,321	1,285	1,360	1,409	1,436	1,349	1,347
Other commercial . . . . .	53,598	3,586	3,599	3,973	4,236	4,402	4,833	4,894	4,960	4,903	4,993	4,823	4,397
Religious . . . . .	6,594	483	489	486	495	464	526	541	604	614	640	644	607
Educational . . . . .	9,698	684	730	786	850	891	909	854	895	851	744	759	745
Hospital and institutional . . . . .	13,793	1,044	1,064	1,119	1,196	1,157	1,168	1,138	1,194	1,197	1,165	1,174	1,177
Miscellaneous <sup>1</sup> . . . . .	9,501	656	664	683	845	768	825	834	869	831	876	834	818
Farm nonresidential . . . . .	4,284	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities . . . . .	39,212	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications . . . . .	12,458	809	892	1,110	1,005	1,032	1,100	1,058	1,049	1,082	1,192	1,046	1,084
Railroads . . . . .	5,736	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power . . . . .	12,381	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas . . . . .	7,372	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines . . . . .	1,265	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> . . . . .	2,570	187	173	187	185	204	259	217	247	236	234	239	204
<b>Public construction</b> . . . . .	154,302	9,186	9,032	9,873	11,259	12,092	14,596	15,312	15,963	16,525	15,135	13,407	11,921
Buildings . . . . .	72,418	4,882	4,841	5,077	5,497	5,725	6,623	7,033	7,063	7,034	6,505	6,160	5,978
Housing and redevelopment . . . . .	5,187	361	356	386	414	406	474	526	448	470	461	457	430
Industrial . . . . .	1,010	76	79	95	84	81	78	93	88	108	58	91	79
Educational . . . . .	35,001	2,299	2,249	2,292	2,588	2,742	3,367	3,629	3,682	3,411	3,069	2,839	2,835
Hospital . . . . .	3,923	312	291	359	290	330	334	322	313	401	351	312	308
Other <sup>3</sup> . . . . .	27,297	1,836	1,866	1,944	2,122	2,165	2,371	2,462	2,532	2,644	2,566	2,462	2,326
Highways and streets . . . . .	44,676	1,923	1,889	2,297	3,084	3,529	4,628	4,776	5,340	5,378	5,217	3,810	2,805
Military facilities . . . . .	2,530	188	187	237	204	199	225	279	241	225	157	189	198
Conservation and development . . . . .	5,466	335	411	403	380	416	495	477	500	771	380	468	430
Other public construction . . . . .	29,212	1,858	1,704	1,860	2,094	2,224	2,624	2,747	2,819	3,117	2,876	2,780	2,509
Sewer systems . . . . .	9,943	637	599	675	712	748	869	921	947	1,000	1,018	973	843
Water supply facilities . . . . .	6,678	418	421	426	499	535	531	592	604	664	722	662	604
Miscellaneous public <sup>4</sup> . . . . .	12,591	804	683	758	883	940	1,224	1,234	1,269	1,453	1,136	1,145	1,062

See footnotes at end of table.

Table 3b. **Annual and Monthly Value of Construction Put in Place: 1998-2001—Not Seasonally Adjusted in Current Dollars—Con.**

[Millions of dollars]

Type of construction	1999												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	765,876	50,219	49,740	56,797	59,656	63,950	69,112	70,897	72,549	72,632	70,854	68,579	60,891
<b>Private construction</b> .....	596,331	39,828	39,024	45,071	46,575	50,048	53,604	54,863	55,364	55,433	55,013	53,803	47,705
Residential buildings .....	350,562	22,135	20,573	25,218	26,756	30,021	32,110	32,882	33,754	33,907	33,756	32,343	27,107
New housing units .....	251,272	16,763	16,084	19,215	20,090	21,288	22,478	23,208	23,545	23,362	22,959	22,476	19,804
1 unit .....	223,837	14,806	14,063	16,989	17,815	18,948	20,069	20,820	21,068	20,938	20,582	20,186	17,553
2 units or more .....	27,434	1,956	2,022	2,226	2,274	2,340	2,409	2,388	2,477	2,424	2,376	2,290	2,251
Improvements .....	99,290	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	193,935	14,557	14,994	15,781	15,990	16,329	16,705	16,708	16,916	17,027	16,689	16,589	15,651
Industrial .....	32,639	2,802	2,716	2,828	2,711	2,672	2,851	2,816	2,767	2,739	2,597	2,547	2,594
Office .....	47,582	3,596	3,754	3,844	3,875	4,015	4,050	3,964	4,169	4,325	4,184	4,015	3,792
Hotels, motels .....	15,951	1,304	1,410	1,432	1,383	1,354	1,296	1,346	1,277	1,266	1,251	1,326	1,308
Other commercial .....	56,915	3,829	3,986	4,357	4,536	4,841	4,979	5,071	5,127	5,199	5,143	5,225	4,624
Religious .....	7,371	571	555	574	600	599	628	628	669	638	680	641	587
Educational .....	9,645	614	647	723	827	798	946	955	930	828	800	803	776
Hospital and institutional .....	13,530	1,056	1,108	1,137	1,145	1,149	1,109	1,083	1,137	1,164	1,180	1,163	1,100
Miscellaneous <sup>1</sup> .....	10,301	786	819	886	914	901	847	846	840	867	856	869	871
Farm nonresidential .....	5,059	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	44,066	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	18,404	880	994	1,461	1,479	1,294	1,472	1,638	1,747	1,694	1,818	1,934	1,994
Railroads .....	4,670	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	14,585	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	4,918	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	1,489	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,709	168	167	209	245	239	243	251	239	232	226	237	254
<b>Public construction</b> .....	169,545	10,391	10,716	11,726	13,081	13,902	15,509	16,034	17,185	17,199	15,841	14,776	13,186
Buildings .....	80,418	5,453	5,587	5,952	6,322	6,403	7,199	7,410	7,882	7,681	7,195	6,871	6,464
Housing and redevelopment .....	4,653	377	361	411	422	442	391	381	396	414	377	341	340
Industrial .....	925	64	69	85	76	83	73	89	70	112	45	72	88
Educational .....	42,427	2,673	2,671	2,833	3,196	3,289	4,020	4,194	4,565	4,201	3,872	3,603	3,310
Hospital .....	4,026	306	359	318	293	326	353	348	328	377	345	340	333
Other <sup>3</sup> .....	28,387	2,033	2,127	2,305	2,335	2,264	2,361	2,397	2,524	2,579	2,556	2,514	2,393
Highways and streets .....	48,851	2,186	2,321	2,748	3,502	4,145	4,754	5,045	5,533	5,623	5,088	4,404	3,503
Military facilities .....	2,125	147	175	188	179	179	186	195	142	207	150	171	208
Conservation and development .....	6,088	396	433	468	452	421	504	495	597	779	422	564	557
Other public construction .....	32,063	2,209	2,202	2,370	2,626	2,754	2,866	2,889	3,032	2,908	2,986	2,766	2,454
Sewer systems .....	9,864	747	692	807	814	866	918	880	887	864	860	797	733
Water supply facilities .....	6,541	485	512	541	556	575	584	624	602	569	555	510	431
Miscellaneous public <sup>4</sup> .....	15,658	977	998	1,023	1,257	1,314	1,364	1,384	1,543	1,476	1,572	1,460	1,290

See footnotes at end of table.



Table 3b. **Annual and Monthly Value of Construction Put in Place: 1998-2001—Not Seasonally Adjusted in Current Dollars—Con.**

[Millions of dollars]

Type of construction	2000												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	820,345	55,583	55,032	63,046	65,603	71,014	74,214	73,468	77,601	76,882	75,163	70,689	62,052
<b>Private construction</b> .....	641,783	43,924	43,621	50,084	51,733	56,115	58,220	57,499	59,180	58,419	58,297	55,671	49,021
Residential buildings .....	374,457	26,074	24,162	29,183	30,783	33,472	35,145	34,347	34,773	34,049	33,981	32,004	26,484
New housing units .....	265,047	18,625	17,867	21,167	22,036	23,250	24,111	24,199	24,286	23,806	23,335	22,684	19,681
1 unit .....	236,788	16,492	15,758	18,750	19,585	20,743	21,552	21,882	21,903	21,491	20,961	20,286	17,385
2 units or more .....	28,259	2,133	2,109	2,417	2,451	2,507	2,559	2,317	2,384	2,315	2,374	2,398	2,296
Improvements .....	109,410	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	208,241	14,405	15,526	16,359	16,634	17,806	18,098	17,934	18,892	18,744	18,770	18,138	16,933
Industrial .....	31,801	2,154	2,338	2,498	2,543	2,791	2,859	2,740	2,820	2,793	2,842	2,791	2,633
Office .....	55,605	3,601	3,935	4,299	4,423	4,822	4,689	4,650	4,970	5,151	5,076	5,111	4,879
Hotels, motels .....	16,293	1,324	1,318	1,434	1,410	1,421	1,441	1,387	1,376	1,329	1,330	1,310	1,214
Other commercial .....	60,381	4,180	4,619	4,612	4,727	5,027	5,287	5,274	5,609	5,628	5,613	5,121	4,686
Religious .....	8,019	579	619	629	625	636	691	717	734	710	761	696	623
Educational .....	11,375	733	778	842	850	1,012	1,037	1,096	1,207	993	990	961	877
Hospital and institutional .....	14,434	1,039	1,070	1,134	1,186	1,181	1,204	1,208	1,260	1,271	1,299	1,307	1,276
Miscellaneous <sup>1</sup> .....	10,332	795	849	913	871	919	890	863	916	870	859	843	745
Farm nonresidential .....	5,988	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	50,144	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	18,799	1,229	1,196	1,552	1,277	1,527	1,683	1,403	1,583	1,891	1,655	1,764	2,040
Railroads .....	4,263	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	21,149	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	4,930	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	1,003	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,954	174	197	216	204	215	234	246	308	307	310	288	257
<b>Public construction</b> .....	178,561	11,658	11,410	12,962	13,871	14,898	15,994	15,969	18,421	18,463	16,866	15,018	13,031
Buildings .....	88,566	6,226	6,300	6,575	6,900	7,261	7,948	7,937	8,634	8,371	8,004	7,343	7,068
Housing and redevelopment .....	4,308	291	276	328	347	356	376	354	384	402	418	402	375
Industrial .....	1,157	93	96	92	91	89	97	98	109	125	75	93	99
Educational .....	49,814	3,385	3,413	3,574	3,700	4,012	4,620	4,755	5,198	4,793	4,407	3,986	3,971
Hospital .....	4,135	317	309	315	357	371	371	350	356	399	344	357	290
Other <sup>3</sup> .....	29,151	2,140	2,205	2,267	2,406	2,433	2,485	2,380	2,586	2,651	2,761	2,505	2,332
Highways and streets .....	49,262	2,762	2,221	3,101	3,709	4,229	4,583	4,788	6,091	5,859	4,989	4,015	2,913
Military facilities .....	2,441	138	210	210	180	200	197	188	211	271	146	280	210
Conservation and development .....	6,063	432	485	505	470	448	510	436	525	789	479	484	500
Other public construction .....	32,228	2,100	2,195	2,570	2,613	2,760	2,756	2,619	2,960	3,174	3,247	2,896	2,340
Sewer systems .....	8,807	611	604	673	789	764	844	749	808	793	805	745	620
Water supply facilities .....	5,993	428	436	424	480	526	486	469	567	568	597	542	471
Miscellaneous public <sup>4</sup> .....	17,429	1,061	1,155	1,473	1,343	1,469	1,426	1,401	1,586	1,813	1,844	1,609	1,249

See footnotes at end of table.

Table 3b. **Annual and Monthly Value of Construction Put in Place: 1998-2001—Not Seasonally Adjusted in Current Dollars—Con.**

[Millions of dollars]

Type of construction	2001												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> . . . . .	842,539	57,605	55,427	63,253	67,269	73,402	77,893	78,176	80,180	77,939	77,060	71,783	62,551
<b>Private construction</b> . . . . .	650,030	45,545	43,641	50,136	52,384	56,612	59,744	59,659	60,679	59,252	58,967	55,295	48,115
Residential buildings . . . . .	388,705	25,535	24,034	28,735	30,741	34,051	36,315	36,265	37,213	36,844	36,544	34,215	28,214
New housing units . . . . .	279,772	18,736	18,253	21,316	22,423	24,133	25,391	26,138	26,528	25,978	25,475	24,456	20,946
1 unit . . . . .	249,086	16,512	15,992	18,909	19,960	21,437	22,686	23,511	23,797	23,380	22,793	21,761	18,347
2 units or more . . . . .	30,686	2,223	2,262	2,407	2,463	2,696	2,704	2,627	2,731	2,598	2,682	2,694	2,598
Improvements . . . . .	108,933	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings . . . . .	201,094	16,219	15,933	17,223	17,149	17,210	17,906	17,597	17,433	16,972	16,883	15,846	14,723
Industrial . . . . .	29,046	2,600	2,361	2,659	2,564	2,446	2,676	2,601	2,530	2,527	2,214	1,924	1,944
Office . . . . .	52,020	4,670	4,453	4,871	4,632	4,582	4,684	4,369	4,179	4,010	4,173	3,889	3,508
Hotels, motels . . . . .	14,421	1,206	1,218	1,228	1,213	1,235	1,276	1,286	1,249	1,193	1,159	1,120	1,040
Other commercial . . . . .	60,297	4,328	4,523	4,787	5,033	5,116	5,273	5,443	5,464	5,393	5,354	5,058	4,526
Religious . . . . .	8,310	608	604	637	665	682	702	734	775	751	752	738	662
Educational . . . . .	12,629	874	848	921	966	1,031	1,149	1,146	1,227	1,146	1,148	1,114	1,060
Hospital and institutional . . . . .	15,114	1,225	1,191	1,285	1,263	1,301	1,299	1,239	1,245	1,253	1,311	1,247	1,256
Miscellaneous <sup>1</sup> . . . . .	9,259	708	736	836	814	818	847	780	766	698	772	758	727
Farm nonresidential . . . . .	6,134	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities . . . . .	51,114	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications . . . . .	18,538	1,392	1,311	1,432	1,527	1,837	1,596	1,503	1,697	1,474	1,639	1,578	1,553
Railroads . . . . .	4,149	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power . . . . .	22,515	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas . . . . .	4,969	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines . . . . .	943	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> . . . . .	2,983	199	200	192	200	218	246	294	310	306	283	265	270
<b>Public construction</b> . . . . .	192,509	12,060	11,786	13,118	14,885	16,790	18,149	18,518	19,501	18,687	18,093	16,488	14,436
Buildings . . . . .	96,967	6,650	6,484	6,938	7,628	8,028	8,567	9,069	9,539	9,144	8,884	8,228	7,809
Housing and redevelopment . . . . .	4,751	375	350	362	389	417	412	367	374	403	444	427	429
Industrial . . . . .	1,556	123	102	114	133	108	125	125	125	211	77	115	198
Educational . . . . .	55,752	3,623	3,518	3,776	4,181	4,468	4,917	5,670	6,045	5,418	5,205	4,629	4,304
Hospital . . . . .	4,053	302	289	294	310	338	375	345	356	383	356	350	353
Other <sup>3</sup> . . . . .	30,855	2,227	2,225	2,392	2,615	2,696	2,737	2,562	2,639	2,728	2,802	2,707	2,525
Highways and streets . . . . .	54,026	2,431	2,387	3,089	3,943	5,146	5,918	5,946	6,154	5,466	5,634	4,601	3,310
Military facilities . . . . .	2,843	216	195	214	258	232	258	239	269	303	196	245	220
Conservation and development . . . . .	7,122	529	537	578	505	607	567	540	665	901	517	607	570
Other public construction . . . . .	31,551	2,235	2,183	2,299	2,551	2,777	2,840	2,724	2,874	2,873	2,862	2,807	2,527
Sewer systems . . . . .	8,751	608	595	648	723	764	792	751	822	777	811	803	659
Water supply facilities . . . . .	7,152	426	458	509	597	603	661	654	661	693	657	649	583
Miscellaneous public <sup>4</sup> . . . . .	15,648	1,200	1,130	1,141	1,232	1,410	1,387	1,319	1,391	1,403	1,394	1,355	1,286

NA Not available, but estimates are included in total.

<sup>1</sup>Includes amusement and recreational buildings, bus and airline terminals, animal hospitals and shelters, etc. <sup>2</sup>Includes privately owned streets and bridges, parking areas, sewer and water facilities, parks and playgrounds, golf courses, airfields, etc. <sup>3</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, civic centers, passenger terminals, space facilities, postal facilities, etc.

<sup>4</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc.

Table 4a. **Monthly Value of Construction Put in Place: May 2000-May 2002—Seasonally Adjusted Annual Rate in Current Dollars**

[Millions of dollars]

Period	Total construction	Private construction																All other private <sup>5</sup>	
		Total <sup>1</sup>	Residential buildings					Nonresidential buildings									Public utilities <sup>4</sup>		
			Total <sup>2</sup>	New housing units			Total	Industrial	Office	Hotels, motels	Other commercial	Religious	Educational	Hospital and institutional	Miscellaneous <sup>3</sup>	Total	Telecommunications		
				Total	1 unit	2 units or more													
2000: May <sup>f</sup> . . . . .	820,501	643,404	377,348	269,178	240,501	28,678	209,261	33,287	55,002	16,812	59,721	7,915	11,706	14,003	10,816	(NA)	17,895	2,695	
June <sup>f</sup> . . . . .	810,560	640,033	376,263	266,380	237,706	28,675	208,485	33,179	54,686	16,480	60,138	8,376	10,833	14,364	10,430	(NA)	18,909	2,779	
July <sup>f</sup> . . . . .	799,634	630,672	365,747	260,768	234,031	26,737	208,501	32,587	55,518	16,478	59,090	8,634	11,181	14,822	10,192	(NA)	17,516	2,747	
August <sup>f</sup> . . . . .	811,750	634,278	365,074	258,607	231,775	26,832	211,435	31,985	57,291	15,862	60,744	7,898	12,170	14,811	10,673	(NA)	17,062	3,164	
September <sup>f</sup> . . . . .	822,205	638,837	362,935	258,680	231,503	27,177	212,371	31,413	59,840	16,001	60,949	7,982	11,197	14,879	10,112	(NA)	21,877	3,269	
October <sup>f</sup> . . . . .	823,532	643,194	368,932	259,274	231,831	27,443	212,091	31,754	58,681	15,721	61,180	8,075	11,872	14,990	9,818	(NA)	18,185	3,245	
November <sup>f</sup> . . . . .	822,182	643,472	367,806	261,190	232,949	28,241	211,994	32,641	59,948	15,427	59,313	7,619	11,985	15,166	9,895	(NA)	19,402	3,277	
December <sup>f</sup> . . . . .	830,419	649,303	370,758	265,148	235,994	29,154	211,828	30,800	61,306	15,164	60,140	7,825	11,881	15,492	9,221	(NA)	23,703	2,994	
2001: January <sup>f</sup> . . . . .	836,473	649,245	375,088	271,550	241,940	29,610	217,071	34,591	60,134	15,284	61,537	7,941	12,453	15,640	9,490	(NA)	19,883	2,827	
February <sup>f</sup> . . . . .	841,671	654,012	386,317	277,753	247,291	30,462	213,796	32,086	57,898	15,559	63,327	8,152	12,057	15,103	9,614	(NA)	18,794	2,966	
March <sup>f</sup> . . . . .	845,710	654,467	382,301	275,296	245,307	29,989	217,623	33,947	60,132	14,660	62,775	8,213	12,253	15,542	10,100	(NA)	17,831	2,618	
April <sup>f</sup> . . . . .	849,713	654,974	386,325	276,878	246,933	29,945	210,578	32,250	55,922	14,426	62,976	8,434	12,191	14,900	9,479	(NA)	19,573	2,660	
May <sup>f</sup> . . . . .	846,591	648,790	383,942	279,266	248,546	30,720	201,972	29,057	52,413	14,470	60,726	8,311	11,927	15,442	9,625	(NA)	21,483	2,746	
June <sup>f</sup> . . . . .	852,562	658,421	388,982	280,286	249,757	30,528	207,149	30,995	54,998	14,982	60,031	8,722	12,028	15,463	9,929	(NA)	18,578	2,922	
July <sup>f</sup> . . . . .	843,603	651,016	385,816	280,964	250,562	30,402	203,223	30,210	51,854	15,230	61,044	8,728	11,744	15,192	9,220	(NA)	17,987	3,283	
August <sup>f</sup> . . . . .	838,638	650,576	391,687	282,284	251,596	30,688	195,449	29,026	48,167	14,593	59,125	8,627	12,369	14,641	8,901	(NA)	18,098	3,166	
September <sup>f</sup> . . . . .	835,965	648,548	393,476	281,648	251,174	30,474	192,259	28,611	46,996	14,312	58,297	8,309	12,927	14,672	8,134	(NA)	18,064	3,256	
October <sup>f</sup> . . . . .	836,571	643,432	392,337	281,554	250,931	30,623	190,048	24,599	47,739	13,581	58,459	8,008	13,725	15,128	8,809	(NA)	17,280	2,969	
November <sup>f</sup> . . . . .	836,550	639,681	394,732	282,237	250,130	32,107	185,395	22,459	45,614	13,314	58,534	8,206	13,896	14,468	8,903	(NA)	17,071	3,019	
December <sup>f</sup> . . . . .	841,809	640,795	395,218	283,115	250,190	32,925	184,358	23,011	44,036	12,651	58,021	8,092	14,306	15,253	8,989	(NA)	18,249	3,143	
2002: January <sup>f</sup> . . . . .	860,238	651,536	403,277	286,931	251,555	35,376	185,613	20,883	44,158	12,261	61,311	8,406	14,223	15,358	9,012	(NA)	16,993	2,972	
February <sup>f</sup> . . . . .	874,310	659,372	413,482	293,819	259,961	33,858	183,208	19,552	41,677	12,177	61,473	8,678	14,427	16,184	9,040	(NA)	17,210	3,247	
March <sup>f</sup> . . . . .	855,224	655,341	413,815	295,407	261,730	33,677	178,545	18,463	40,963	11,440	60,838	8,792	13,951	15,998	8,098	(NA)	16,488	3,163	
April <sup>f</sup> . . . . .	858,238	658,118	415,456	296,965	260,746	36,219	178,608	17,587	40,216	11,506	61,155	8,653	14,684	16,315	8,494	(NA)	16,091	3,277	
May <sup>p</sup> . . . . .	851,961	648,083	412,309	296,968	260,741	36,227	172,998	16,967	37,573	11,239	59,363	8,775	13,416	16,902	8,764	(NA)	(NA)	3,094	
<b>PERCENT CHANGE</b>																			
April 2002-																			
May 2002 . . . . .	-1	-2	-1	(Z)	(Z)	(Z)	-3	-4	-7	-2	-3	1	-9	4	3	(NA)	(NA)	-6	

See footnotes at end of table.

Table 4a. **Monthly Value of Construction Put in Place: May 2000-May 2002—Seasonally Adjusted Annual Rate in Current Dollars—Con.**

[Millions of dollars]

Period	Public construction												
	Total	Buildings						Highways and streets	Military facilities	Conservation and development	Sewer systems	Water supply facilities	Miscellaneous public <sup>7</sup>
		Total	Housing and redevelopment	Industrial	Educational	Hospital	Other public buildings <sup>6</sup>						
2000: May <sup>f</sup> . . . . .	177,096	88,190	4,144	1,125	49,786	4,396	28,740	48,754	2,386	5,382	8,949	6,094	17,342
June <sup>f</sup> . . . . .	170,527	87,496	4,355	1,134	49,458	4,197	28,353	44,036	2,264	5,880	9,267	5,579	16,004
July <sup>f</sup> . . . . .	168,963	85,583	4,265	1,167	47,516	4,204	28,432	46,525	2,211	5,321	8,484	5,181	15,658
August <sup>f</sup> . . . . .	177,472	88,172	4,601	1,331	48,929	4,209	29,102	50,238	2,439	5,643	8,601	6,210	16,167
September <sup>f</sup> . . . . .	183,368	89,374	4,423	1,116	50,181	4,316	29,339	52,543	2,590	6,351	8,417	6,187	17,906
October <sup>f</sup> . . . . .	180,338	90,947	4,652	1,007	50,127	3,948	31,213	46,234	2,148	6,781	8,513	6,141	19,574
November <sup>f</sup> . . . . .	178,709	89,425	4,720	1,130	50,237	4,243	29,095	46,826	3,261	5,692	8,532	6,139	18,835
December <sup>f</sup> . . . . .	181,115	92,444	4,601	1,158	53,538	3,592	29,556	48,553	2,450	6,485	8,362	6,161	16,659
2001: January <sup>f</sup> . . . . .	187,227	92,952	4,885	1,610	52,569	3,855	30,032	50,901	2,839	7,412	8,828	6,313	17,984
February <sup>f</sup> . . . . .	187,660	92,155	4,727	1,362	52,241	3,842	29,984	52,754	2,684	7,589	8,876	6,595	17,007
March <sup>f</sup> . . . . .	191,243	93,607	4,550	1,380	53,734	3,658	30,286	55,917	2,493	7,479	8,668	7,032	16,048
April <sup>f</sup> . . . . .	194,739	96,586	4,669	1,636	54,887	3,826	31,568	56,199	3,262	6,553	9,022	7,318	15,799
May <sup>f</sup> . . . . .	197,802	97,062	4,867	1,365	55,444	4,017	31,369	57,932	2,754	7,384	8,952	6,960	16,757
June <sup>f</sup> . . . . .	194,141	94,894	4,769	1,454	52,634	4,308	31,730	57,828	2,965	6,586	8,691	7,581	15,596
July <sup>f</sup> . . . . .	192,587	96,819	4,418	1,469	56,614	4,087	30,230	56,181	2,802	6,432	8,469	7,233	14,652
August <sup>f</sup> . . . . .	188,062	96,884	4,463	1,509	56,856	4,198	29,858	50,965	3,110	7,005	8,744	7,231	14,124
September <sup>f</sup> . . . . .	187,417	97,807	4,473	1,896	56,727	4,184	30,527	49,432	2,900	7,564	8,235	7,546	13,932
October <sup>f</sup> . . . . .	193,140	100,977	5,000	1,048	59,262	4,025	31,642	51,612	2,894	7,239	8,586	6,772	15,060
November <sup>f</sup> . . . . .	196,869	100,295	5,008	1,417	58,347	4,145	31,377	54,183	2,838	7,115	9,218	7,381	15,840
December <sup>f</sup> . . . . .	201,014	102,071	5,267	2,308	58,088	4,385	32,023	55,250	2,559	7,461	8,881	7,636	17,155
2002: January <sup>f</sup> . . . . .	208,702	104,647	4,943	1,470	61,052	5,375	31,808	61,726	2,481	8,159	9,536	7,270	14,884
February <sup>f</sup> . . . . .	214,938	108,858	5,172	2,321	63,861	5,068	32,435	61,726	2,533	8,661	9,884	7,197	16,078
March <sup>f</sup> . . . . .	199,882	103,940	4,806	1,876	60,875	5,017	31,366	52,418	2,609	8,693	9,334	6,935	15,953
April <sup>f</sup> . . . . .	200,120	105,095	5,382	2,097	62,670	5,091	29,855	51,755	2,717	7,945	9,354	6,973	16,281
May <sup>p</sup> . . . . .	203,878	108,545	5,596	2,079	65,324	5,193	30,353	51,559	2,795	7,577	9,491	7,041	16,869
<b>PERCENT CHANGE</b>													
April 2002- May 2002 . . . . .	2	3	4	-1	4	2	2	(Z)	3	-5	1	1	4

NA Not available, but estimates are included in totals. <sup>p</sup>Preliminary. <sup>r</sup>Revised. Z Less than 0.5 percent.

<sup>1</sup>Includes farm nonresidential and other private categories, not shown separately. <sup>2</sup>Includes residential improvements, not shown separately. <sup>3</sup>Includes amusement and recreational buildings, bus and airline terminals, animal hospitals and shelters, etc. <sup>4</sup>Includes gas, electric, railroad, and petroleum pipelines, not shown separately. <sup>5</sup>Includes privately owned streets and bridges, parking areas, sewer and water facilities, parks and playgrounds, golf courses, airfields, etc. <sup>6</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, civic centers, passenger terminals, space facilities, postal facilities, etc. <sup>7</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc.

Table 4b. **Monthly Value of Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in Current Dollars**

[Millions of dollars]

Type of construction	1998											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	674,990	677,642	683,767	695,517	691,069	719,635	717,123	714,201	714,875	714,877	723,131	727,323
<b>Private construction</b> .....	527,611	532,072	538,190	548,885	545,689	563,327	558,745	558,228	554,375	555,212	562,805	563,908
Residential buildings .....	305,301	308,310	311,604	313,449	311,540	314,658	317,999	315,387	317,042	316,958	320,291	321,626
New housing units .....	207,206	210,111	212,804	215,752	215,441	220,887	226,553	227,537	231,406	234,337	238,059	240,913
1 unit .....	182,101	184,925	188,241	191,287	191,887	197,182	201,638	204,080	206,640	208,880	212,880	215,891
2 units or more .....	25,105	25,186	24,563	24,465	23,553	23,705	24,915	23,457	24,766	25,457	25,180	25,022
Improvements .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	183,431	183,486	185,537	191,031	186,482	194,132	190,483	192,613	189,418	194,548	197,805	199,246
Industrial .....	39,954	40,542	42,259	41,995	40,218	40,573	39,795	42,953	39,747	40,109	40,121	38,299
Office .....	40,569	39,917	39,479	41,087	41,146	44,345	41,691	40,576	41,075	44,546	45,469	46,617
Hotels, motels .....	12,894	12,724	12,800	13,659	13,322	15,010	14,956	15,947	16,672	16,745	16,423	16,065
Other commercial .....	51,414	50,865	52,501	53,451	52,667	54,863	55,043	53,384	52,207	54,028	55,758	56,426
Religious .....	6,481	6,672	6,250	6,134	5,895	6,373	6,601	6,722	6,648	6,743	7,188	7,139
Educational .....	9,871	10,385	10,426	10,717	10,402	9,368	8,569	8,972	9,582	9,019	9,541	10,242
Hospital and institutional .....	13,390	13,510	13,548	14,232	13,723	13,979	13,988	13,922	13,930	13,432	13,584	14,257
Miscellaneous <sup>1</sup> .....	8,858	8,872	8,275	9,756	9,109	9,621	9,840	10,135	9,556	9,924	9,720	10,201
Farm nonresidential .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	11,820	12,875	13,578	12,395	13,010	12,350	12,022	12,362	12,271	12,960	12,198	11,741
Railroads .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,565	2,566	2,498	2,412	2,516	3,051	2,436	2,615	2,550	2,441	2,713	2,448
<b>Public construction</b> .....	147,378	145,571	145,577	146,633	145,380	156,308	158,378	155,973	160,501	159,665	160,326	163,415
Buildings .....	68,067	68,475	67,912	69,369	69,429	72,818	75,923	73,683	74,706	74,517	75,111	77,345
Housing and redevelopment .....	4,712	4,851	4,962	5,029	4,902	5,481	6,196	5,401	5,000	5,083	5,339	5,216
Industrial .....	964	1,067	1,194	1,022	986	884	1,039	1,067	987	796	1,172	967
Educational .....	33,271	33,323	32,175	34,009	34,130	35,691	36,325	34,848	35,805	35,343	36,048	38,263
Hospital .....	4,153	3,879	4,429	3,559	4,041	3,716	3,724	3,835	4,039	4,234	3,837	3,717
Other <sup>3</sup> .....	24,967	25,354	25,152	25,751	25,371	27,046	28,639	28,532	28,874	29,061	28,714	29,182
Highways and streets .....	43,859	42,452	43,402	43,589	42,217	45,783	43,785	44,654	45,968	47,611	45,313	45,067
Military facilities .....	2,501	2,741	2,755	2,594	2,346	2,595	3,256	2,792	2,100	2,298	2,203	2,281
Conservation and development .....	4,956	6,006	5,403	4,794	5,013	5,706	5,394	5,329	6,191	5,093	5,672	5,582
Other public construction .....	27,995	25,898	26,105	26,286	26,375	29,406	30,021	29,515	31,537	30,146	32,026	33,139
Sewer systems .....	9,342	9,186	9,107	8,980	8,971	9,570	10,268	10,176	10,344	10,643	11,148	11,122
Water supply facilities .....	6,131	6,137	5,953	6,133	6,204	6,119	6,491	6,632	7,276	7,390	7,432	7,844
Miscellaneous public <sup>4</sup> .....	12,523	10,575	11,046	11,174	11,201	13,717	13,261	12,707	13,917	12,112	13,445	14,173

See footnotes at end of table.

Table 4b. **Monthly Value of Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in Current Dollars—Con.**

[Millions of dollars]

Type of construction	1999											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	737,020	757,029	757,201	748,612	746,530	754,656	767,588	763,000	769,207	777,682	798,704	812,202
<b>Private construction</b> .....	571,139	585,326	587,644	579,289	579,459	588,772	599,105	595,241	601,078	608,009	622,089	631,305
Residential buildings .....	325,951	330,651	335,259	336,640	340,490	344,285	349,686	355,198	359,894	366,235	372,581	378,894
New housing units .....	244,236	246,226	248,054	247,854	248,157	248,445	249,700	251,642	252,652	254,926	259,284	265,519
1 unit .....	217,740	218,875	220,400	220,397	221,178	221,552	222,278	223,334	224,735	227,430	231,804	237,467
2 units or more .....	26,496	27,351	27,653	27,458	26,979	26,893	27,422	28,309	27,917	27,496	27,480	28,051
Improvements .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	197,025	200,988	198,446	195,005	193,915	192,133	193,230	190,607	191,667	190,108	193,283	194,112
Industrial .....	37,731	36,830	35,529	33,607	32,718	32,458	33,232	31,740	30,950	29,370	29,252	30,162
Office .....	47,001	48,852	47,122	46,264	46,462	47,413	46,818	48,570	49,711	48,981	47,054	46,864
Hotels, motels .....	17,126	17,955	17,128	16,219	16,130	15,124	15,886	14,992	14,766	15,351	15,596	15,743
Other commercial .....	54,566	55,815	57,206	56,758	57,626	56,575	56,812	55,427	56,304	55,898	60,643	59,409
Religious .....	7,786	7,520	7,383	7,558	7,506	7,598	7,524	7,334	6,895	7,484	7,036	7,218
Educational .....	8,796	9,187	9,617	10,441	9,246	9,826	9,690	9,384	9,351	9,624	10,028	10,539
Hospital and institutional .....	13,478	14,070	13,770	13,554	13,599	13,231	13,283	13,342	13,624	13,623	13,491	13,362
Miscellaneous <sup>1</sup> .....	10,541	10,759	10,690	10,604	10,628	9,908	9,985	9,819	10,065	9,777	10,181	10,815
Farm nonresidential .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	13,330	14,254	17,714	17,762	16,541	16,678	19,323	19,594	19,301	20,563	21,079	21,457
Railroads .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,361	2,477	2,832	3,244	2,986	2,880	2,794	2,485	2,476	2,359	2,694	2,976
<b>Public construction</b> .....	165,880	171,703	169,557	169,323	167,071	165,884	168,483	167,759	168,130	169,673	176,615	180,897
Buildings .....	76,251	79,003	79,605	79,690	77,856	79,648	79,864	81,273	81,519	82,047	83,611	83,698
Housing and redevelopment .....	4,888	4,919	5,181	5,115	5,127	4,534	4,597	4,749	4,508	4,188	4,013	4,176
Industrial .....	839	926	1,029	937	1,041	849	1,071	856	998	600	872	1,023
Educational .....	38,779	39,611	40,188	42,238	40,730	43,077	41,909	42,938	43,983	43,960	45,417	44,684
Hospital .....	4,030	4,781	3,890	3,567	4,005	4,001	4,123	3,951	4,000	4,018	4,045	3,983
Other <sup>3</sup> .....	27,714	28,767	29,317	27,833	26,954	27,187	28,164	28,778	28,030	29,280	29,264	29,833
Highways and streets .....	49,117	51,284	49,070	48,814	49,292	46,308	48,200	46,494	48,470	47,741	52,430	55,165
Military facilities .....	1,901	2,425	2,206	2,266	2,132	2,143	2,293	1,640	1,972	2,190	2,010	2,417
Conservation and development .....	5,799	6,148	5,857	5,660	5,326	5,769	5,876	6,546	6,268	5,992	6,637	6,954
Other public construction .....	32,813	32,842	32,819	32,894	32,466	32,016	32,250	31,806	29,901	31,702	31,927	32,661
Sewer systems .....	10,832	10,416	10,789	10,148	10,165	10,074	10,014	9,429	9,165	9,087	9,087	9,853
Water supply facilities .....	7,150	7,326	7,542	6,806	6,688	6,713	6,881	6,612	6,198	5,680	5,760	5,641
Miscellaneous public <sup>4</sup> .....	14,832	15,100	14,488	15,940	15,613	15,230	15,355	15,765	14,538	16,936	17,080	17,168

See footnotes at end of table.

Table 4b. **Monthly Value of Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in Current Dollars—Con.**

[Millions of dollars]

Type of construction	2000											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	819,894	829,657	840,439	831,114	820,501	810,560	799,634	811,750	822,205	823,532	822,182	830,419
<b>Private construction</b> .....	632,632	651,593	653,556	648,689	643,404	640,033	630,672	634,278	638,837	643,194	643,472	649,303
Residential buildings .....	384,253	389,963	388,556	388,342	377,348	376,263	365,747	365,074	362,935	368,932	367,806	370,758
New housing units .....	270,960	271,561	272,522	271,586	269,178	266,380	260,768	258,607	258,680	259,274	261,190	265,148
1 unit .....	242,231	243,998	242,715	241,786	240,501	237,706	234,031	231,775	231,503	231,831	232,949	235,994
2 units or more .....	28,729	27,563	29,808	29,799	28,678	28,675	26,737	26,832	27,177	27,443	28,241	29,154
Improvements .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	194,947	203,881	206,189	204,762	209,261	208,485	208,501	211,435	212,371	212,091	211,994	211,828
Industrial .....	29,412	30,068	31,717	31,850	33,287	33,179	32,587	31,985	31,413	31,754	32,641	30,800
Office .....	47,171	49,241	52,640	53,938	55,002	54,686	55,518	57,291	59,840	58,681	59,948	61,306
Hotels, motels .....	16,869	16,250	17,242	17,036	16,812	16,480	16,478	15,862	16,001	15,721	15,427	15,164
Other commercial .....	59,427	64,603	60,481	59,153	59,721	60,138	59,090	60,744	60,949	61,180	59,313	60,140
Religious .....	7,672	7,987	8,171	7,920	7,915	8,376	8,634	7,898	7,982	8,075	7,619	7,825
Educational .....	10,485	11,049	11,206	10,731	11,706	10,833	11,181	12,170	11,197	11,872	11,985	11,881
Hospital and institutional .....	13,266	13,570	13,712	14,004	14,003	14,364	14,822	14,811	14,879	14,990	15,166	15,492
Miscellaneous <sup>1</sup> .....	10,646	11,113	11,020	10,131	10,816	10,430	10,192	10,673	10,112	9,818	9,895	9,221
Farm nonresidential .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	19,010	16,332	18,655	16,898	17,895	18,909	17,516	17,062	21,877	18,185	19,402	23,703
Railroads .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,468	2,928	2,929	2,695	2,695	2,779	2,747	3,164	3,269	3,245	3,277	2,994
<b>Public construction</b> .....	187,262	178,064	186,883	182,425	177,096	170,527	168,963	177,472	183,368	180,338	178,709	181,115
Buildings .....	87,457	88,369	88,496	87,644	88,190	87,496	85,583	88,172	89,374	90,947	89,425	92,444
Housing and redevelopment .....	3,784	3,736	4,129	4,169	4,144	4,355	4,265	4,601	4,423	4,652	4,720	4,601
Industrial .....	1,210	1,287	1,115	1,123	1,125	1,134	1,167	1,331	1,116	1,007	1,130	1,158
Educational .....	49,123	50,689	50,757	48,726	49,786	49,458	47,516	48,929	50,181	50,127	50,237	53,538
Hospital .....	4,184	3,987	3,848	4,468	4,396	4,197	4,204	4,209	4,316	3,948	4,243	3,592
Other <sup>3</sup> .....	29,156	28,669	28,646	29,157	28,740	28,353	28,432	29,102	29,339	31,213	29,095	29,556
Highways and streets .....	60,264	47,344	54,169	53,296	48,754	44,036	46,525	50,238	52,543	46,234	46,826	48,553
Military facilities .....	1,796	2,902	2,466	2,273	2,386	2,264	2,211	2,439	2,590	2,148	3,261	2,450
Conservation and development .....	6,394	6,738	6,286	6,218	5,382	5,880	5,321	5,643	6,351	6,781	5,692	6,485
Other public construction .....	31,351	32,713	35,466	32,994	32,385	30,850	29,323	30,979	32,510	34,228	33,506	31,182
Sewer systems .....	8,877	9,036	9,007	9,843	8,949	9,267	8,484	8,601	8,417	8,513	8,532	8,362
Water supply facilities .....	6,326	6,248	5,877	5,882	6,094	5,579	5,181	6,210	6,187	6,141	6,139	6,161
Miscellaneous public <sup>4</sup> .....	16,149	17,429	20,582	17,268	17,342	16,004	15,658	16,167	17,906	19,574	18,835	16,659

See footnotes at end of table.



Table 4b. **Monthly Value of Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in Current Dollars—Con.**

[Millions of dollars]

Type of construction	2001											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	836,473	841,671	845,710	849,713	846,591	852,562	843,603	838,638	835,965	836,571	836,550	841,809
<b>Private construction</b> .....	649,245	654,011	654,467	654,974	648,790	658,421	651,016	650,576	648,548	643,432	639,681	640,795
Residential buildings .....	375,088	386,317	382,301	386,325	383,942	388,982	385,816	391,687	393,476	392,337	394,732	395,218
New housing units .....	271,550	277,753	275,296	276,878	279,266	280,286	280,964	282,284	281,648	281,554	282,237	283,115
1 unit .....	241,940	247,291	245,307	246,933	248,546	249,757	250,562	251,596	251,174	250,931	250,130	250,190
2 units or more .....	29,610	30,462	29,989	29,945	30,720	30,528	30,402	30,688	30,474	30,623	32,107	32,925
Improvements .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	217,071	213,796	217,623	210,578	201,972	207,149	203,223	195,449	192,259	190,048	185,395	184,358
Industrial .....	34,591	32,086	33,947	32,250	29,057	30,995	30,210	29,026	28,611	24,599	22,459	23,011
Office .....	60,134	57,898	60,132	55,922	52,413	54,998	51,854	48,167	46,996	47,739	45,614	44,036
Hotels, motels .....	15,284	15,559	14,660	14,426	14,470	14,982	15,230	14,593	14,312	13,581	13,314	12,651
Other commercial .....	61,537	63,327	62,775	62,976	60,726	60,031	61,044	59,125	58,297	58,459	58,534	58,021
Religious .....	7,941	8,152	8,213	8,434	8,311	8,722	8,728	8,627	8,309	8,008	8,206	8,092
Educational .....	12,453	12,057	12,253	12,191	11,927	12,028	11,744	12,369	12,927	13,725	13,896	14,306
Hospital and institutional .....	15,640	15,103	15,542	14,900	15,442	15,463	15,192	14,641	14,672	15,128	14,468	15,253
Miscellaneous <sup>1</sup> .....	9,490	9,614	10,100	9,479	9,625	9,929	9,220	8,901	8,134	8,809	8,903	8,989
Farm nonresidential .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	19,883	18,794	17,831	19,573	21,483	18,578	17,987	18,098	18,064	17,280	17,071	18,249
Railroads .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,827	2,966	2,618	2,660	2,746	2,922	3,283	3,166	3,256	2,969	3,019	3,143
<b>Public construction</b> .....	187,227	187,660	191,243	194,739	197,802	194,141	192,587	188,062	187,417	193,140	196,869	201,014
Buildings .....	92,952	92,155	93,607	96,586	97,062	94,894	96,819	96,884	97,807	100,977	100,295	102,071
Housing and redevelopment .....	4,885	4,727	4,550	4,669	4,867	4,769	4,418	4,463	4,473	5,000	5,008	5,267
Industrial .....	1,610	1,362	1,380	1,636	1,365	1,454	1,469	1,509	1,896	1,048	1,417	2,308
Educational .....	52,569	52,241	53,734	54,887	55,444	52,634	56,614	56,856	56,727	59,262	58,347	58,088
Hospital .....	3,855	3,842	3,658	3,826	4,017	4,308	4,087	4,198	4,184	4,025	4,145	4,385
Other <sup>3</sup> .....	30,032	29,984	30,286	31,568	31,369	31,730	30,230	29,858	30,527	31,642	31,377	32,023
Highways and streets .....	50,901	52,754	55,917	56,199	57,932	57,828	56,181	50,965	49,432	51,612	54,183	55,250
Military facilities .....	2,839	2,684	2,493	3,262	2,754	2,965	2,802	3,110	2,900	2,894	2,838	2,559
Conservation and development .....	7,412	7,589	7,479	6,553	7,384	6,586	6,432	7,005	7,564	7,239	7,115	7,461
Other public construction .....	33,125	32,477	31,747	32,138	32,669	31,868	30,354	30,098	29,713	30,418	32,438	33,673
Sewer systems .....	8,828	8,876	8,668	9,022	8,952	8,691	8,469	8,744	8,235	8,586	9,218	8,881
Water supply facilities .....	6,313	6,595	7,032	7,318	6,960	7,581	7,233	7,231	7,546	6,772	7,381	7,636
Miscellaneous public <sup>4</sup> .....	17,984	17,007	16,048	15,799	16,757	15,596	14,652	14,124	13,932	15,060	15,840	17,155

NA Not available, but estimates are included in total.

<sup>1</sup>Includes amusement and recreational buildings, bus and airline terminals, animal hospitals and shelters, etc. <sup>2</sup>Includes privately owned streets and bridges, parking areas, sewer and water facilities, parks and playgrounds, golf courses, airfields, etc. <sup>3</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, civic centers, passenger terminals, space facilities, postal facilities, etc.

<sup>4</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc.



Table 5a. **Monthly Value of Construction Put in Place: May 2000-May 2002—Seasonally Adjusted Annual Rate in 1996 Dollars**

[Millions of dollars]

Period	Total construction	Private construction																All other private <sup>5</sup>	
		Total <sup>1</sup>	Residential buildings					Nonresidential buildings									Public utilities <sup>4</sup>		
			Total <sup>2</sup>	New housing units			Total	Industrial	Office	Hotels, motels	Other commercial	Religious	Educational	Hospital and institutional	Miscellaneous <sup>3</sup>	Total	Telecommunications		
				Total	1 unit	2 units or more													
2000: May <sup>f</sup> . . . . .	713,984	559,873	327,843	233,865	208,949	24,915	179,624	28,573	47,212	14,431	51,262	6,794	10,048	12,020	9,285	(NA)	17,441	2,398	
June <sup>f</sup> . . . . .	703,940	555,643	325,768	230,632	205,806	24,826	178,803	28,455	46,900	14,134	51,576	7,183	9,291	12,319	8,945	(NA)	18,430	2,475	
July <sup>f</sup> . . . . .	691,681	545,571	315,844	225,188	202,099	23,089	177,901	27,804	47,370	14,060	50,418	7,366	9,540	12,647	8,696	(NA)	17,022	2,431	
August <sup>f</sup> . . . . .	701,025	547,866	314,990	223,129	199,978	23,151	179,945	27,221	48,758	13,499	51,697	6,722	10,358	12,605	9,083	(NA)	16,597	2,793	
September <sup>f</sup> . . . . .	709,170	551,173	312,336	222,616	199,228	23,388	180,434	26,689	50,841	13,595	51,783	6,781	9,513	12,641	8,591	(NA)	21,260	2,880	
October <sup>f</sup> . . . . .	707,770	552,919	316,680	222,553	198,997	23,556	179,738	26,910	49,730	13,323	51,848	6,844	10,061	12,703	8,321	(NA)	17,485	2,847	
November <sup>f</sup> . . . . .	704,393	551,380	314,633	223,430	199,272	24,158	179,049	27,568	50,632	13,029	50,096	6,435	10,122	12,809	8,357	(NA)	18,549	2,872	
December <sup>f</sup> . . . . .	708,777	553,955	315,002	225,275	200,505	24,770	178,306	25,926	51,604	12,764	50,623	6,586	10,001	13,040	7,762	(NA)	22,617	2,626	
2001: January <sup>f</sup> . . . . .	709,814	550,532	316,797	229,349	204,341	25,008	181,953	28,995	50,406	12,812	51,582	6,656	10,439	13,109	7,955	(NA)	18,954	2,469	
February <sup>f</sup> . . . . .	711,412	552,520	325,182	233,799	208,158	25,641	178,609	26,805	48,369	12,998	52,905	6,810	10,073	12,617	8,032	(NA)	17,882	2,577	
March <sup>f</sup> . . . . .	712,678	551,286	320,722	230,953	205,795	25,158	181,352	28,289	50,110	12,217	52,313	6,844	10,211	12,952	8,417	(NA)	16,933	2,267	
April <sup>f</sup> . . . . .	716,029	551,191	323,015	231,503	206,466	25,038	175,628	26,898	46,640	12,032	52,523	7,034	10,167	12,427	7,906	(NA)	18,588	2,317	
May <sup>f</sup> . . . . .	711,763	544,487	319,685	232,528	206,949	25,579	168,030	24,174	43,605	12,039	50,521	6,914	9,923	12,847	8,007	(NA)	20,325	2,392	
June <sup>f</sup> . . . . .	713,399	550,625	323,882	233,377	207,958	25,419	171,339	25,637	45,491	12,392	49,653	7,214	9,949	12,790	8,213	(NA)	17,331	2,517	
July <sup>f</sup> . . . . .	706,674	544,590	320,979	233,747	208,455	25,292	168,370	25,029	42,961	12,618	50,575	7,231	9,730	12,586	7,639	(NA)	16,826	2,845	
August <sup>f</sup> . . . . .	700,283	542,067	323,976	233,485	208,103	25,383	161,528	23,988	39,808	12,060	48,863	7,130	10,222	12,100	7,356	(NA)	16,930	2,748	
September <sup>f</sup> . . . . .	696,376	538,850	324,383	232,191	207,068	25,123	158,499	23,587	38,743	11,799	48,060	6,850	10,657	12,095	6,706	(NA)	16,882	2,829	
October <sup>f</sup> . . . . .	692,794	531,338	321,061	230,405	205,345	25,060	156,033	20,196	39,195	11,150	47,996	6,575	11,268	12,420	7,232	(NA)	16,149	2,566	
November <sup>f</sup> . . . . .	691,484	526,856	321,705	230,022	203,855	26,167	152,088	18,424	37,419	10,922	48,018	6,732	11,400	11,869	7,304	(NA)	16,044	2,614	
December <sup>f</sup> . . . . .	694,083	527,116	322,101	230,738	203,904	26,833	150,989	18,846	36,066	10,361	47,519	6,627	11,716	12,492	7,362	(NA)	16,976	2,689	
2002: January <sup>f</sup> . . . . .	709,933	536,341	328,937	234,038	205,184	28,854	152,142	17,118	36,195	10,050	50,255	6,891	11,658	12,589	7,387	(NA)	15,837	2,549	
February <sup>f</sup> . . . . .	720,947	542,691	337,812	240,048	212,387	27,661	149,925	16,000	34,106	9,965	50,305	7,102	11,806	13,244	7,398	(NA)	15,936	2,773	
March <sup>f</sup> . . . . .	705,281	538,997	337,257	240,755	213,309	27,446	146,348	15,134	33,576	9,377	49,868	7,207	11,436	13,113	6,638	(NA)	15,338	2,710	
April <sup>f</sup> . . . . .	707,147	541,359	339,425	242,618	213,028	29,591	145,922	14,368	32,856	9,400	49,963	7,069	11,997	13,329	6,939	(NA)	14,886	2,796	
May <sup>p</sup> . . . . .	700,992	532,518	336,578	242,423	212,850	29,573	141,108	13,839	30,647	9,167	48,420	7,158	10,943	13,786	7,148	(NA)	(NA)	2,631	
<b>PERCENT CHANGE</b>																			
April 2002-																			
May 2002 . . . . .	-1	-2	-1	(Z)	(Z)	(Z)	-3	-4	-7	-2	-3	1	-9	3	3	(NA)	(NA)	-6	

See footnotes at end of table.

Table 5a. **Monthly Value of Construction Put in Place: May 2000-May 2002—Seasonally Adjusted Annual Rate in 1996 Dollars—Con.**

[Millions of dollars]

Period	Public construction												
	Total	Buildings						Highways and streets	Military facilities	Conservation and development	Sewer systems	Water supply facilities	Miscellaneous public <sup>7</sup>
		Total	Housing and redevelopment	Industrial	Educational	Hospital	Other public buildings <sup>6</sup>						
2000: May <sup>f</sup> . . . . .	154,111	75,743	3,600	965	42,735	3,773	24,669	42,395	2,062	4,902	8,150	5,431	15,429
June <sup>f</sup> . . . . .	148,297	75,075	3,771	972	42,417	3,599	24,316	38,226	1,954	5,375	8,471	4,946	14,251
July <sup>f</sup> . . . . .	146,110	73,067	3,683	995	40,542	3,587	24,259	40,212	1,898	4,824	7,692	4,561	13,857
August <sup>f</sup> . . . . .	153,159	75,094	3,970	1,133	41,641	3,582	24,768	43,384	2,092	5,097	7,770	5,453	14,269
September <sup>f</sup> . . . . .	157,997	75,982	3,806	948	42,635	3,667	24,927	45,295	2,216	5,722	7,583	5,423	15,776
October <sup>f</sup> . . . . .	154,851	77,125	3,993	853	42,481	3,346	26,451	39,618	1,831	6,098	7,656	5,354	17,170
November <sup>f</sup> . . . . .	153,013	75,579	4,038	955	42,430	3,584	24,573	40,022	2,770	5,119	7,672	5,343	16,507
December <sup>f</sup> . . . . .	154,821	77,851	3,909	975	45,065	3,024	24,879	41,534	2,080	5,843	7,534	5,367	14,613
2001: January <sup>f</sup> . . . . .	159,282	77,945	4,126	1,350	44,065	3,232	25,173	43,100	2,391	6,677	7,953	5,508	15,707
February <sup>f</sup> . . . . .	158,892	77,019	3,979	1,138	43,643	3,209	25,049	44,294	2,248	6,825	7,982	5,750	14,776
March <sup>f</sup> . . . . .	161,392	78,031	3,817	1,150	44,778	3,048	25,239	46,753	2,081	6,720	7,788	6,125	13,894
April <sup>f</sup> . . . . .	164,838	80,565	3,904	1,364	45,778	3,191	26,329	47,385	2,737	5,904	8,128	6,358	13,762
May <sup>f</sup> . . . . .	167,276	80,754	4,053	1,136	46,126	3,342	26,097	48,929	2,309	6,634	8,043	6,010	14,597
June <sup>f</sup> . . . . .	162,774	78,516	3,971	1,203	43,535	3,563	26,245	48,351	2,467	5,844	7,712	6,452	13,434
July <sup>f</sup> . . . . .	162,084	80,229	3,676	1,217	46,905	3,386	25,046	47,370	2,340	5,732	7,548	6,166	12,697
August <sup>f</sup> . . . . .	158,216	80,073	3,691	1,247	46,988	3,470	24,676	43,081	2,600	6,249	7,800	6,154	12,260
September <sup>f</sup> . . . . .	157,526	80,632	3,687	1,563	46,766	3,449	25,167	41,856	2,423	6,748	7,346	6,417	12,104
October <sup>f</sup> . . . . .	161,456	82,891	4,091	861	48,656	3,305	25,978	43,262	2,401	6,457	7,660	5,768	13,017
November <sup>f</sup> . . . . .	164,629	82,249	4,082	1,163	47,865	3,400	25,740	45,341	2,352	6,381	8,267	6,325	13,714
December <sup>f</sup> . . . . .	166,967	83,575	4,292	1,890	47,574	3,592	26,227	45,624	2,105	6,621	7,881	6,488	14,675
2002: January <sup>f</sup> . . . . .	173,592	85,756	4,032	1,205	50,043	4,405	26,072	51,098	2,043	7,259	8,484	6,187	12,765
February <sup>f</sup> . . . . .	178,255	89,075	4,226	1,899	52,259	4,147	26,543	50,845	2,080	7,671	8,755	6,099	13,730
March <sup>f</sup> . . . . .	166,284	85,174	3,917	1,538	49,897	4,113	25,710	43,357	2,147	7,734	8,304	5,897	13,670
April <sup>f</sup> . . . . .	165,787	85,862	4,397	1,713	51,201	4,159	24,391	42,596	2,229	7,031	8,278	5,899	13,892
May <sup>p</sup> . . . . .	168,474	88,540	4,568	1,695	53,282	4,236	24,758	42,296	2,287	6,687	8,377	5,942	14,345
<b>PERCENT CHANGE</b>													
April 2002- May 2002 . . . . .	2	3	4	-1	4	2	2	-1	3	-5	1	1	3

NA Not available, but estimates are included in totals. <sup>p</sup>Preliminary. <sup>r</sup>Revised. Z Less than 0.5 percent.

<sup>1</sup>Includes farm nonresidential and other private categories, not shown separately. <sup>2</sup>Includes residential improvements, not shown separately. <sup>3</sup>Includes amusement and recreational buildings, bus and airline terminals, animal hospitals and shelters, etc. <sup>4</sup>Includes gas, electric, railroad, and petroleum pipelines, not shown separately. <sup>5</sup>Includes privately owned streets and bridges, parking areas, sewer and water facilities, parks and playgrounds, golf courses, airfields, etc. <sup>6</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, civic centers, passenger terminals, space facilities, postal facilities, etc. <sup>7</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc.

**Table 5b. Monthly Value of Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in 1996 Dollars**

[Millions of dollars]

Type of construction	1998											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	643,190	646,600	652,237	662,234	656,559	679,680	675,505	670,822	670,292	667,973	673,420	674,212
<b>Private construction</b> .....	503,141	507,975	513,607	522,741	518,626	532,008	526,256	524,579	520,241	518,957	523,839	522,120
Residential buildings .....	292,434	295,883	299,044	300,239	297,839	298,537	300,566	297,816	299,096	297,613	299,058	298,355
New housing units .....	198,474	201,642	204,226	206,659	205,966	209,570	214,133	214,861	218,307	220,035	222,277	223,482
1 unit .....	174,427	177,471	180,654	183,226	183,449	187,080	190,585	192,710	194,943	196,131	198,767	200,270
2 units or more .....	24,047	24,171	23,573	23,434	22,517	22,490	23,549	22,150	23,364	23,903	23,510	23,212
Improvements .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	173,375	173,427	175,200	179,710	174,772	180,924	177,193	178,510	175,225	179,472	181,973	182,627
Industrial .....	37,763	38,319	39,904	39,506	37,693	37,813	37,019	39,809	36,769	37,001	36,910	35,104
Office .....	38,345	37,729	37,279	38,652	38,562	41,328	38,782	37,605	37,997	41,094	41,830	42,729
Hotels, motels .....	12,187	12,027	12,086	12,849	12,486	13,989	13,913	14,780	15,423	15,448	15,108	14,725
Other commercial .....	48,595	48,077	49,576	50,283	49,360	51,130	51,202	49,476	48,295	49,841	51,296	51,719
Religious .....	6,126	6,306	5,901	5,770	5,524	5,939	6,141	6,230	6,150	6,221	6,612	6,543
Educational .....	9,330	9,816	9,845	10,082	9,749	8,731	7,971	8,316	8,864	8,320	8,777	9,388
Hospital and institutional .....	12,656	12,769	12,793	13,389	12,861	13,028	13,012	12,903	12,886	12,391	12,497	13,068
Miscellaneous <sup>1</sup> .....	8,372	8,385	7,814	9,178	8,537	8,966	9,153	9,393	8,840	9,155	8,942	9,350
Farm nonresidential .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	11,398	12,404	13,056	12,057	12,755	12,156	11,891	12,203	12,090	12,731	11,983	11,511
Railroads .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,452	2,462	2,399	2,319	2,412	2,914	2,322	2,477	2,406	2,307	2,571	2,318
<b>Public construction</b> .....	140,049	138,625	138,630	139,493	137,933	147,672	149,249	146,243	150,051	149,016	149,581	152,092
Buildings .....	64,395	64,791	64,205	65,344	65,162	67,956	70,718	68,383	69,200	68,826	69,173	70,952
Housing and redevelopment .....	4,513	4,656	4,762	4,817	4,686	5,201	5,856	5,100	4,717	4,773	4,985	4,838
Industrial .....	911	1,009	1,127	961	924	824	966	989	913	735	1,078	887
Educational .....	31,447	31,497	30,382	31,993	31,987	33,263	33,791	32,297	33,122	32,604	33,163	35,072
Hospital .....	3,925	3,666	4,183	3,348	3,787	3,463	3,464	3,554	3,736	3,906	3,530	3,407
Other <sup>3</sup> .....	23,599	23,964	23,751	24,225	23,778	25,206	26,641	26,443	26,711	26,809	26,416	26,748
Highways and streets .....	41,612	40,469	41,414	41,712	40,360	43,644	41,581	42,087	43,122	44,580	42,468	42,197
Military facilities .....	2,368	2,603	2,616	2,462	2,221	2,446	3,060	2,609	1,957	2,135	2,045	2,112
Conservation and development .....	4,770	5,802	5,225	4,628	4,820	5,460	5,162	5,075	5,874	4,855	5,433	5,352
Other public construction .....	26,904	24,959	25,169	25,348	25,370	28,166	28,728	28,089	29,899	28,619	30,461	31,478
Sewer systems .....	8,991	8,876	8,807	8,668	8,626	9,158	9,826	9,691	9,814	10,146	10,679	10,664
Water supply facilities .....	5,940	5,935	5,751	5,937	6,006	5,906	6,260	6,365	6,956	7,025	7,038	7,393
Miscellaneous public <sup>4</sup> .....	11,972	10,148	10,611	10,744	10,739	13,102	12,642	12,033	13,129	11,448	12,745	13,422

See footnotes at end of table.

Table 5b. **Monthly Value of Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in 1996**  
**Dollars—Con.**

[Millions of dollars]

Type of construction	1999											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	680,543	697,867	695,201	684,825	679,807	683,567	694,257	688,269	693,803	698,595	714,545	724,022
<b>Private construction</b> .....	526,640	538,834	538,905	529,385	527,367	533,301	541,565	536,757	541,874	546,139	556,537	562,745
Residential buildings .....	300,971	304,747	307,859	307,714	309,818	311,570	315,317	319,998	323,937	328,462	332,661	337,095
New housing units .....	225,518	226,936	227,781	226,558	225,802	224,837	225,157	226,705	227,409	228,633	231,504	236,226
1 unit .....	201,052	201,728	202,388	201,460	201,254	200,499	200,431	201,201	202,282	203,973	206,968	211,270
2 units or more .....	24,466	25,208	25,393	25,098	24,548	24,338	24,727	25,503	25,128	24,660	24,536	24,956
Improvements .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	179,603	182,716	179,589	175,997	174,384	171,701	172,372	169,428	170,522	168,237	170,294	170,274
Industrial .....	34,394	33,482	32,153	30,332	29,423	29,006	29,645	28,214	27,536	25,991	25,773	26,458
Office .....	42,845	44,411	42,645	41,754	41,782	42,371	41,764	43,173	44,227	43,346	41,458	41,109
Hotels, motels .....	15,611	16,323	15,500	14,638	14,506	13,515	14,171	13,326	13,137	13,585	13,741	13,810
Other commercial .....	49,741	50,741	51,770	51,226	51,822	50,559	50,680	49,268	50,092	49,467	53,430	52,113
Religious .....	7,098	6,836	6,681	6,821	6,750	6,790	6,712	6,519	6,135	6,623	6,199	6,332
Educational .....	8,018	8,352	8,703	9,424	8,314	8,781	8,644	8,341	8,319	8,517	8,836	9,245
Hospital and institutional .....	12,287	12,791	12,462	12,233	12,229	11,824	11,850	11,859	12,121	12,055	11,887	11,721
Miscellaneous <sup>1</sup> .....	9,609	9,781	9,674	9,570	9,557	8,854	8,907	8,728	8,955	8,652	8,970	9,487
Farm nonresidential .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	13,069	13,988	17,316	17,586	16,458	16,628	19,342	19,555	19,282	20,563	21,079	21,435
Railroads .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,231	2,339	2,661	3,032	2,764	2,644	2,572	2,280	2,273	2,156	2,452	2,701
<b>Public construction</b> .....	153,903	159,033	156,295	155,440	152,441	150,266	152,692	151,511	151,929	152,456	158,008	161,277
Buildings .....	69,566	71,883	72,110	71,982	70,069	71,229	71,288	72,300	72,573	72,657	73,713	73,472
Housing and redevelopment .....	4,514	4,533	4,758	4,675	4,665	4,103	4,145	4,279	4,058	3,756	3,583	3,715
Industrial .....	765	842	931	845	936	759	955	761	888	531	769	897
Educational .....	35,350	36,010	36,370	38,121	36,627	38,496	37,386	38,167	39,131	38,902	40,015	39,196
Hospital .....	3,674	4,347	3,520	3,220	3,602	3,576	3,678	3,512	3,559	3,556	3,564	3,494
Other <sup>3</sup> .....	25,263	26,152	26,531	25,120	24,239	24,295	25,124	25,581	24,938	25,911	25,783	26,169
Highways and streets .....	45,947	47,974	45,689	45,156	45,180	42,098	43,938	42,267	44,104	43,088	47,064	49,343
Military facilities .....	1,755	2,235	2,026	2,071	1,935	1,931	2,068	1,475	1,775	1,958	1,787	2,141
Conservation and development .....	5,538	5,861	5,557	5,339	4,982	5,351	5,461	6,061	5,809	5,543	6,128	6,409
Other public construction .....	31,097	31,080	30,915	30,891	30,275	29,657	29,937	29,408	27,669	29,210	29,315	29,912
Sewer systems .....	10,346	9,930	10,237	9,573	9,509	9,345	9,307	8,730	8,494	8,406	8,390	9,081
Water supply facilities .....	6,732	6,892	7,062	6,420	6,309	6,327	6,492	6,214	5,826	5,323	5,384	5,252
Miscellaneous public <sup>4</sup> .....	14,018	14,259	13,617	14,898	14,457	13,985	14,139	14,464	13,350	15,480	15,541	15,579

See footnotes at end of table.

Table 5b. **Monthly Value of Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in 1996**  
**Dollars—Con.**

[Millions of dollars]

Type of construction	2000											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	724,107	729,480	738,006	725,661	713,984	703,940	691,681	701,025	709,170	707,770	704,393	708,777
<b>Private construction</b> .....	558,081	572,390	573,086	566,207	559,873	555,643	545,571	547,866	551,173	552,919	551,380	553,955
Residential buildings .....	337,953	341,773	339,647	338,572	327,843	325,768	315,844	314,990	312,336	316,680	314,633	315,002
New housing units .....	238,311	238,003	238,219	236,779	233,865	230,632	225,188	223,129	222,616	222,553	223,430	225,275
1 unit .....	213,044	213,846	212,163	210,799	208,949	205,806	202,099	199,978	199,228	198,997	199,272	200,505
2 units or more .....	25,267	24,157	26,056	25,980	24,915	24,826	23,089	23,151	23,388	23,556	24,158	24,770
Improvements .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	169,667	176,827	178,518	176,216	179,624	178,803	177,901	179,945	180,434	179,738	179,049	178,306
Industrial .....	25,598	26,078	27,460	27,410	28,573	28,455	27,804	27,221	26,689	26,910	27,568	25,926
Office .....	41,054	42,707	45,575	46,418	47,212	46,900	47,370	48,758	50,841	49,730	50,632	51,604
Hotels, motels .....	14,681	14,094	14,929	14,661	14,431	14,134	14,060	13,499	13,595	13,323	13,029	12,764
Other commercial .....	51,721	56,030	52,365	50,906	51,262	51,576	50,418	51,697	51,783	51,848	50,096	50,623
Religious .....	6,677	6,927	7,075	6,816	6,794	7,183	7,366	6,722	6,781	6,844	6,435	6,586
Educational .....	9,126	9,582	9,702	9,235	10,048	9,291	9,540	10,358	9,513	10,061	10,122	10,001
Hospital and institutional .....	11,546	11,770	11,872	12,052	12,020	12,319	12,647	12,605	12,641	12,703	12,809	13,040
Miscellaneous <sup>1</sup> .....	9,265	9,638	9,541	8,719	9,285	8,945	8,696	9,083	8,591	8,321	8,357	7,762
Farm nonresidential .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	18,878	16,106	18,398	16,518	17,441	18,430	17,022	16,597	21,260	17,485	18,549	22,617
Railroads .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,231	2,633	2,636	2,404	2,398	2,475	2,431	2,793	2,880	2,847	2,872	2,626
<b>Public construction</b> .....	166,026	157,090	164,920	159,453	154,111	148,297	146,110	153,159	157,997	154,851	153,013	154,821
Buildings .....	76,151	76,676	76,654	75,472	75,743	75,075	73,067	75,094	75,982	77,125	75,579	77,851
Housing and redevelopment .....	3,328	3,274	3,610	3,635	3,600	3,771	3,683	3,970	3,806	3,993	4,038	3,909
Industrial .....	1,053	1,116	965	967	965	972	995	1,133	948	853	955	975
Educational .....	42,753	43,963	43,946	41,933	42,735	42,417	40,542	41,641	42,635	42,481	42,430	45,065
Hospital .....	3,641	3,458	3,332	3,845	3,773	3,599	3,587	3,582	3,667	3,346	3,584	3,024
Other <sup>3</sup> .....	25,375	24,865	24,802	25,092	24,669	24,316	24,259	24,768	24,927	26,451	24,573	24,879
Highways and streets .....	53,855	42,121	48,279	46,710	42,395	38,226	40,212	43,384	45,295	39,618	40,022	41,534
Military facilities .....	1,584	2,548	2,167	1,975	2,062	1,954	1,898	2,092	2,216	1,831	2,770	2,080
Conservation and development .....	5,855	6,125	5,714	5,648	4,902	5,375	4,824	5,097	5,722	6,098	5,119	5,843
Other public construction .....	28,582	29,620	32,106	29,649	29,010	27,668	26,109	27,492	28,782	30,180	29,523	27,513
Sewer systems .....	8,129	8,214	8,189	8,940	8,150	8,471	7,692	7,770	7,583	7,656	7,672	7,534
Water supply facilities .....	5,852	5,732	5,391	5,304	5,431	4,946	4,561	5,453	5,423	5,354	5,343	5,367
Miscellaneous public <sup>4</sup> .....	14,601	15,673	18,526	15,404	15,429	14,251	13,857	14,269	15,776	17,170	16,507	14,613

See footnotes at end of table.

Table 5b. **Monthly Value of Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in 1996**  
**Dollars—Con.**

[Millions of dollars]

Type of construction	2001											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	709,814	711,412	712,678	716,029	711,763	713,399	706,674	700,283	696,376	692,794	691,484	694,083
<b>Private construction</b> .....	550,532	552,520	551,286	551,191	544,487	550,625	544,590	542,067	538,850	531,338	526,856	527,116
Residential buildings .....	316,797	325,182	320,722	323,015	319,685	323,882	320,979	323,976	324,383	321,061	321,705	322,101
New housing units .....	229,349	233,799	230,953	231,503	232,528	233,777	233,747	233,485	232,191	230,405	230,022	230,738
1 unit .....	204,341	208,158	205,795	206,466	206,949	207,958	208,455	208,103	207,068	205,345	203,855	203,904
2 units or more .....	25,008	25,641	25,158	25,038	25,579	25,419	25,292	25,383	25,123	25,060	26,167	26,833
Improvements .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	181,953	178,609	181,352	175,628	168,030	171,339	168,370	161,528	158,499	156,033	152,088	150,989
Industrial .....	28,995	26,805	28,289	26,898	24,174	25,637	25,029	23,988	23,587	20,196	18,424	18,846
Office .....	50,406	48,369	50,110	46,640	43,605	45,491	42,961	39,808	38,743	39,195	37,419	36,066
Hotels, motels .....	12,812	12,998	12,217	12,032	12,039	12,392	12,618	12,060	11,799	11,150	10,922	10,361
Other commercial .....	51,582	52,905	52,313	52,523	50,521	49,653	50,575	48,863	48,060	47,996	48,018	47,519
Religious .....	6,656	6,810	6,844	7,034	6,914	7,214	7,231	7,130	6,850	6,575	6,732	6,627
Educational .....	10,439	10,073	10,211	10,167	9,923	9,949	9,730	10,222	10,657	11,268	11,400	11,716
Hospital and institutional .....	13,109	12,617	12,952	12,427	12,847	12,790	12,586	12,100	12,095	12,420	11,869	12,492
Miscellaneous <sup>1</sup> .....	7,955	8,032	8,417	7,906	8,007	8,213	7,639	7,356	6,706	7,232	7,304	7,362
Farm nonresidential .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	18,954	17,882	16,933	18,588	20,325	17,331	16,826	16,930	16,882	16,149	16,044	16,976
Railroads .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,469	2,577	2,267	2,317	2,392	2,517	2,845	2,748	2,829	2,566	2,614	2,689
<b>Public construction</b> .....	159,282	158,892	161,392	164,838	167,276	162,774	162,084	158,216	157,526	161,456	164,629	166,967
Buildings .....	77,945	77,019	78,031	80,565	80,754	78,516	80,229	80,073	80,632	82,891	82,249	83,575
Housing and redevelopment .....	4,126	3,979	3,817	3,904	4,053	3,971	3,676	3,691	3,687	4,091	4,082	4,292
Industrial .....	1,350	1,138	1,150	1,364	1,136	1,203	1,217	1,247	1,563	861	1,163	1,890
Educational .....	44,065	43,643	44,778	45,778	46,126	43,535	46,905	46,988	46,766	48,656	47,865	47,574
Hospital .....	3,232	3,209	3,048	3,191	3,342	3,563	3,386	3,470	3,449	3,305	3,400	3,592
Other <sup>3</sup> .....	25,173	25,049	25,239	26,329	26,097	26,245	25,046	24,676	25,167	25,978	25,740	26,227
Highways and streets .....	43,100	44,294	46,753	47,385	48,929	48,351	47,370	43,081	41,856	43,262	45,341	45,624
Military facilities .....	2,391	2,248	2,081	2,737	2,309	2,467	2,340	2,600	2,423	2,401	2,352	2,105
Conservation and development .....	6,677	6,825	6,720	5,904	6,634	5,844	5,732	6,249	6,748	6,457	6,381	6,621
Other public construction .....	29,168	28,507	27,807	28,247	28,651	27,597	26,411	26,214	25,867	26,444	28,306	29,043
Sewer systems .....	7,953	7,982	7,788	8,128	8,043	7,712	7,548	7,800	7,346	7,660	8,267	7,881
Water supply facilities .....	5,508	5,750	6,125	6,358	6,010	6,452	6,166	6,154	6,417	5,768	6,325	6,488
Miscellaneous public <sup>4</sup> .....	15,707	14,776	13,894	13,762	14,597	13,434	12,697	12,260	12,104	13,017	13,714	14,675

NA Not available, but estimates are included in total.

<sup>1</sup>Includes amusement and recreational buildings, bus and airline terminals, animal hospitals and shelters, etc. <sup>2</sup>Includes privately owned streets and bridges, parking areas, sewer and water facilities, parks and playgrounds, golf courses, airfields, etc. <sup>3</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, civic centers, passenger terminals, space facilities, postal facilities, etc.

<sup>4</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc.

Table 6a. Monthly Value of Construction Put in Place: May 2000-May 2002—Not Seasonally Adjusted in 1996 Dollars

[Millions of dollars]

Period	Total construction	Private construction															All other private <sup>5</sup>		
		Total <sup>1</sup>	Residential buildings					Nonresidential buildings										Public utilities <sup>4</sup>	
			Total <sup>2</sup>	New housing units				Total	Industrial	Office	Hotels, motels	Other commercial	Religious	Educational	Hospital and institutional	Miscellaneous <sup>3</sup>		Total	Telecommunications
				Total	1 unit	2 units or more													
<b>YEAR TO DATE</b>																			
May 2001	267,411	209,285	119,959	87,914	77,808	10,105	69,880	10,540	19,369	5,090	19,848	2,667	3,871	5,228	3,264	(NA)	7,122	878	
May 2002	264,351	203,779	125,324	91,086	79,636	11,451	57,845	5,958	13,579	3,898	19,003	2,737	4,413	5,393	2,866	(NA)	(NA)	986	
Percent change	-1	-3	4	4	2	13	-17	-43	-30	-23	-4	3	14	3	-12	(NA)	(NA)	12	
<b>MONTHLY DATA</b>																			
2000: May <sup>f</sup>	61,798	48,830	29,081	20,200	18,022	2,178	15,284	2,395	4,139	1,219	4,315	546	868	1,014	788	(NA)	1,488	191	
June <sup>f</sup>	64,454	50,548	30,429	20,875	18,660	2,216	15,522	2,452	4,022	1,236	4,534	593	890	1,033	763	(NA)	1,640	208	
July <sup>f</sup>	63,545	49,741	29,661	20,897	18,896	2,001	15,302	2,338	3,967	1,183	4,500	612	935	1,031	736	(NA)	1,363	218	
August <sup>f</sup>	67,024	51,129	30,003	20,955	18,898	2,057	16,078	2,400	4,230	1,171	4,773	625	1,027	1,073	780	(NA)	1,539	272	
September <sup>f</sup>	66,312	50,393	29,302	20,487	18,495	1,992	15,925	2,373	4,377	1,129	4,781	603	844	1,080	739	(NA)	1,837	270	
October <sup>f</sup>	64,596	50,114	29,168	20,030	17,993	2,038	15,907	2,408	4,302	1,127	4,757	645	839	1,101	728	(NA)	1,591	272	
November <sup>f</sup>	60,574	47,711	27,377	19,405	17,353	2,051	15,320	2,357	4,316	1,106	4,325	588	811	1,104	712	(NA)	1,686	252	
December <sup>f</sup>	52,989	41,852	22,501	16,721	14,771	1,951	14,253	2,217	4,107	1,022	3,944	524	738	1,074	627	(NA)	1,947	225	
2001: January <sup>f</sup>	48,864	38,604	21,566	15,824	13,946	1,878	13,595	2,179	3,915	1,011	3,628	509	732	1,027	593	(NA)	1,327	174	
February <sup>f</sup>	46,853	36,867	20,231	15,365	13,461	1,904	13,311	1,972	3,720	1,017	3,778	505	708	995	615	(NA)	1,247	174	
March <sup>f</sup>	53,314	42,236	24,106	17,882	15,863	2,019	14,353	2,216	4,059	1,023	3,989	531	768	1,071	696	(NA)	1,360	166	
April <sup>f</sup>	56,675	44,074	25,704	18,749	16,689	2,059	14,303	2,138	3,863	1,012	4,197	555	806	1,053	679	(NA)	1,450	174	
May <sup>f</sup>	61,705	47,504	28,352	20,094	17,849	2,245	14,318	2,035	3,812	1,027	4,256	567	857	1,082	681	(NA)	1,738	190	
June <sup>f</sup>	65,172	49,959	30,237	21,141	18,890	2,252	14,810	2,213	3,874	1,055	4,361	581	950	1,074	701	(NA)	1,489	212	
July <sup>f</sup>	65,487	49,908	30,171	21,746	19,560	2,186	14,579	2,155	3,619	1,065	4,510	608	949	1,027	646	(NA)	1,406	255	
August <sup>f</sup>	66,970	50,563	30,780	21,942	19,683	2,259	14,408	2,091	3,453	1,032	4,516	640	1,014	1,029	633	(NA)	1,587	269	
September <sup>f</sup>	64,926	49,201	30,374	21,416	19,275	2,142	13,992	2,084	3,306	983	4,446	619	945	1,033	576	(NA)	1,377	266	
October <sup>f</sup>	63,818	48,691	29,905	20,847	18,652	2,195	13,861	1,818	3,426	951	4,396	617	943	1,076	633	(NA)	1,531	245	
November <sup>f</sup>	59,346	45,552	27,885	19,931	17,735	2,196	13,000	1,578	3,190	918	4,150	605	914	1,023	621	(NA)	1,483	230	
December <sup>f</sup>	51,616	39,622	22,994	17,071	14,953	2,118	12,058	1,592	2,873	851	3,706	542	868	1,029	596	(NA)	1,444	231	
2002: January <sup>f</sup>	48,431	37,286	22,312	16,168	13,987	2,181	11,319	1,285	2,817	794	3,535	537	822	979	550	(NA)	1,109	179	
February <sup>f</sup>	47,060	35,909	20,981	15,750	13,699	2,052	11,158	1,177	2,632	781	3,597	526	836	1,043	567	(NA)	1,118	188	
March <sup>f</sup>	52,263	40,935	25,225	18,558	16,371	2,187	11,506	1,192	2,720	753	3,807	542	861	1,084	548	(NA)	1,185	200	
April <sup>f</sup>	56,131	43,465	27,194	19,684	17,238	2,446	11,945	1,161	2,754	801	3,997	565	951	1,123	592	(NA)	1,200	211	
May <sup>p</sup>	60,466	46,184	29,612	20,926	18,341	2,585	11,917	1,143	2,656	769	4,067	567	943	1,164	609	(NA)	(NA)	208	
<b>PERCENT CHANGE</b>																			
April 2002-May 2002	8	6	9	6	6	6	(Z)	-2	-4	-4	2	(Z)	-1	4	3	(NA)	(NA)	-1	

See footnotes at end of table.



Table 6a. **Monthly Value of Construction Put in Place: May 2000-May 2002—Not Seasonally Adjusted in 1996 Dollars—Con.**

[Millions of dollars]

Period	Public construction												
	Total	Buildings						Highways and streets	Military facilities	Conservation and development	Sewer systems	Water supply facilities	Miscellaneous public <sup>7</sup>
		Total	Housing and redevelopment	Industrial	Educational	Hospital	Other public buildings <sup>6</sup>						
<b>YEAR TO DATE</b>													
May 2001	58,127	29,820	1,589	484	16,326	1,280	10,143	14,317	933	2,480	3,002	2,255	5,318
May 2002	60,572	32,770	1,675	636	18,719	1,684	10,056	13,720	857	2,764	3,157	2,257	5,047
Percent change	4	10	5	31	15	32	-1	-4	-8	11	5	(Z)	-5
<b>MONTHLY DATA</b>													
2000: May <sup>f</sup>	12,967	6,237	309	77	3,444	318	2,088	3,678	173	408	696	469	1,307
June <sup>f</sup>	13,906	6,819	325	83	3,962	318	2,131	3,979	170	466	772	431	1,270
July <sup>f</sup>	13,803	6,776	306	84	4,057	298	2,031	4,138	162	396	679	413	1,240
August <sup>f</sup>	15,895	7,352	332	93	4,424	303	2,201	5,260	181	474	730	498	1,400
September <sup>f</sup>	15,918	7,116	346	106	4,072	339	2,253	5,050	232	710	715	498	1,597
October <sup>f</sup>	14,481	6,788	359	63	3,735	292	2,339	4,275	125	431	724	521	1,618
November <sup>f</sup>	12,863	6,206	344	78	3,366	302	2,116	3,432	238	436	670	472	1,410
December <sup>f</sup>	11,137	5,952	319	84	3,343	244	1,963	2,492	178	451	559	410	1,095
2001: January <sup>f</sup>	10,261	5,576	317	103	3,037	253	1,866	2,058	182	476	548	372	1,048
February <sup>f</sup>	9,986	5,419	295	85	2,939	242	1,859	2,004	163	483	535	399	981
March <sup>f</sup>	11,078	5,783	304	95	3,146	245	1,994	2,583	178	520	582	444	988
April <sup>f</sup>	12,601	6,363	326	111	3,487	258	2,181	3,325	216	455	651	519	1,073
May <sup>f</sup>	14,201	6,679	347	90	3,717	282	2,243	4,347	194	546	686	521	1,228
June <sup>f</sup>	15,213	7,088	343	104	4,067	311	2,264	4,948	214	503	702	563	1,195
July <sup>f</sup>	15,579	7,515	305	103	4,698	286	2,123	5,013	199	481	669	558	1,143
August <sup>f</sup>	16,407	7,884	310	103	4,996	294	2,181	5,202	225	593	733	563	1,207
September <sup>f</sup>	15,725	7,538	333	174	4,467	316	2,249	4,629	253	804	693	589	1,219
October <sup>f</sup>	15,127	7,292	363	63	4,273	293	2,300	4,723	162	461	723	560	1,205
November <sup>f</sup>	13,794	6,747	348	95	3,797	287	2,220	3,850	203	545	720	556	1,173
December <sup>f</sup>	11,993	6,394	350	162	3,525	289	2,068	2,734	181	506	584	495	1,100
2002: January <sup>f</sup>	11,145	6,165	306	92	3,466	345	1,956	2,465	154	513	584	418	845
February <sup>f</sup>	11,151	6,257	308	142	3,528	313	1,965	2,280	150	543	586	419	917
March <sup>f</sup>	11,328	6,254	307	126	3,514	322	1,985	2,283	183	592	615	428	973
April <sup>f</sup>	12,667	6,783	363	140	3,900	344	2,037	2,921	176	556	659	478	1,093
May <sup>p</sup>	14,281	7,311	391	136	4,311	360	2,113	3,771	194	560	713	514	1,219
<b>PERCENT CHANGE</b>													
April 2002-													
May 2002	13	8	8	-3	11	5	4	29	10	1	8	8	12

NA Not available, but estimates are included in totals. <sup>p</sup>Preliminary. <sup>r</sup>Revised. Z Less than 0.5 percent.

<sup>1</sup>Includes farm nonresidential and other private categories, not shown separately. <sup>2</sup>Includes residential improvements, not shown separately. <sup>3</sup>Includes amusement and recreational buildings, bus and airline terminals, animal hospitals and shelters, etc. <sup>4</sup>Includes gas, electric, railroad, and petroleum pipelines, not shown separately. <sup>5</sup>Includes privately owned streets and bridges, parking areas, sewer and water facilities, parks and playgrounds, golf courses, airfields, etc. <sup>6</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, civic centers, passenger terminals, space facilities, postal facilities, etc. <sup>7</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc.



**Table 6b. Annual and Monthly Value of Construction Put in Place: 1998-2001—Not Seasonally Adjusted in 1996 Dollars**

[Millions of dollars]

Type of construction	1998												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	665,156	43,840	42,101	48,261	52,518	56,266	62,062	62,539	63,885	63,860	61,462	57,570	50,793
<b>Private construction</b> .....	519,859	35,111	33,502	38,862	41,808	44,792	48,270	48,106	48,914	48,403	47,330	45,058	39,703
Residential buildings .....	297,960	19,816	18,151	22,133	23,747	26,290	27,790	28,284	28,400	28,243	27,559	26,020	21,526
New housing units .....	212,068	13,630	13,141	15,638	16,705	17,600	18,849	19,914	20,202	20,299	20,028	19,366	16,697
1 unit .....	188,785	11,861	11,358	13,745	14,734	15,639	16,853	17,867	18,243	18,276	17,946	17,409	14,853
2 units or more .....	23,283	1,769	1,783	1,894	1,970	1,961	1,996	2,047	1,958	2,023	2,082	1,957	1,843
Improvements .....	85,892	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	177,644	12,798	12,875	13,842	14,637	14,691	15,704	15,273	15,760	15,741	15,933	15,514	14,876
Industrial .....	37,720	2,798	2,836	3,176	3,151	3,135	3,268	3,107	3,374	3,343	3,305	3,144	3,086
Office .....	39,333	2,956	2,918	3,007	3,227	3,326	3,506	3,287	3,228	3,328	3,538	3,556	3,457
Hotels, motels .....	13,794	945	935	1,005	1,089	1,030	1,231	1,195	1,260	1,303	1,325	1,241	1,234
Other commercial .....	49,915	3,390	3,401	3,751	3,985	4,126	4,504	4,553	4,597	4,536	4,606	4,437	4,030
Religious .....	6,139	457	462	459	465	435	490	504	560	568	590	592	556
Educational .....	9,039	646	690	742	800	835	847	794	829	787	686	698	683
Hospital and institutional .....	12,853	987	1,006	1,056	1,125	1,085	1,089	1,058	1,106	1,107	1,075	1,080	1,079
Miscellaneous <sup>1</sup> .....	8,850	620	628	645	795	720	769	776	805	768	808	767	750
Farm nonresidential .....	3,989	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	37,818	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	12,188	780	859	1,067	978	1,012	1,083	1,046	1,035	1,066	1,171	1,028	1,063
Railroads .....	5,463	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	11,883	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	7,072	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	1,213	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,447	179	166	179	177	195	247	207	234	222	221	226	193
<b>Public construction</b> .....	145,297	8,730	8,599	9,399	10,710	11,474	13,792	14,433	14,971	15,456	14,132	12,512	11,090
Buildings .....	67,517	4,619	4,581	4,800	5,179	5,373	6,181	6,550	6,554	6,515	6,008	5,674	5,484
Housing and redevelopment .....	4,913	345	341	371	396	389	450	497	423	443	433	426	399
Industrial .....	941	71	74	90	79	76	73	87	82	100	53	84	73
Educational .....	32,589	2,172	2,126	2,165	2,434	2,570	3,138	3,376	3,412	3,155	2,831	2,612	2,598
Hospital .....	3,656	295	275	339	272	309	311	299	290	371	324	287	282
Other <sup>3</sup> .....	25,418	1,735	1,764	1,836	1,997	2,029	2,210	2,291	2,346	2,446	2,368	2,265	2,132
Highways and streets .....	42,249	1,824	1,801	2,192	2,951	3,373	4,412	4,536	5,033	5,045	4,885	3,571	2,627
Military facilities .....	2,377	178	178	225	194	189	212	262	225	210	146	175	184
Conservation and development .....	5,237	322	397	390	367	400	474	457	477	732	363	448	412
Other public construction .....	27,916	1,786	1,642	1,793	2,020	2,139	2,514	2,628	2,683	2,954	2,730	2,644	2,383
Sewer systems .....	9,526	613	579	653	688	720	832	881	902	949	971	932	808
Water supply facilities .....	6,405	405	408	412	483	518	513	571	579	635	686	627	569
Miscellaneous public <sup>4</sup> .....	11,985	768	656	728	849	902	1,169	1,177	1,201	1,371	1,074	1,085	1,006

See footnotes at end of table.

Table 6b. **Annual and Monthly Value of Construction Put in Place: 1998-2001—Not Seasonally Adjusted in 1996**  
**Dollars—Con.**

[Millions of dollars]

Type of construction	1999												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> . . . . .	694,123	46,335	45,812	52,128	54,569	58,228	62,612	64,134	65,456	65,524	63,651	61,365	54,309
<b>Private construction</b> . . . . .	540,220	36,708	35,902	41,328	42,563	45,541	48,563	49,603	49,933	49,971	49,411	48,141	42,556
Residential buildings . . . . .	317,236	20,439	18,961	23,157	24,457	27,317	29,059	29,650	30,409	30,520	30,274	28,877	24,117
New housing units . . . . .	227,467	15,478	14,824	17,645	18,364	19,370	20,342	20,927	21,212	21,028	20,591	20,068	17,619
1 unit . . . . .	202,620	13,672	12,961	15,601	16,285	17,241	18,162	18,774	18,980	18,846	18,460	18,023	15,616
2 units or more . . . . .	24,848	1,806	1,863	2,044	2,079	2,130	2,180	2,153	2,232	2,182	2,131	2,045	2,003
Improvements . . . . .	89,769	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings . . . . .	173,429	13,270	13,631	14,282	14,431	14,684	14,929	14,905	15,037	15,148	14,769	14,616	13,729
Industrial . . . . .	29,206	2,554	2,469	2,559	2,447	2,403	2,548	2,512	2,459	2,437	2,298	2,244	2,275
Office . . . . .	42,552	3,278	3,412	3,479	3,497	3,611	3,619	3,536	3,706	3,848	3,702	3,538	3,326
Hotels, motels . . . . .	14,274	1,189	1,281	1,296	1,248	1,217	1,158	1,201	1,135	1,127	1,107	1,168	1,147
Other commercial . . . . .	50,870	3,490	3,624	3,943	4,094	4,353	4,449	4,523	4,557	4,625	4,551	4,604	4,056
Religious . . . . .	6,590	521	505	519	542	539	561	560	595	568	602	565	514
Educational . . . . .	8,621	559	588	654	746	718	845	851	826	737	708	708	680
Hospital and institutional . . . . .	12,102	962	1,007	1,029	1,034	1,033	991	966	1,011	1,035	1,044	1,024	965
Miscellaneous <sup>1</sup> . . . . .	9,214	717	744	802	825	810	757	755	747	772	757	765	764
Farm nonresidential . . . . .	4,519	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities . . . . .	42,534	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications . . . . .	18,305	863	976	1,429	1,464	1,288	1,467	1,639	1,744	1,692	1,818	1,934	1,992
Railroads . . . . .	4,311	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power . . . . .	13,892	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas . . . . .	4,625	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines . . . . .	1,401	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> . . . . .	2,501	159	158	196	229	221	223	231	220	213	206	216	230
<b>Public construction</b> . . . . .	153,904	9,628	9,911	10,800	12,006	12,687	14,049	14,530	15,523	15,553	14,240	13,224	11,753
Buildings . . . . .	71,928	4,975	5,083	5,392	5,710	5,763	6,437	6,614	7,011	6,838	6,372	6,057	5,675
Housing and redevelopment . . . . .	4,218	348	333	378	386	402	354	344	356	372	338	305	302
Industrial . . . . .	827	59	63	77	68	75	65	80	62	99	40	63	77
Educational . . . . .	37,904	2,436	2,428	2,564	2,885	2,958	3,593	3,741	4,057	3,737	3,427	3,175	2,904
Hospital . . . . .	3,600	279	326	288	264	293	315	311	291	335	305	300	292
Other <sup>3</sup> . . . . .	25,378	1,854	1,934	2,086	2,107	2,036	2,110	2,139	2,244	2,294	2,262	2,215	2,099
Highways and streets . . . . .	44,559	2,045	2,171	2,559	3,240	3,799	4,322	4,599	5,030	5,116	4,592	3,953	3,133
Military facilities . . . . .	1,922	136	161	172	163	163	168	176	127	186	134	152	184
Conservation and development . . . . .	5,682	378	413	444	426	394	467	460	553	722	390	521	513
Other public construction . . . . .	29,814	2,094	2,083	2,233	2,466	2,569	2,655	2,681	2,802	2,690	2,752	2,540	2,247
Sewer systems . . . . .	9,214	714	659	765	767	810	852	818	821	801	795	736	676
Water supply facilities . . . . .	6,147	457	481	506	524	542	550	589	566	534	520	476	401
Miscellaneous public <sup>4</sup> . . . . .	14,453	923	942	962	1,174	1,217	1,252	1,275	1,416	1,355	1,437	1,328	1,171

See footnotes at end of table.

Table 6b. **Annual and Monthly Value of Construction Put in Place: 1998-2001—Not Seasonally Adjusted in 1996 Dollars—Con.**

[Millions of dollars]

Type of construction	2000												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> .....	711,328	49,043	48,369	55,358	57,266	61,798	64,454	63,545	67,024	66,312	64,596	60,574	52,989
<b>Private construction</b> .....	556,426	38,721	38,314	43,928	45,143	48,830	50,548	49,741	51,129	50,393	50,114	47,711	41,852
Residential buildings .....	323,977	22,932	21,176	25,509	26,838	29,081	30,429	29,661	30,003	29,302	29,168	27,377	22,501
New housing units .....	229,324	16,381	15,659	18,502	19,212	20,200	20,875	20,897	20,955	20,487	20,030	19,405	16,721
1 unit .....	204,867	14,505	13,811	16,390	17,075	18,022	18,660	18,896	18,898	18,495	17,993	17,353	14,771
2 units or more .....	24,457	1,876	1,848	2,113	2,137	2,178	2,216	2,001	2,057	1,992	2,038	2,051	1,951
Improvements .....	94,653	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings .....	178,074	12,537	13,465	14,164	14,315	15,284	15,522	15,302	16,078	15,925	15,907	15,320	14,253
Industrial .....	27,194	1,875	2,028	2,163	2,188	2,395	2,452	2,338	2,400	2,373	2,408	2,357	2,217
Office .....	47,534	3,134	3,413	3,722	3,806	4,139	4,022	3,967	4,230	4,377	4,302	4,316	4,107
Hotels, motels .....	13,944	1,152	1,143	1,242	1,213	1,219	1,236	1,183	1,171	1,129	1,127	1,106	1,022
Other commercial .....	51,635	3,638	4,006	3,993	4,068	4,315	4,534	4,500	4,773	4,781	4,757	4,325	3,944
Religious .....	6,858	504	537	544	538	546	593	612	625	603	645	588	524
Educational .....	9,726	638	675	729	731	868	890	935	1,027	844	839	811	738
Hospital and institutional .....	12,342	904	928	981	1,020	1,014	1,033	1,031	1,073	1,080	1,101	1,104	1,074
Miscellaneous <sup>1</sup> .....	8,841	692	737	790	750	788	763	736	780	739	728	712	627
Farm nonresidential .....	5,115	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities .....	46,641	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications .....	18,272	1,221	1,180	1,530	1,248	1,488	1,640	1,363	1,539	1,837	1,591	1,686	1,947
Railroads .....	3,781	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power .....	19,280	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas .....	4,411	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines .....	897	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> .....	2,619	158	178	194	182	191	208	218	272	270	272	252	225
<b>Public construction</b> .....	154,902	10,322	10,055	11,430	12,123	12,967	13,906	13,803	15,895	15,918	14,481	12,863	11,137
Buildings .....	75,772	5,422	5,466	5,696	5,942	6,237	6,819	6,776	7,352	7,116	6,788	6,206	5,952
Housing and redevelopment .....	3,726	256	242	287	302	309	325	306	332	346	359	344	319
Industrial .....	990	81	83	79	78	77	83	84	93	106	63	78	84
Educational .....	42,588	2,946	2,960	3,095	3,184	3,444	3,962	4,057	4,424	4,072	3,735	3,366	3,343
Hospital .....	3,538	276	268	272	307	318	318	298	303	339	292	302	244
Other <sup>3</sup> .....	24,930	1,863	1,913	1,963	2,070	2,088	2,131	2,031	2,201	2,253	2,339	2,116	1,963
Highways and streets .....	42,764	2,468	1,976	2,764	3,250	3,678	3,979	4,138	5,260	5,050	4,275	3,432	2,492
Military facilities .....	2,105	122	184	185	156	173	170	162	181	232	125	238	178
Conservation and development .....	5,494	396	441	459	427	408	466	396	474	710	431	436	451
Other public construction .....	28,768	1,915	1,987	2,326	2,348	2,472	2,472	2,332	2,627	2,809	2,862	2,552	2,064
Sewer systems .....	7,982	560	549	612	717	696	772	679	730	715	724	670	559
Water supply facilities .....	5,327	395	400	389	433	469	431	413	498	498	521	472	410
Miscellaneous public <sup>4</sup> .....	15,459	960	1,039	1,325	1,198	1,307	1,270	1,240	1,400	1,597	1,618	1,410	1,095

See footnotes at end of table.

Table 6b. **Annual and Monthly Value of Construction Put in Place: 1998-2001—Not Seasonally Adjusted in 1996 Dollars—Con.**

[Millions of dollars]

Type of construction	2001												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Total construction</b> . . . . .	704,747	48,864	46,853	53,314	56,675	61,705	65,172	65,487	66,970	64,926	63,818	59,346	51,616
<b>Private construction</b> . . . . .	542,782	38,604	36,867	42,236	44,074	47,504	49,959	49,908	50,563	49,201	48,691	45,552	39,622
Residential buildings . . . . .	322,305	21,566	20,231	24,106	25,704	28,352	30,237	30,171	30,780	30,374	29,905	27,885	22,994
New housing units . . . . .	232,008	15,824	15,365	17,882	18,749	20,094	21,141	21,746	21,942	21,416	20,847	19,931	17,071
1 unit . . . . .	206,557	13,946	13,461	15,863	16,689	17,849	18,890	19,560	19,683	19,275	18,652	17,735	14,953
2 units or more . . . . .	25,451	1,878	1,904	2,019	2,059	2,245	2,252	2,186	2,259	2,142	2,195	2,196	2,118
Improvements . . . . .	90,297	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Nonresidential buildings . . . . .	166,587	13,595	13,311	14,353	14,303	14,318	14,810	14,579	14,408	13,992	13,861	13,000	12,058
Industrial . . . . .	24,072	2,179	1,972	2,216	2,138	2,035	2,213	2,155	2,091	2,084	1,818	1,578	1,592
Office . . . . .	43,112	3,915	3,720	4,059	3,863	3,812	3,874	3,619	3,453	3,306	3,426	3,190	2,873
Hotels, motels . . . . .	11,948	1,011	1,017	1,023	1,012	1,027	1,055	1,065	1,032	983	951	918	851
Other commercial . . . . .	49,933	3,628	3,778	3,989	4,197	4,256	4,361	4,510	4,516	4,446	4,396	4,150	3,706
Religious . . . . .	6,880	509	505	531	555	567	581	608	640	619	617	605	542
Educational . . . . .	10,454	732	708	768	806	857	950	949	1,014	945	943	914	868
Hospital and institutional . . . . .	12,518	1,027	995	1,071	1,053	1,082	1,074	1,027	1,029	1,033	1,076	1,023	1,029
Miscellaneous <sup>1</sup> . . . . .	7,670	593	615	696	679	681	701	646	633	576	633	621	596
Farm nonresidential . . . . .	5,076	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Public utilities . . . . .	46,230	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Telecommunications . . . . .	17,440	1,327	1,247	1,360	1,450	1,738	1,489	1,406	1,587	1,377	1,531	1,483	1,444
Railroads . . . . .	3,595	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Electric light and power . . . . .	19,990	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Gas . . . . .	4,374	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Petroleum pipelines . . . . .	830	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
All other private <sup>2</sup> . . . . .	2,584	174	174	166	174	190	212	255	269	266	245	230	231
<b>Public construction</b> . . . . .	161,965	10,261	9,986	11,078	12,601	14,201	15,213	15,579	16,407	15,725	15,127	13,794	11,993
Buildings . . . . .	80,280	5,576	5,419	5,783	6,363	6,679	7,088	7,515	7,884	7,538	7,292	6,747	6,394
Housing and redevelopment . . . . .	3,940	317	295	304	326	347	343	305	310	333	363	348	350
Industrial . . . . .	1,288	103	85	95	111	90	104	103	103	174	63	95	162
Educational . . . . .	46,148	3,037	2,939	3,146	3,487	3,717	4,067	4,698	4,996	4,467	4,273	3,797	3,525
Hospital . . . . .	3,355	253	242	245	258	282	311	286	294	316	293	287	289
Other <sup>3</sup> . . . . .	25,549	1,866	1,859	1,994	2,181	2,243	2,264	2,123	2,181	2,249	2,300	2,220	2,068
Highways and streets . . . . .	45,415	2,058	2,004	2,583	3,325	4,347	4,948	5,013	5,202	4,629	4,723	3,850	2,734
Military facilities . . . . .	2,372	182	163	178	216	194	214	199	225	253	162	203	181
Conservation and development . . . . .	6,371	476	483	520	455	546	503	481	593	804	461	545	506
Other public construction . . . . .	27,527	1,968	1,916	2,014	2,242	2,435	2,460	2,370	2,503	2,502	2,488	2,449	2,179
Sewer systems . . . . .	7,828	548	535	582	651	686	702	669	733	693	723	720	584
Water supply facilities . . . . .	6,138	372	399	444	519	521	563	558	563	589	560	556	495
Miscellaneous public <sup>4</sup> . . . . .	13,561	1,048	981	988	1,073	1,228	1,195	1,143	1,207	1,219	1,205	1,173	1,100

NA Not available, but estimates are included in total.

<sup>1</sup>Includes amusement and recreational buildings, bus and airline terminals, animal hospitals and shelters, etc. <sup>2</sup>Includes privately owned streets and bridges, parking areas, sewer and water facilities, parks and playgrounds, golf courses, airfields, etc. <sup>3</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, civic centers, passenger terminals, space facilities, postal facilities, etc.

<sup>4</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc.

**Table 7a. Monthly Value of Public Construction Put in Place: May 2000-May 2002—Not Seasonally Adjusted in Current Dollars**

[Millions of dollars]

Period		State and locally owned public construction										
		Total state and local	Buildings					Highways and streets	Conservation and development	Sewer systems	Water supply facilities	Miscellaneous construction <sup>2</sup>
			Total	Housing and redevelopment	Educational	Hospital	Other buildings <sup>1</sup>					
2000:	May <sup>f</sup>	13,790	6,859	326	4,011	324	2,198	4,200	154	764	526	1,286
	June <sup>f</sup>	14,744	7,496	344	4,618	299	2,236	4,547	152	844	486	1,219
	July <sup>f</sup>	14,905	7,550	323	4,754	300	2,173	4,752	156	749	469	1,229
	August <sup>f</sup>	17,126	8,172	353	5,196	293	2,330	6,048	153	808	567	1,379
	September <sup>f</sup>	16,768	7,809	368	4,788	317	2,336	5,820	183	793	568	1,596
	October <sup>f</sup>	15,864	7,585	387	4,407	300	2,491	4,952	206	805	597	1,717
	November <sup>f</sup>	13,815	6,940	367	3,981	298	2,294	3,986	182	745	542	1,419
	December <sup>f</sup>	11,876	6,650	330	3,967	242	2,112	2,894	179	620	471	1,062
2001:	January <sup>f</sup>	10,914	6,246	339	3,621	260	2,027	2,416	191	608	426	1,027
	February <sup>f</sup>	10,686	6,120	318	3,516	252	2,035	2,372	187	595	458	954
	March <sup>f</sup>	11,920	6,516	333	3,771	243	2,171	3,072	206	648	509	969
	April <sup>f</sup>	13,719	7,231	364	4,177	267	2,423	3,922	196	723	597	1,051
	May <sup>f</sup>	15,573	7,634	378	4,465	279	2,512	5,130	226	764	603	1,216
	June <sup>f</sup>	16,865	8,108	376	4,915	290	2,527	5,888	200	792	661	1,216
	July <sup>f</sup>	17,330	8,638	333	5,668	280	2,358	5,915	203	751	654	1,169
	August <sup>f</sup>	18,181	9,108	341	6,042	297	2,428	6,119	232	822	661	1,239
	September <sup>f</sup>	16,906	8,565	372	5,413	287	2,494	5,435	203	777	693	1,233
	October <sup>f</sup>	17,015	8,507	400	5,202	313	2,592	5,603	189	811	657	1,248
	November <sup>f</sup>	15,250	7,833	390	4,628	303	2,511	4,577	215	803	649	1,174
	December <sup>f</sup>	13,167	7,346	390	4,301	318	2,338	3,293	179	659	583	1,108
2002:	January <sup>f</sup>	12,222	7,124	341	4,224	346	2,214	2,964	195	656	491	791
	February <sup>f</sup>	12,133	7,199	329	4,309	307	2,254	2,753	198	661	494	827
	March <sup>f</sup>	12,247	7,212	337	4,285	338	2,252	2,745	211	691	503	886
	April <sup>f</sup>	13,955	7,854	400	4,769	371	2,313	3,530	237	745	565	1,025
	May <sup>p</sup>	15,914	8,517	443	5,283	378	2,413	4,571	237	808	609	1,173
		Federally owned public construction										
		Total federal	Buildings					Highways and streets	Military facilities	Conservation and development	Miscellaneous construction <sup>4</sup>	
			Total	Housing	Industrial	Educational	Hospital					Other buildings <sup>3</sup>
2000:	May <sup>f</sup>	1,109	402	30	89	1	47	235	(NA)	200	293	184
	June <sup>f</sup>	1,249	452	32	97	3	71	249	(NA)	197	358	207
	July <sup>f</sup>	1,064	387	32	98	1	50	207	(NA)	188	280	172
	August <sup>f</sup>	1,295	462	31	109	2	63	256	(NA)	211	372	207
	September <sup>f</sup>	1,695	562	34	125	5	83	316	(NA)	271	606	217
	October <sup>f</sup>	1,002	419	31	75	-	44	269	(NA)	146	273	127
	November <sup>f</sup>	1,204	403	35	93	5	59	211	(NA)	280	302	190
	December <sup>f</sup>	1,155	417	46	99	4	48	220	(NA)	210	321	187
2001:	January <sup>f</sup>	1,145	404	36	123	2	42	200	(NA)	216	337	173
	February <sup>f</sup>	1,100	364	33	102	2	37	190	(NA)	195	351	176
	March <sup>f</sup>	1,198	421	30	114	5	51	222	(NA)	214	373	173
	April <sup>f</sup>	1,166	397	26	133	4	43	193	(NA)	258	309	181
	May <sup>f</sup>	1,217	394	40	108	2	59	184	(NA)	232	381	194
	June <sup>f</sup>	1,284	459	37	125	2	85	210	(NA)	258	366	171
	July <sup>f</sup>	1,187	431	34	125	3	65	204	(NA)	239	337	150
	August <sup>f</sup>	1,320	431	33	125	3	59	211	(NA)	269	433	152
	September <sup>f</sup>	1,781	579	32	211	5	97	234	(NA)	303	698	171
	October <sup>f</sup>	1,078	377	44	77	3	44	210	(NA)	196	328	146
	November <sup>f</sup>	1,237	395	37	115	1	46	196	(NA)	245	392	181
	December <sup>f</sup>	1,269	463	40	198	3	36	187	(NA)	220	391	178
2002:	January <sup>f</sup>	1,177	399	34	112	5	75	173	(NA)	188	382	195
	February <sup>f</sup>	1,306	448	49	174	2	76	148	(NA)	183	415	247
	March <sup>f</sup>	1,363	420	41	154	2	54	169	(NA)	222	454	250
	April <sup>f</sup>	1,331	448	44	171	5	49	180	(NA)	214	392	257
	May <sup>p</sup>	1,367	447	36	167	3	63	178	(NA)	237	397	261

- Less than \$0.5 million. NA Not available, but estimates are included in totals. <sup>p</sup>Preliminary. <sup>f</sup>Revised.

<sup>1</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, passenger terminals, civic centers, etc. <sup>2</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc. <sup>3</sup>Includes federal office buildings, prisons, courthouses, space facilities, postal facilities, etc. <sup>4</sup>Includes federal airport facilities, fish and wildlife preservation facilities, VA cemeteries, etc.

Table 7b. **Annual and Monthly Value of Public Construction Put in Place: 1998-2001—Not Seasonally Adjusted in Current Dollars**

[Millions of dollars]

Type of construction	1998												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . .</b>	139,984	8,180	7,997	8,739	10,191	11,011	13,399	13,965	14,731	14,702	14,214	12,165	10,691
Total buildings . . . . .	66,392	4,453	4,394	4,573	5,009	5,241	6,130	6,453	6,557	6,343	6,069	5,683	5,487
Housing and redevelopment . . . . .	4,649	321	306	354	375	364	430	465	391	413	427	409	394
Educational . . . . .	34,986	2,298	2,249	2,292	2,586	2,740	3,365	3,628	3,679	3,408	3,069	2,838	2,834
Hospital . . . . .	2,914	240	226	255	227	241	252	227	227	254	261	248	258
Other <sup>1</sup> . . . . .	23,844	1,593	1,614	1,672	1,821	1,897	2,083	2,134	2,260	2,269	2,313	2,188	2,001
Highways and streets . . . . .	44,419	1,912	1,878	2,284	3,066	3,508	4,602	4,748	5,309	5,347	5,188	3,788	2,789
Conservation and development . . . . .	1,930	145	132	145	136	161	201	165	184	179	187	155	139
Other State and local construction . . . . .	27,243	1,670	1,593	1,737	1,979	2,101	2,467	2,599	2,681	2,832	2,769	2,539	2,276
Sewer systems . . . . .	9,943	637	599	675	712	748	869	921	947	1,000	1,018	973	843
Water supply facilities . . . . .	6,678	418	421	426	499	535	531	592	604	664	722	662	604
Miscellaneous nonbuilding <sup>2</sup> . . . . .	10,622	616	572	636	768	817	1,066	1,087	1,130	1,168	1,029	904	829
<b>Federal construction . . . . .</b>	14,318	1,006	1,035	1,134	1,069	1,081	1,197	1,347	1,233	1,823	921	1,243	1,230
Total buildings . . . . .	6,026	429	447	504	488	483	494	580	506	690	435	478	491
Housing . . . . .	538	40	50	32	39	42	44	61	57	57	34	48	36
Industrial . . . . .	1,010	76	79	95	84	81	78	93	88	108	58	91	79
Educational . . . . .	15	-	1	-	1	1	2	2	3	3	-	1	1
Hospital . . . . .	1,009	71	66	105	63	90	82	95	87	148	90	64	50
Other federal buildings <sup>3</sup> . . . . .	3,454	243	253	272	301	269	289	329	271	375	253	275	325
Highways and streets . . . . .	257	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	2,530	188	187	237	204	199	225	279	241	225	157	189	198
Conservation and development . . . . .	3,536	190	279	258	244	254	294	312	316	592	193	313	292
Miscellaneous nonbuilding <sup>4</sup> . . . . .	1,969	188	111	122	115	123	158	148	139	285	107	241	233

See footnotes at end of table.

Table 7b. **Annual and Monthly Value of Public Construction Put in Place: 1998-2001—Not Seasonally Adjusted in Current Dollars—Con.**

[Millions of dollars]

Type of construction	1999												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . .</b>	155,519	9,401	9,587	10,582	11,929	12,869	14,323	14,826	16,016	15,614	14,870	13,541	11,960
Total buildings . . . . .	74,948	5,053	5,120	5,487	5,894	5,983	6,745	6,931	7,465	7,090	6,774	6,417	5,988
Housing and redevelopment . . . . .	4,229	350	335	374	380	409	352	343	362	368	346	303	307
Educational . . . . .	42,411	2,670	2,670	2,833	3,195	3,288	4,019	4,191	4,561	4,200	3,872	3,603	3,310
Hospital . . . . .	3,175	224	236	236	233	259	282	262	282	304	295	297	265
Other <sup>1</sup> . . . . .	25,133	1,809	1,880	2,044	2,086	2,027	2,091	2,135	2,261	2,218	2,261	2,214	2,107
Highways and streets . . . . .	48,600	2,174	2,310	2,734	3,484	4,125	4,729	5,019	5,504	5,594	5,061	4,382	3,485
Conservation and development . . . . .	2,053	152	137	135	158	148	163	159	197	196	186	223	200
Other State and local construction . . . . .	29,918	2,023	2,020	2,226	2,393	2,614	2,687	2,717	2,850	2,735	2,848	2,518	2,287
Sewer systems . . . . .	9,864	747	692	807	814	866	918	880	887	864	860	797	733
Water supply facilities . . . . .	6,541	485	512	541	556	575	584	624	602	569	555	510	431
Miscellaneous nonbuilding <sup>2</sup> . . . . .	13,513	790	817	879	1,023	1,174	1,184	1,213	1,361	1,303	1,434	1,212	1,124
<b>Federal construction . . . . .</b>	14,025	990	1,129	1,144	1,152	1,033	1,185	1,208	1,169	1,584	971	1,235	1,226
Total buildings . . . . .	5,469	400	466	465	428	420	453	479	416	592	420	453	476
Housing . . . . .	424	27	26	37	42	32	39	39	34	46	32	38	33
Industrial . . . . .	925	64	69	85	76	83	73	89	70	112	45	72	88
Educational . . . . .	15	3	1	1	1	1	1	3	4	1	-	-	1
Hospital . . . . .	850	82	123	82	60	67	71	86	46	73	49	43	68
Other federal buildings <sup>3</sup> . . . . .	3,255	225	247	260	248	237	270	263	263	360	295	301	287
Highways and streets . . . . .	251	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	2,125	147	175	188	179	179	186	195	142	207	150	171	208
Conservation and development . . . . .	4,035	244	296	333	294	274	341	336	401	584	235	341	357
Miscellaneous nonbuilding <sup>4</sup> . . . . .	2,145	187	181	144	233	140	180	172	182	173	139	248	167

See footnotes at end of table.

Table 7b. **Annual and Monthly Value of Public Construction Put in Place: 1998-2001—Not Seasonally Adjusted in Current Dollars—Con.**

[Millions of dollars]

Type of construction	2000												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . .</b>	164,396	10,685	10,335	11,710	12,777	13,790	14,744	14,905	17,126	16,768	15,864	13,815	11,876
Total buildings . . . . .	83,408	5,828	5,901	6,145	6,473	6,859	7,496	7,550	8,172	7,809	7,585	6,940	6,650
Housing and redevelopment . . . . .	3,926	266	249	296	318	326	344	323	353	368	387	367	330
Educational . . . . .	49,785	3,385	3,413	3,574	3,692	4,011	4,618	4,754	5,196	4,788	4,407	3,981	3,967
Hospital . . . . .	3,413	250	247	267	276	324	299	300	293	317	300	298	242
Other <sup>1</sup> . . . . .	26,284	1,927	1,993	2,008	2,187	2,198	2,236	2,173	2,330	2,336	2,491	2,294	2,112
Highways and streets . . . . .	48,925	2,748	2,206	3,083	3,687	4,200	4,547	4,752	6,048	5,820	4,952	3,986	2,894
Conservation and development . . . . .	2,003	152	177	156	154	154	152	156	153	183	206	182	179
Other State and local construction . . . . .	30,060	1,958	2,051	2,327	2,464	2,576	2,549	2,447	2,753	2,957	3,119	2,706	2,153
Sewer systems . . . . .	8,807	611	604	673	789	764	844	749	808	793	805	745	620
Water supply facilities . . . . .	5,993	428	436	424	480	526	486	469	567	568	597	542	471
Miscellaneous nonbuilding <sup>2</sup> . . . . .	15,260	919	1,011	1,230	1,195	1,286	1,219	1,229	1,379	1,596	1,717	1,419	1,062
<b>Federal construction . . . . .</b>	14,165	973	1,076	1,251	1,093	1,109	1,249	1,064	1,295	1,695	1,002	1,204	1,155
Total buildings . . . . .	5,158	398	399	431	426	402	452	387	462	562	419	403	417
Housing . . . . .	382	25	27	32	29	30	32	32	31	34	31	35	46
Industrial . . . . .	1,157	93	96	92	91	89	97	98	109	125	75	93	99
Educational . . . . .	29	-	-	-	7	1	3	1	2	5	-	5	4
Hospital . . . . .	722	67	62	48	81	47	71	50	63	83	44	59	48
Other federal buildings <sup>3</sup> . . . . .	2,867	214	213	259	218	235	249	207	256	316	269	211	220
Highways and streets . . . . .	337	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	2,441	138	210	210	180	200	197	188	211	271	146	280	210
Conservation and development . . . . .	4,061	280	308	350	316	293	358	280	372	606	273	302	321
Miscellaneous nonbuilding <sup>4</sup> . . . . .	2,169	142	144	243	149	184	207	172	207	217	127	190	187

See footnotes at end of table.



Table 7b. **Annual and Monthly Value of Public Construction Put in Place: 1998-2001—Not Seasonally Adjusted in Current Dollars—Con.**

[Millions of dollars]

Type of construction	2001												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . .</b>	177,527	10,914	10,686	11,920	13,719	15,573	16,865	17,330	18,181	16,906	17,015	15,250	13,167
Total buildings . . . . .	91,852	6,246	6,120	6,516	7,231	7,634	8,108	8,638	9,108	8,565	8,507	7,833	7,346
Housing and redevelopment . . . . .	4,330	339	318	333	364	378	376	333	341	372	400	390	390
Educational . . . . .	55,718	3,621	3,516	3,771	4,177	4,465	4,915	5,668	6,042	5,413	5,202	4,628	4,301
Hospital . . . . .	3,389	260	252	243	267	279	290	280	297	287	313	303	318
Other <sup>1</sup> . . . . .	28,415	2,027	2,035	2,171	2,423	2,512	2,527	2,358	2,428	2,494	2,592	2,511	2,338
Highways and streets . . . . .	53,743	2,416	2,372	3,072	3,922	5,130	5,888	5,915	6,119	5,435	5,603	4,577	3,293
Conservation and development . . . . .	2,427	191	187	206	196	226	200	203	232	203	189	215	179
Other State and local construction . . . . .	29,505	2,061	2,007	2,126	2,370	2,583	2,669	2,574	2,722	2,702	2,716	2,625	2,350
Sewer systems . . . . .	8,751	608	595	648	723	764	792	751	822	777	811	803	659
Water supply facilities . . . . .	7,152	426	458	509	597	603	661	654	661	693	657	649	583
Miscellaneous nonbuilding <sup>2</sup> . . . . .	13,602	1,027	954	969	1,051	1,216	1,216	1,169	1,239	1,233	1,248	1,174	1,108
<b>Federal construction . . . . .</b>	14,981	1,145	1,100	1,198	1,166	1,217	1,284	1,187	1,320	1,781	1,078	1,237	1,269
Total buildings . . . . .	5,115	404	364	421	397	394	459	431	431	579	377	395	463
Housing . . . . .	421	36	33	30	26	40	37	34	33	32	44	37	40
Industrial . . . . .	1,556	123	102	114	133	108	125	125	125	211	77	115	198
Educational . . . . .	35	2	2	5	4	2	2	3	3	5	3	1	3
Hospital . . . . .	664	42	37	51	43	59	85	65	59	97	44	46	36
Other federal buildings <sup>3</sup> . . . . .	2,440	200	190	222	193	184	210	204	211	234	210	196	187
Highways and streets . . . . .	283	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	2,843	216	195	214	258	232	258	239	269	303	196	245	220
Conservation and development . . . . .	4,695	337	351	373	309	381	366	337	433	698	328	392	391
Miscellaneous nonbuilding <sup>4</sup> . . . . .	2,046	173	176	173	181	194	171	150	152	171	146	181	178

- Represents zero or rounds to zero. NA Not available, but estimates are included in total.

<sup>1</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, passenger terminals, civic centers, etc. <sup>2</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc. <sup>3</sup>Includes federal office buildings, prisons, courthouses, space facilities, postal facilities, etc. <sup>4</sup>Includes federal airport facilities, fish and wildlife preservation facilities, VA cemeteries, etc.

**Table 8a. Monthly Value of Public Construction Put in Place: May 2000-May 2002—Seasonally Adjusted Annual Rate in Current Dollars**

[Millions of dollars]

Period		State and locally owned public construction										
		Total state and local	Buildings					Highways and streets	Conservation and development	Sewer systems	Water supply facilities	Miscellaneous construction <sup>2</sup>
			Total	Housing and redevelopment	Educational	Hospital	Other buildings <sup>1</sup>					
2000:	May <sup>f</sup>	163,518	83,131	3,764	49,773	3,806	25,788	48,420	1,815	8,949	6,094	15,110
	June <sup>f</sup>	156,045	82,236	3,988	49,429	3,367	25,452	43,690	1,689	9,267	5,579	13,583
	July <sup>f</sup>	155,961	80,976	3,889	47,501	3,612	25,973	46,175	1,706	8,484	5,181	13,438
	August <sup>f</sup>	162,665	82,553	4,220	48,901	3,448	25,984	49,884	1,537	8,601	6,210	13,879
	September <sup>f</sup>	169,313	84,350	4,119	50,138	3,577	26,515	52,193	1,865	8,417	6,187	16,302
	October <sup>f</sup>	165,316	85,294	4,241	50,125	3,350	27,579	45,891	2,089	8,513	6,141	17,387
	November <sup>f</sup>	164,395	84,509	4,296	50,174	3,519	26,520	46,487	2,133	8,532	6,139	16,594
	December <sup>f</sup>	167,030	87,578	4,068	53,488	3,036	26,987	48,237	2,407	8,362	6,161	14,286
2001:	January <sup>f</sup>	171,998	87,676	4,410	52,542	3,305	27,419	50,586	2,921	8,828	6,313	15,675
	February <sup>f</sup>	172,680	87,286	4,292	52,210	3,345	27,438	52,422	2,863	8,876	6,595	14,638
	March <sup>f</sup>	176,709	88,489	4,187	53,674	3,036	27,592	55,609	2,960	8,668	7,032	13,952
	April <sup>f</sup>	179,850	91,681	4,349	54,844	3,296	29,192	55,900	2,500	9,022	7,318	13,430
	May <sup>f</sup>	182,782	92,089	4,368	55,413	3,268	29,039	57,752	2,672	8,952	6,960	14,357
	June <sup>f</sup>	179,180	89,573	4,342	52,612	3,322	29,297	57,535	2,235	8,691	7,581	13,566
	July <sup>f</sup>	178,321	91,733	4,012	56,581	3,316	27,824	55,888	2,222	8,469	7,233	12,776
	August <sup>f</sup>	173,149	91,680	4,064	56,819	3,487	27,309	50,675	2,338	8,744	7,231	12,483
	September <sup>f</sup>	172,200	92,606	4,187	56,681	3,315	28,423	49,152	2,073	8,235	7,546	12,588
	October <sup>f</sup>	177,164	95,866	4,404	59,226	3,434	28,801	51,328	1,926	8,586	6,772	12,686
	November <sup>f</sup>	182,169	95,443	4,556	58,337	3,576	28,973	53,900	2,512	9,218	7,381	13,715
	December <sup>f</sup>	185,409	96,669	4,804	58,051	3,971	29,843	54,966	2,399	8,881	7,636	14,857
2002:	January <sup>f</sup>	192,959	99,431	4,494	60,992	4,396	29,549	61,436	3,026	9,536	7,270	12,260
	February <sup>f</sup>	197,152	102,866	4,520	63,836	4,054	30,457	61,414	3,053	9,884	7,197	12,738
	March <sup>f</sup>	183,124	98,830	4,313	60,848	4,357	29,311	52,115	3,060	9,334	6,935	12,850
	April <sup>f</sup>	183,457	99,596	4,848	62,614	4,486	27,648	51,463	3,019	9,354	6,973	13,052
	May <sup>p</sup>	187,267	102,982	5,146	65,293	4,405	28,138	51,267	2,771	9,491	7,041	13,716
		Federally owned public construction										
		Total federal	Buildings					Highways and streets	Military facilities	Conservation and development	Miscellaneous construction <sup>4</sup>	
			Total	Housing	Industrial	Educational	Hospital					Other buildings <sup>3</sup>
2000:	May <sup>f</sup>	13,579	5,059	380	1,125	13	590	2,952	(NA)	2,386	3,567	2,232
	June <sup>f</sup>	14,482	5,260	367	1,134	29	830	2,901	(NA)	2,264	4,191	2,421
	July <sup>f</sup>	13,002	4,607	376	1,167	14	592	2,458	(NA)	2,211	3,614	2,220
	August <sup>f</sup>	14,807	5,619	381	1,331	28	761	3,118	(NA)	2,439	4,106	2,289
	September <sup>f</sup>	14,055	5,024	303	1,116	43	739	2,824	(NA)	2,590	4,486	1,604
	October <sup>f</sup>	15,022	5,653	412	1,007	3	598	3,634	(NA)	2,148	4,692	2,187
	November <sup>f</sup>	14,314	4,916	424	1,130	62	724	2,574	(NA)	3,261	3,559	2,241
	December <sup>f</sup>	14,085	4,866	533	1,158	50	556	2,569	(NA)	2,450	4,079	2,373
2001:	January <sup>f</sup>	15,229	5,276	475	1,610	27	550	2,613	(NA)	2,839	4,491	2,309
	February <sup>f</sup>	14,980	4,870	435	1,362	31	496	2,546	(NA)	2,684	4,726	2,369
	March <sup>f</sup>	14,534	5,118	363	1,380	60	622	2,694	(NA)	2,493	4,519	2,096
	April <sup>f</sup>	14,889	4,905	320	1,636	43	530	2,377	(NA)	3,262	4,054	2,369
	May <sup>f</sup>	15,020	4,973	499	1,365	30	749	2,329	(NA)	2,754	4,712	2,400
	June <sup>f</sup>	14,961	5,321	427	1,454	22	986	2,432	(NA)	2,965	4,351	2,030
	July <sup>f</sup>	14,266	5,086	406	1,469	33	772	2,406	(NA)	2,802	4,210	1,876
	August <sup>f</sup>	14,913	5,204	398	1,509	36	711	2,550	(NA)	3,110	4,667	1,641
	September <sup>f</sup>	15,217	5,201	286	1,896	47	868	2,104	(NA)	2,900	5,491	1,344
	October <sup>f</sup>	15,976	5,112	595	1,048	37	591	2,841	(NA)	2,894	5,312	2,374
	November <sup>f</sup>	14,700	4,852	452	1,417	10	569	2,404	(NA)	2,838	4,603	2,124
	December <sup>f</sup>	15,605	5,402	463	2,308	37	414	2,180	(NA)	2,559	5,063	2,298
2002:	January <sup>f</sup>	15,743	5,216	449	1,470	60	979	2,259	(NA)	2,481	5,132	2,623
	February <sup>f</sup>	17,785	5,992	653	2,321	25	1,014	1,979	(NA)	2,533	5,608	3,340
	March <sup>f</sup>	16,759	5,110	492	1,876	27	660	2,055	(NA)	2,609	5,633	3,103
	April <sup>f</sup>	16,663	5,499	534	2,097	56	605	2,207	(NA)	2,717	4,926	3,229
	May <sup>p</sup>	16,610	5,564	450	2,079	31	789	2,216	(NA)	2,795	4,806	3,154

NA Not available, but estimates are included in totals. <sup>P</sup>Preliminary. <sup>f</sup>Revised.

<sup>1</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, passenger terminals, civic centers, etc. <sup>2</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc. <sup>3</sup>Includes federal office buildings, prisons, courthouses, space facilities, postal facilities, etc. <sup>4</sup>Includes federal airport facilities, fish and wildlife preservation facilities, VA cemeteries, etc.

Table 8b. **Monthly Value of Public Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in Current Dollars**

[Millions of dollars]

Type of construction	1998											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . . . .</b>	133,939	131,022	131,488	133,345	132,300	142,530	143,047	141,762	145,340	146,098	144,836	148,214
Total buildings . . . . .	62,584	62,410	61,583	63,448	63,543	67,228	69,467	67,571	68,397	68,501	68,948	71,359
Housing and redevelopment . . . . .	4,205	4,179	4,557	4,560	4,387	4,987	5,517	4,711	4,483	4,616	4,723	4,779
Educational . . . . .	33,269	33,313	32,171	33,992	34,113	35,670	36,307	34,818	35,778	35,340	36,041	38,249
Hospital . . . . .	3,241	2,991	3,116	2,798	2,948	2,792	2,662	2,787	2,691	2,984	3,014	3,107
Other <sup>1</sup> . . . . .	21,869	21,928	21,739	22,097	22,095	23,778	24,981	25,255	25,444	25,560	25,171	25,224
Highways and streets . . . . .	43,608	42,204	43,157	43,334	41,965	45,526	43,528	44,395	45,703	47,347	45,052	44,810
Conservation and development . . . . .	2,342	2,076	2,174	1,722	1,916	2,232	1,752	1,821	1,814	1,881	1,794	1,872
Other State and local construction . . . . .	25,405	24,333	24,574	24,840	24,877	27,544	28,300	27,975	29,427	28,370	29,042	30,174
Sewer systems . . . . .	9,342	9,186	9,107	8,980	8,971	9,570	10,268	10,176	10,344	10,643	11,148	11,122
Water supply facilities . . . . .	6,131	6,137	5,953	6,133	6,204	6,119	6,491	6,632	7,276	7,390	7,432	7,844
Miscellaneous nonbuilding <sup>2</sup> . . . . .	9,932	9,009	9,515	9,728	9,702	11,855	11,540	11,168	11,808	10,336	10,461	11,208
<b>Federal construction . . . . .</b>	13,439	14,548	14,089	13,288	13,079	13,778	15,331	14,211	15,160	13,567	15,490	15,201
Total buildings . . . . .	5,483	6,065	6,329	5,921	5,887	5,590	6,455	6,112	6,309	6,017	6,163	5,987
Housing . . . . .	507	673	405	468	515	495	679	690	517	467	617	436
Industrial . . . . .	964	1,067	1,194	1,022	986	884	1,039	1,067	987	796	1,172	967
Educational . . . . .	3	11	4	17	17	20	18	30	27	3	8	15
Hospital . . . . .	911	888	1,313	761	1,093	924	1,062	1,048	1,348	1,250	823	610
Other federal buildings <sup>3</sup> . . . . .	3,098	3,426	3,413	3,653	3,276	3,267	3,658	3,277	3,430	3,500	3,543	3,958
Highways and streets . . . . .	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	2,501	2,741	2,755	2,594	2,346	2,595	3,256	2,792	2,100	2,298	2,203	2,281
Conservation and development . . . . .	2,614	3,930	3,229	3,072	3,097	3,474	3,642	3,508	4,378	3,212	3,879	3,711
Miscellaneous nonbuilding <sup>4</sup> . . . . .	2,590	1,565	1,531	1,446	1,498	1,862	1,721	1,539	2,109	1,776	2,985	2,965

See footnotes at end of table.

Table 8b. **Monthly Value of Public Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in Current Dollars—Con.**

[Millions of dollars]

Type of construction	1999											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . . .</b>	152,385	156,302	155,869	154,986	153,996	152,159	153,947	154,124	155,074	155,074	161,879	166,413
Total buildings . . . . .	71,023	72,767	73,953	74,402	72,591	74,359	74,119	76,161	76,228	76,416	78,112	78,155
Housing and redevelopment . . . . .	4,542	4,567	4,728	4,592	4,720	4,077	4,135	4,337	4,101	3,767	3,552	3,793
Educational . . . . .	38,741	39,601	40,179	42,225	40,721	43,064	41,878	42,892	43,975	43,958	45,416	44,677
Hospital . . . . .	2,962	3,140	2,892	2,822	3,161	3,179	3,092	3,386	3,343	3,357	3,526	3,188
Other <sup>1</sup> . . . . .	24,778	25,459	26,154	24,763	23,988	24,039	25,014	25,547	24,809	25,334	25,618	26,497
Highways and streets . . . . .	48,847	51,041	48,820	48,563	49,054	46,065	47,951	46,250	48,220	47,488	52,168	54,882
Conservation and development . . . . .	2,344	2,123	1,965	2,016	1,731	1,804	1,740	1,978	1,993	1,887	2,605	2,700
Other State and local construction . . . . .	30,170	30,371	31,132	30,004	30,620	29,931	30,136	29,735	28,634	29,283	28,994	30,676
Sewer systems . . . . .	10,832	10,416	10,789	10,148	10,165	10,074	10,014	9,429	9,165	9,087	9,087	9,853
Water supply facilities . . . . .	7,150	7,326	7,542	6,806	6,688	6,713	6,881	6,612	6,198	5,680	5,760	5,641
Miscellaneous nonbuilding <sup>2</sup> . . . . .	12,188	12,629	12,801	13,051	13,768	13,144	13,240	13,694	13,270	14,516	14,147	15,182
<b>Federal construction . . . . .</b>	13,496	15,401	13,688	14,338	13,075	13,725	14,536	13,635	13,056	14,599	14,736	14,484
Total buildings . . . . .	5,227	6,237	5,652	5,288	5,265	5,289	5,745	5,112	5,291	5,630	5,499	5,544
Housing . . . . .	346	352	453	523	406	457	462	413	407	422	461	383
Industrial . . . . .	839	926	1,029	937	1,041	849	1,071	856	998	600	872	1,023
Educational . . . . .	38	9	10	14	9	13	31	47	8	1	1	7
Hospital . . . . .	1,068	1,641	998	745	844	822	1,031	565	656	662	518	795
Other federal buildings <sup>3</sup> . . . . .	2,936	3,308	3,162	3,070	2,966	3,148	3,150	3,232	3,222	3,946	3,646	3,336
Highways and streets . . . . .	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	1,901	2,425	2,206	2,266	2,132	2,143	2,293	1,640	1,972	2,190	2,010	2,417
Conservation and development . . . . .	3,454	4,025	3,892	3,643	3,595	3,965	4,136	4,568	4,275	4,106	4,032	4,254
Miscellaneous nonbuilding <sup>4</sup> . . . . .	2,643	2,471	1,687	2,890	1,845	2,085	2,114	2,071	1,267	2,419	2,933	1,985

See footnotes at end of table.

Table 8b. **Monthly Value of Public Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in Current Dollars—Con.**

[Millions of dollars]

Type of construction	2000											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . . .</b>	173,822	163,620	172,031	168,314	163,518	156,045	155,961	162,665	169,313	165,316	164,395	167,030
Total buildings . . . . .	82,252	83,032	83,262	82,380	83,131	82,236	80,976	82,553	84,350	85,294	84,509	87,578
Housing and redevelopment . . . . .	3,462	3,372	3,739	3,811	3,764	3,988	3,889	4,220	4,119	4,241	4,296	4,068
Educational . . . . .	49,122	50,685	50,755	48,636	49,773	49,429	47,501	48,901	50,138	50,125	50,174	53,488
Hospital . . . . .	3,308	3,153	3,267	3,472	3,806	3,367	3,612	3,448	3,577	3,350	3,519	3,036
Other <sup>1</sup> . . . . .	26,360	25,822	25,501	26,460	25,788	25,452	25,973	25,984	26,515	27,579	26,520	26,987
Highways and streets . . . . .	59,959	47,024	53,855	52,980	48,420	43,690	46,175	49,884	52,193	45,891	46,487	48,237
Conservation and development . . . . .	2,325	2,726	2,248	1,962	1,815	1,689	1,706	1,537	1,865	2,089	2,133	2,407
Other State and local construction . . . . .	29,286	30,838	32,666	30,993	30,153	28,429	27,103	28,690	30,906	32,041	31,265	28,809
Sewer systems . . . . .	8,877	9,036	9,007	9,843	8,949	9,267	8,484	8,601	8,417	8,513	8,532	8,362
Water supply facilities . . . . .	6,326	6,248	5,877	5,882	6,094	5,579	5,181	6,210	6,187	6,141	6,139	6,161
Miscellaneous nonbuilding <sup>2</sup> . . . . .	14,084	15,554	17,782	15,268	15,110	13,583	13,438	13,879	16,302	17,387	16,594	14,286
<b>Federal construction . . . . .</b>	13,440	14,445	14,852	14,111	13,579	14,482	13,002	14,807	14,055	15,022	14,314	14,085
Total buildings . . . . .	5,205	5,336	5,234	5,264	5,059	5,260	4,607	5,619	5,024	5,653	4,916	4,866
Housing . . . . .	322	364	390	358	380	367	376	381	303	412	424	533
Industrial . . . . .	1,210	1,287	1,115	1,123	1,125	1,134	1,167	1,331	1,116	1,007	1,130	1,158
Educational . . . . .	1	4	2	90	13	29	14	28	43	3	62	50
Hospital . . . . .	876	835	581	996	590	830	592	761	739	598	724	556
Other federal buildings <sup>3</sup> . . . . .	2,796	2,847	3,145	2,696	2,952	2,901	2,458	3,118	2,824	3,634	2,574	2,569
Highways and streets . . . . .	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	1,796	2,902	2,466	2,273	2,386	2,264	2,211	2,439	2,590	2,148	3,261	2,450
Conservation and development . . . . .	4,069	4,012	4,037	4,257	3,567	4,191	3,614	4,106	4,486	4,692	3,559	4,079
Miscellaneous nonbuilding <sup>4</sup> . . . . .	2,065	1,875	2,800	2,000	2,232	2,421	2,220	2,289	1,604	2,187	2,241	2,373

See footnotes at end of table.

Table 8b. **Monthly Value of Public Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in Current Dollars—Con.**

[Millions of dollars]

Type of construction	2001											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . . . .</b>	171,998	172,680	176,709	179,850	182,782	179,180	178,321	173,149	172,200	177,164	182,169	185,409
Total buildings . . . . .	87,676	87,286	88,489	91,681	92,089	89,573	91,733	91,680	92,606	95,866	95,443	96,669
Housing and redevelopment . . . . .	4,410	4,292	4,187	4,349	4,368	4,342	4,012	4,064	4,187	4,404	4,556	4,804
Educational . . . . .	52,542	52,210	53,674	54,844	55,413	52,612	56,581	56,819	56,681	59,226	58,337	58,051
Hospital . . . . .	3,305	3,345	3,036	3,296	3,268	3,322	3,316	3,487	3,315	3,434	3,576	3,971
Other <sup>1</sup> . . . . .	27,419	27,438	27,592	29,192	29,039	29,297	27,824	27,309	28,423	28,801	28,973	29,843
Highways and streets . . . . .	50,586	52,422	55,609	55,900	57,752	57,535	55,888	50,675	49,152	51,328	53,900	54,966
Conservation and development . . . . .	2,921	2,863	2,960	2,500	2,672	2,235	2,222	2,338	2,073	1,926	2,512	2,399
Other State and local construction . . . . .	30,815	30,108	29,651	29,770	30,269	29,837	28,478	28,457	28,369	28,044	30,314	31,375
Sewer systems . . . . .	8,828	8,876	8,668	9,022	8,952	8,691	8,469	8,744	8,235	8,586	9,218	8,881
Water supply facilities . . . . .	6,313	6,595	7,032	7,318	6,960	7,581	7,233	7,231	7,546	6,772	7,381	7,636
Miscellaneous nonbuilding <sup>2</sup> . . . . .	15,675	14,638	13,952	13,430	14,357	13,566	12,776	12,483	12,588	12,686	13,715	14,857
<b>Federal construction . . . . .</b>	15,229	14,980	14,534	14,889	15,020	14,961	14,266	14,913	15,217	15,976	14,700	15,605
Total buildings . . . . .	5,276	4,870	5,118	4,905	4,973	5,321	5,086	5,204	5,201	5,112	4,852	5,402
Housing . . . . .	475	435	363	320	499	427	406	398	286	595	452	463
Industrial . . . . .	1,610	1,362	1,380	1,636	1,365	1,454	1,469	1,509	1,896	1,048	1,417	2,308
Educational . . . . .	27	31	60	43	30	22	33	36	47	37	10	37
Hospital . . . . .	550	496	622	530	749	986	772	711	868	591	569	414
Other federal buildings <sup>3</sup> . . . . .	2,613	2,546	2,694	2,377	2,329	2,432	2,406	2,550	2,104	2,841	2,404	2,180
Highways and streets . . . . .	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	2,839	2,684	2,493	3,262	2,754	2,965	2,802	3,110	2,900	2,894	2,838	2,559
Conservation and development . . . . .	4,491	4,726	4,519	4,054	4,712	4,351	4,210	4,667	5,491	5,312	4,603	5,063
Miscellaneous nonbuilding <sup>4</sup> . . . . .	2,309	2,369	2,096	2,369	2,400	2,030	1,876	1,641	1,344	2,374	2,124	2,298

NA Not available, but estimates are included in total.

<sup>1</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, passenger terminals, civic centers, etc. <sup>2</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc. <sup>3</sup>Includes federal office buildings, prisons, courthouses, space facilities, postal facilities, etc. <sup>4</sup>Includes federal airport facilities, fish and wildlife preservation facilities, VA cemeteries, etc.

**Table 9a. Monthly Value of Public Construction Put in Place: May 2000-May 2002—Seasonally Adjusted Annual Rate in 1996 Dollars**

[Millions of dollars]

Period		State and locally owned public construction										
		Total state and local	Buildings					Highways and streets	Conservation and development	Sewer systems	Water supply facilities	Miscellaneous construction <sup>2</sup>
			Total	Housing and redevelopment	Educational	Hospital	Other buildings <sup>1</sup>					
2000:	May <sup>f</sup>	142,177	71,396	3,270	42,724	3,267	22,135	42,104	1,653	8,150	5,431	13,443
	June <sup>f</sup>	135,543	70,561	3,453	42,392	2,888	21,828	37,925	1,544	8,471	4,946	12,096
	July <sup>f</sup>	134,734	69,132	3,359	40,530	3,082	22,162	39,909	1,547	7,692	4,561	11,892
	August <sup>f</sup>	140,246	70,308	3,641	41,618	2,935	22,114	43,077	1,389	7,770	5,453	12,249
	September <sup>f</sup>	145,752	71,710	3,545	42,598	3,039	22,527	44,994	1,680	7,583	5,423	14,363
	October <sup>f</sup>	141,794	72,329	3,640	42,479	2,839	23,372	39,324	1,879	7,656	5,354	15,252
	November <sup>f</sup>	140,633	71,422	3,675	42,377	2,972	22,399	39,733	1,918	7,672	5,343	14,544
	December <sup>f</sup>	142,614	73,751	3,456	45,023	2,555	22,716	41,263	2,168	7,534	5,367	12,531
2001:	January <sup>f</sup>	146,136	73,520	3,725	44,042	2,770	22,983	42,834	2,631	7,953	5,508	13,690
	February <sup>f</sup>	145,987	72,948	3,613	43,618	2,795	22,922	44,015	2,575	7,982	5,750	12,718
	March <sup>f</sup>	148,912	73,764	3,512	44,728	2,530	22,994	46,496	2,660	7,788	6,125	12,080
	April <sup>f</sup>	152,043	76,474	3,636	45,742	2,749	24,347	47,133	2,252	8,128	6,358	11,699
	May <sup>f</sup>	154,353	76,616	3,637	46,101	2,718	24,159	48,777	2,400	8,043	6,010	12,507
	June <sup>f</sup>	150,049	74,113	3,615	43,517	2,748	24,233	48,106	1,983	7,712	6,452	11,685
	July <sup>f</sup>	149,903	76,015	3,338	46,877	2,747	23,052	47,123	1,980	7,548	6,166	11,071
	August <sup>f</sup>	145,481	75,771	3,362	46,958	2,882	22,569	42,836	2,085	7,800	6,154	10,836
	September <sup>f</sup>	144,512	76,344	3,452	46,728	2,733	23,432	41,619	1,849	7,346	6,417	10,937
	October <sup>f</sup>	147,830	78,696	3,604	48,625	2,820	23,646	43,024	1,718	7,660	5,768	10,965
	November <sup>f</sup>	152,096	78,272	3,713	47,857	2,934	23,768	45,105	2,253	8,267	6,325	11,875
	December <sup>f</sup>	153,748	79,153	3,915	47,544	3,252	24,441	45,389	2,128	7,881	6,488	12,709
2002:	January <sup>f</sup>	160,219	81,483	3,666	49,993	3,603	24,220	50,858	2,692	8,484	6,187	10,515
	February <sup>f</sup>	163,196	84,172	3,692	52,239	3,318	24,924	50,588	2,704	8,755	6,099	10,878
	March <sup>f</sup>	152,029	80,988	3,515	49,875	3,571	24,026	43,106	2,723	8,304	5,897	11,011
	April <sup>f</sup>	151,711	81,369	3,961	51,155	3,665	22,588	42,356	2,672	8,278	5,899	11,137
	May <sup>p</sup>	154,485	84,001	4,201	53,257	3,593	22,951	42,057	2,446	8,377	5,942	11,663
		Federally owned public construction										
		Total federal	Buildings					Highways and streets	Military facilities	Conservation and development	Miscellaneous construction <sup>4</sup>	
			Total	Housing	Industrial	Educational	Hospital					Other buildings <sup>3</sup>
2000:	May <sup>f</sup>	11,934	4,347	330	965	11	506	2,534	(NA)	2,062	3,249	1,986
	June <sup>f</sup>	12,755	4,514	318	972	25	711	2,488	(NA)	1,954	3,831	2,156
	July <sup>f</sup>	11,376	3,935	325	995	12	505	2,098	(NA)	1,898	3,277	1,964
	August <sup>f</sup>	12,914	4,787	329	1,133	24	647	2,654	(NA)	2,092	3,709	2,020
	September <sup>f</sup>	12,244	4,272	261	948	36	628	2,399	(NA)	2,216	4,042	1,413
	October <sup>f</sup>	13,057	4,795	353	853	2	507	3,079	(NA)	1,831	4,219	1,918
	November <sup>f</sup>	12,380	4,157	363	955	53	612	2,174	(NA)	2,770	3,200	1,964
	December <sup>f</sup>	12,208	4,101	453	975	42	468	2,163	(NA)	2,080	3,675	2,082
2001:	January <sup>f</sup>	13,146	4,425	401	1,350	23	461	2,190	(NA)	2,391	4,046	2,017
	February <sup>f</sup>	12,905	4,071	366	1,138	26	415	2,127	(NA)	2,248	4,250	2,058
	March <sup>f</sup>	12,480	4,267	305	1,150	50	518	2,245	(NA)	2,081	4,060	1,815
	April <sup>f</sup>	12,796	4,092	267	1,364	36	442	1,982	(NA)	2,737	3,652	2,063
	May <sup>f</sup>	12,923	4,138	415	1,136	25	623	1,938	(NA)	2,309	4,234	2,091
	June <sup>f</sup>	12,725	4,403	355	1,203	18	815	2,012	(NA)	2,467	3,861	1,749
	July <sup>f</sup>	12,180	4,215	338	1,217	27	639	1,993	(NA)	2,340	3,752	1,626
	August <sup>f</sup>	12,735	4,301	330	1,247	30	588	2,107	(NA)	2,600	4,163	1,425
	September <sup>f</sup>	13,014	4,288	236	1,563	39	716	1,735	(NA)	2,423	4,898	1,168
	October <sup>f</sup>	13,626	4,195	487	861	30	485	2,332	(NA)	2,401	4,739	2,052
	November <sup>f</sup>	12,533	3,978	368	1,163	8	467	1,972	(NA)	2,352	4,128	1,839
	December <sup>f</sup>	13,219	4,422	377	1,890	31	339	1,785	(NA)	2,105	4,492	1,966
2002:	January <sup>f</sup>	13,373	4,274	366	1,205	49	802	1,851	(NA)	2,043	4,566	2,250
	February <sup>f</sup>	15,059	4,903	533	1,899	21	830	1,619	(NA)	2,080	4,967	2,852
	March <sup>f</sup>	14,255	4,186	401	1,538	22	541	1,684	(NA)	2,147	5,012	2,659
	April <sup>f</sup>	14,076	4,493	436	1,713	46	494	1,803	(NA)	2,229	4,359	2,755
	May <sup>p</sup>	13,989	4,539	367	1,695	25	643	1,807	(NA)	2,287	4,242	2,682

NA Not available, but estimates are included in totals. <sup>p</sup>Preliminary. <sup>r</sup>Revised.

<sup>1</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, passenger terminals, civic centers, etc. <sup>2</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc. <sup>3</sup>Includes federal office buildings, prisons, courthouses, space facilities, postal facilities, etc. <sup>4</sup>Includes federal airport facilities, fish and wildlife preservation facilities, VA cemeteries, etc.

Table 9b. **Monthly Value of Public Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in 1996 Dollars**

[Millions of dollars]

Type of construction	1998											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . . .</b>	127,262	124,744	125,203	126,855	125,531	134,660	134,804	132,914	135,857	136,334	135,068	137,881
Total buildings . . . . .	59,207	59,049	58,223	59,766	59,635	62,738	64,703	62,706	63,354	63,268	63,495	65,459
Housing and redevelopment . . . . .	4,028	4,010	4,373	4,368	4,194	4,731	5,214	4,448	4,229	4,334	4,410	4,434
Educational . . . . .	31,445	31,486	30,379	31,977	31,971	33,244	33,774	32,269	33,098	32,602	33,156	35,058
Hospital . . . . .	3,064	2,827	2,943	2,633	2,763	2,602	2,476	2,583	2,489	2,753	2,773	2,847
Other <sup>1</sup> . . . . .	20,670	20,725	20,528	20,788	20,708	22,161	23,238	23,406	23,538	23,580	23,157	23,120
Highways and streets . . . . .	41,374	40,233	41,180	41,468	40,120	43,399	41,337	41,843	42,873	44,332	42,223	41,957
Conservation and development . . . . .	2,254	2,005	2,103	1,662	1,842	2,136	1,677	1,734	1,721	1,793	1,718	1,794
Other State and local construction . . . . .	24,427	23,457	23,698	23,958	23,934	26,387	27,087	26,631	27,909	26,941	27,632	28,670
Sewer systems . . . . .	8,991	8,876	8,807	8,668	8,626	9,158	9,826	9,691	9,814	10,146	10,679	10,664
Water supply facilities . . . . .	5,940	5,935	5,751	5,937	6,006	5,906	6,260	6,365	6,956	7,025	7,038	7,393
Miscellaneous nonbuilding <sup>2</sup> . . . . .	9,495	8,646	9,140	9,354	9,302	11,323	11,001	10,575	11,140	9,769	9,916	10,614
<b>Federal construction . . . . .</b>	12,787	13,880	13,426	12,639	12,403	13,012	14,445	13,329	14,194	12,682	14,513	14,211
Total buildings . . . . .	5,189	5,742	5,983	5,578	5,527	5,218	6,015	5,677	5,846	5,558	5,678	5,492
Housing . . . . .	485	645	389	449	493	469	642	652	488	439	576	405
Industrial . . . . .	911	1,009	1,127	961	924	824	966	989	913	735	1,078	887
Educational . . . . .	2	10	4	16	16	19	17	28	25	3	7	13
Hospital . . . . .	862	839	1,240	716	1,024	861	988	971	1,247	1,153	757	559
Other federal buildings <sup>3</sup> . . . . .	2,928	3,239	3,223	3,437	3,070	3,045	3,403	3,037	3,173	3,229	3,260	3,628
Highways and streets . . . . .	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	2,368	2,603	2,616	2,462	2,221	2,446	3,060	2,609	1,957	2,135	2,045	2,112
Conservation and development . . . . .	2,516	3,797	3,123	2,966	2,978	3,324	3,485	3,341	4,153	3,062	3,715	3,558
Miscellaneous nonbuilding <sup>4</sup> . . . . .	2,476	1,502	1,471	1,390	1,437	1,778	1,641	1,458	1,990	1,679	2,829	2,808

See footnotes at end of table.



Table 9b. **Monthly Value of Public Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in 1996**  
**Dollars—Con.**

[Millions of dollars]

Type of construction	1999											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . . . .</b>	141,328	144,726	143,637	142,220	140,477	137,790	139,478	139,136	140,089	139,272	144,745	148,292
Total buildings . . . . .	64,797	66,209	66,988	67,203	65,330	66,498	66,159	67,751	67,861	67,670	68,863	68,604
Housing and redevelopment . . . . .	4,194	4,209	4,342	4,198	4,295	3,690	3,729	3,907	3,692	3,378	3,171	3,374
Educational . . . . .	35,315	36,001	36,361	38,109	36,619	38,484	37,358	38,126	39,124	38,901	40,014	39,190
Hospital . . . . .	2,700	2,854	2,617	2,547	2,843	2,841	2,758	3,010	2,975	2,971	3,107	2,797
Other <sup>1</sup> . . . . .	22,587	23,144	23,669	22,349	21,572	21,483	22,314	22,708	22,072	22,420	22,571	23,243
Highways and streets . . . . .	45,694	47,746	45,456	44,924	44,962	41,877	43,711	42,046	43,876	42,859	46,829	49,089
Conservation and development . . . . .	2,239	2,024	1,864	1,902	1,620	1,673	1,618	1,831	1,847	1,745	2,406	2,488
Other State and local construction . . . . .	28,598	28,747	29,329	28,191	28,566	27,742	27,990	27,508	26,505	26,998	26,646	28,110
Sewer systems . . . . .	10,346	9,930	10,237	9,573	9,509	9,345	9,307	8,730	8,494	8,406	8,390	9,081
Water supply facilities . . . . .	6,732	6,892	7,062	6,420	6,309	6,327	6,492	6,214	5,826	5,323	5,384	5,252
Miscellaneous nonbuilding <sup>2</sup> . . . . .	11,520	11,926	12,031	12,197	12,748	12,070	12,192	12,563	12,186	13,269	12,872	13,777
<b>Federal construction . . . . .</b>	12,574	14,307	12,658	13,220	11,963	12,476	13,214	12,376	11,840	13,183	13,264	12,985
Total buildings . . . . .	4,769	5,674	5,121	4,779	4,739	4,731	5,129	4,549	4,711	4,988	4,850	4,868
Housing . . . . .	320	324	416	478	370	414	416	372	366	378	412	341
Industrial . . . . .	765	842	931	845	936	759	955	761	888	531	769	897
Educational . . . . .	35	9	9	12	8	11	28	41	7	1	1	6
Hospital . . . . .	974	1,492	903	673	759	735	920	502	584	585	456	697
Other federal buildings <sup>3</sup> . . . . .	2,676	3,008	2,862	2,771	2,667	2,813	2,810	2,872	2,866	3,492	3,212	2,926
Highways and streets . . . . .	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	1,755	2,235	2,026	2,071	1,935	1,931	2,068	1,475	1,775	1,958	1,787	2,141
Conservation and development . . . . .	3,299	3,837	3,693	3,437	3,363	3,678	3,844	4,230	3,962	3,798	3,723	3,921
Miscellaneous nonbuilding <sup>4</sup> . . . . .	2,498	2,333	1,586	2,701	1,709	1,915	1,947	1,900	1,164	2,211	2,669	1,802

See footnotes at end of table.

Table 9b. **Monthly Value of Public Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in 1996 Dollars—Con.**

[Millions of dollars]

Type of construction	2000											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . . .</b>	154,043	144,293	151,747	147,016	142,177	135,543	134,734	140,246	145,752	141,794	140,633	142,614
Total buildings . . . . .	71,617	72,045	72,119	70,938	71,396	70,561	69,132	70,308	71,710	72,329	71,422	73,751
Housing and redevelopment . . . . .	3,045	2,955	3,268	3,323	3,270	3,453	3,359	3,641	3,545	3,640	3,675	3,456
Educational . . . . .	42,752	43,959	43,944	41,856	42,724	42,392	40,530	41,618	42,598	42,479	42,377	45,023
Hospital . . . . .	2,879	2,734	2,829	2,988	3,267	2,888	3,082	2,935	3,039	2,839	2,972	2,555
Other <sup>1</sup> . . . . .	22,942	22,396	22,079	22,772	22,135	21,828	22,162	22,114	22,527	23,372	22,399	22,716
Highways and streets . . . . .	53,582	41,836	47,999	46,433	42,104	37,925	39,909	43,077	44,994	39,324	39,733	41,263
Conservation and development . . . . .	2,129	2,478	2,044	1,782	1,653	1,544	1,547	1,389	1,680	1,879	1,918	2,168
Other State and local construction . . . . .	26,715	27,934	29,585	27,864	27,025	25,512	24,145	25,472	27,368	28,262	27,559	25,432
Sewer systems . . . . .	8,129	8,214	8,189	8,940	8,150	8,471	7,692	7,770	7,583	7,656	7,672	7,534
Water supply facilities . . . . .	5,852	5,732	5,391	5,304	5,431	4,946	4,561	5,453	5,423	5,354	5,343	5,367
Miscellaneous nonbuilding <sup>2</sup> . . . . .	12,734	13,987	16,005	13,620	13,443	12,096	11,892	12,249	14,363	15,252	14,544	12,531
<b>Federal construction . . . . .</b>	11,983	12,797	13,173	12,437	11,934	12,755	11,376	12,914	12,244	13,057	12,380	12,208
Total buildings . . . . .	4,533	4,632	4,535	4,534	4,347	4,514	3,935	4,787	4,272	4,795	4,157	4,101
Housing . . . . .	283	319	341	312	330	318	325	329	261	353	363	453
Industrial . . . . .	1,053	1,116	965	967	965	972	995	1,133	948	853	955	975
Educational . . . . .	1	3	2	78	11	25	12	24	36	2	53	42
Hospital . . . . .	762	724	503	857	506	711	505	647	628	507	612	468
Other federal buildings <sup>3</sup> . . . . .	2,433	2,469	2,723	2,320	2,534	2,488	2,098	2,654	2,399	3,079	2,174	2,163
Highways and streets . . . . .	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	1,584	2,548	2,167	1,975	2,062	1,954	1,898	2,092	2,216	1,831	2,770	2,080
Conservation and development . . . . .	3,726	3,647	3,670	3,866	3,249	3,831	3,277	3,709	4,042	4,219	3,200	3,675
Miscellaneous nonbuilding <sup>4</sup> . . . . .	1,867	1,686	2,521	1,785	1,986	2,156	1,964	2,020	1,413	1,918	1,964	2,082

See footnotes at end of table.

Table 9b. **Monthly Value of Public Construction Put in Place: 1998-2001—Seasonally Adjusted Annual Rate in 1996 Dollars—Con.**

[Millions of dollars]

Type of construction	2001											
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . . .</b>	146,136	145,987	148,912	152,043	154,353	150,049	149,903	145,481	144,512	147,830	152,096	153,748
Total buildings . . . . .	73,520	72,948	73,764	76,474	76,616	74,113	76,015	75,771	76,344	78,696	78,272	79,153
Housing and redevelopment . . . . .	3,725	3,613	3,512	3,636	3,637	3,615	3,338	3,362	3,452	3,604	3,713	3,915
Educational . . . . .	44,042	43,618	44,728	45,742	46,101	43,517	46,877	46,958	46,728	48,625	47,857	47,544
Hospital . . . . .	2,770	2,795	2,530	2,749	2,718	2,748	2,747	2,882	2,733	2,820	2,934	3,252
Other <sup>1</sup> . . . . .	22,983	22,922	22,994	24,347	24,159	24,233	23,052	22,569	23,432	23,646	23,768	24,441
Highways and streets . . . . .	42,834	44,015	46,496	47,133	48,777	48,106	47,123	42,836	41,619	43,024	45,105	45,389
Conservation and development . . . . .	2,631	2,575	2,660	2,252	2,400	1,983	1,980	2,085	1,849	1,718	2,253	2,128
Other State and local construction . . . . .	27,151	26,449	25,992	26,184	26,560	25,848	24,785	24,789	24,699	24,392	26,466	27,078
Sewer systems . . . . .	7,953	7,982	7,788	8,128	8,043	7,712	7,548	7,800	7,346	7,660	8,267	7,881
Water supply facilities . . . . .	5,508	5,750	6,125	6,358	6,010	6,452	6,166	6,154	6,417	5,768	6,325	6,488
Miscellaneous nonbuilding <sup>2</sup> . . . . .	13,690	12,718	12,080	11,699	12,507	11,685	11,071	10,836	10,937	10,965	11,875	12,709
<b>Federal construction . . . . .</b>	13,146	12,905	12,480	12,796	12,923	12,725	12,180	12,735	13,014	13,626	12,533	13,219
Total buildings . . . . .	4,425	4,071	4,267	4,092	4,138	4,403	4,215	4,301	4,288	4,195	3,978	4,422
Housing . . . . .	401	366	305	267	415	355	338	330	236	487	368	377
Industrial . . . . .	1,350	1,138	1,150	1,364	1,136	1,203	1,217	1,247	1,563	861	1,163	1,890
Educational . . . . .	23	26	50	36	25	18	27	30	39	30	8	31
Hospital . . . . .	461	415	518	442	623	815	639	588	716	485	467	339
Other federal buildings <sup>3</sup> . . . . .	2,190	2,127	2,245	1,982	1,938	2,012	1,993	2,107	1,735	2,332	1,972	1,785
Highways and streets . . . . .	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	2,391	2,248	2,081	2,737	2,309	2,467	2,340	2,600	2,423	2,401	2,352	2,105
Conservation and development . . . . .	4,046	4,250	4,060	3,652	4,234	3,861	3,752	4,163	4,898	4,739	4,128	4,492
Miscellaneous nonbuilding <sup>4</sup> . . . . .	2,017	2,058	1,815	2,063	2,091	1,749	1,626	1,425	1,168	2,052	1,839	1,966

NA Not available, but estimates are included in total.

<sup>1</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, passenger terminals, civic centers, etc. <sup>2</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc. <sup>3</sup>Includes federal office buildings, prisons, courthouses, space facilities, postal facilities, etc. <sup>4</sup>Includes federal airport facilities, fish and wildlife preservation facilities, VA cemeteries, etc.

**Table 10a. Monthly Value of Public Construction Put in Place: May 2000-May 2002—Not Seasonally Adjusted in 1996 Dollars**

[Millions of dollars]

Period		State and locally owned public construction										
		Total state and local	Buildings					Highways and streets	Conservation and development	Sewer systems	Water supply facilities	Miscellaneous construction <sup>2</sup>
			Total	Housing and redevelopment	Educational	Hospital	Other buildings <sup>1</sup>					
2000:	May <sup>f</sup> . . . . .	11,993	5,891	283	3,443	278	1,887	3,653	141	696	469	1,144
	June <sup>f</sup> . . . . .	12,806	6,432	298	3,960	257	1,917	3,947	139	772	431	1,086
	July <sup>f</sup> . . . . .	12,873	6,445	279	4,056	256	1,854	4,107	141	679	413	1,087
	August <sup>f</sup> . . . . .	14,764	6,959	305	4,422	250	1,983	5,223	138	730	498	1,217
	September <sup>f</sup> . . . . .	14,438	6,638	317	4,068	269	1,984	5,017	165	715	498	1,406
	October <sup>f</sup> . . . . .	13,613	6,433	332	3,735	254	2,111	4,244	186	724	521	1,506
	November <sup>f</sup> . . . . .	11,822	5,865	314	3,362	252	1,938	3,407	164	670	472	1,243
	December <sup>f</sup> . . . . .	10,138	5,600	280	3,339	204	1,778	2,476	161	559	410	931
2001:	January <sup>f</sup> . . . . .	9,272	5,238	286	3,035	218	1,699	2,045	172	548	372	897
	February <sup>f</sup> . . . . .	9,038	5,115	267	2,937	211	1,700	1,992	168	535	399	829
	March <sup>f</sup> . . . . .	10,050	5,432	279	3,142	202	1,809	2,569	185	582	444	839
	April <sup>f</sup> . . . . .	11,600	6,031	304	3,484	223	2,021	3,307	176	651	519	915
	May <sup>f</sup> . . . . .	13,154	6,351	314	3,715	232	2,090	4,333	203	686	521	1,059
	June <sup>f</sup> . . . . .	14,122	6,708	313	4,065	240	2,090	4,923	178	702	563	1,048
	July <sup>f</sup> . . . . .	14,566	7,158	277	4,696	232	1,954	4,987	181	669	558	1,013
	August <sup>f</sup> . . . . .	15,278	7,528	282	4,993	245	2,007	5,172	207	733	563	1,075
	September <sup>f</sup> . . . . .	14,198	7,061	306	4,462	236	2,056	4,602	181	693	589	1,071
	October <sup>f</sup> . . . . .	14,210	6,983	327	4,271	257	2,128	4,697	169	723	560	1,078
	November <sup>f</sup> . . . . .	12,739	6,424	318	3,797	249	2,060	3,830	193	720	556	1,016
	December <sup>f</sup> . . . . .	10,920	6,014	317	3,522	260	1,915	2,720	159	584	495	948
2002:	January <sup>f</sup> . . . . .	10,146	5,838	278	3,462	283	1,815	2,454	174	584	418	678
	February <sup>f</sup> . . . . .	10,045	5,890	269	3,526	251	1,844	2,268	176	586	419	706
	March <sup>f</sup> . . . . .	10,169	5,910	274	3,512	277	1,846	2,270	188	615	428	759
	April <sup>f</sup> . . . . .	11,543	6,417	327	3,896	303	1,890	2,905	210	659	478	874
	May <sup>p</sup> . . . . .	13,130	6,947	362	4,309	308	1,968	3,750	209	713	514	997
		Federally owned public construction										
		Total federal	Buildings					Highways and streets	Military facilities	Conservation and development	Miscellaneous construction <sup>4</sup>	
			Total	Housing	Industrial	Educational	Hospital					Other buildings <sup>3</sup>
2000:	May <sup>f</sup> . . . . .	975	346	26	77	1	40	201	(NA)	173	267	163
	June <sup>f</sup> . . . . .	1,100	387	27	83	2	61	214	(NA)	170	328	184
	July <sup>f</sup> . . . . .	930	331	27	84	1	42	176	(NA)	162	254	152
	August <sup>f</sup> . . . . .	1,130	393	27	93	2	53	218	(NA)	181	336	183
	September <sup>f</sup> . . . . .	1,480	478	29	106	4	70	268	(NA)	232	546	191
	October <sup>f</sup> . . . . .	869	355	26	63	-	38	228	(NA)	125	245	112
	November <sup>f</sup> . . . . .	1,041	341	30	78	4	50	178	(NA)	238	271	167
	December <sup>f</sup> . . . . .	1,000	352	39	84	4	40	185	(NA)	178	289	164
2001:	January <sup>f</sup> . . . . .	989	339	31	103	2	35	168	(NA)	182	304	151
	February <sup>f</sup> . . . . .	948	304	27	85	2	31	159	(NA)	163	315	153
	March <sup>f</sup> . . . . .	1,028	351	25	95	4	43	185	(NA)	178	335	150
	April <sup>f</sup> . . . . .	1,001	331	22	111	3	36	161	(NA)	216	278	157
	May <sup>f</sup> . . . . .	1,047	328	33	90	2	49	153	(NA)	194	343	169
	June <sup>f</sup> . . . . .	1,091	380	31	104	2	70	174	(NA)	214	325	147
	July <sup>f</sup> . . . . .	1,013	357	29	103	2	54	169	(NA)	199	300	130
	August <sup>f</sup> . . . . .	1,129	356	27	103	2	49	175	(NA)	225	386	132
	September <sup>f</sup> . . . . .	1,527	477	26	174	4	80	193	(NA)	253	622	148
	October <sup>f</sup> . . . . .	917	309	36	63	2	36	172	(NA)	162	292	127
	November <sup>f</sup> . . . . .	1,055	324	30	95	1	38	161	(NA)	203	352	157
	December <sup>f</sup> . . . . .	1,073	379	32	162	3	29	153	(NA)	181	347	152
2002:	January <sup>f</sup> . . . . .	999	327	28	92	4	61	141	(NA)	154	339	167
	February <sup>f</sup> . . . . .	1,106	366	40	142	2	62	121	(NA)	150	367	211
	March <sup>f</sup> . . . . .	1,159	344	33	126	2	45	139	(NA)	183	404	214
	April <sup>f</sup> . . . . .	1,124	366	36	140	4	40	147	(NA)	176	347	219
	May <sup>p</sup> . . . . .	1,152	364	29	136	2	52	145	(NA)	194	351	222

- Less than \$0.5 million. NA Not available, but estimates are included in totals. <sup>p</sup>Preliminary. <sup>r</sup>Revised.

<sup>1</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, passenger terminals, civic centers, etc. <sup>2</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc. <sup>3</sup>Includes federal office buildings, prisons, courthouses, space facilities, postal facilities, etc. <sup>4</sup>Includes federal airport facilities, fish and wildlife preservation facilities, VA cemeteries, etc.

Table 10b. **Annual and Monthly Value of Public Construction Put in Place: 1998-2001—Not Seasonally Adjusted in 1996 Dollars**

[Millions of dollars]

Type of construction	1998												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . .</b>	131,792	7,772	7,611	8,319	9,693	10,449	12,662	13,164	13,814	13,747	13,272	11,348	9,940
Total buildings . . . . .	61,894	4,212	4,158	4,323	4,719	4,919	5,720	6,010	6,084	5,876	5,606	5,234	5,033
Housing and redevelopment . . . . .	4,403	307	294	340	359	348	408	439	369	390	401	382	365
Educational . . . . .	32,575	2,172	2,125	2,164	2,433	2,568	3,136	3,375	3,410	3,153	2,831	2,611	2,597
Hospital . . . . .	2,715	227	213	240	213	225	235	211	210	235	240	228	237
Other <sup>1</sup> . . . . .	22,200	1,505	1,525	1,579	1,713	1,777	1,941	1,985	2,095	2,099	2,134	2,013	1,834
Highways and streets . . . . .	42,006	1,814	1,790	2,179	2,934	3,353	4,387	4,509	5,004	5,016	4,858	3,550	2,612
Conservation and development . . . . .	1,849	140	127	141	131	155	192	158	175	170	179	148	133
Other State and local construction . . . . .	26,043	1,607	1,536	1,676	1,909	2,021	2,363	2,488	2,551	2,685	2,630	2,416	2,162
Sewer systems . . . . .	9,526	613	579	653	688	720	832	881	902	949	971	932	808
Water supply facilities . . . . .	6,405	405	408	412	483	518	513	571	579	635	686	627	569
Miscellaneous nonbuilding <sup>2</sup> . . . . .	10,112	589	549	611	738	784	1,018	1,036	1,070	1,102	973	857	785
<b>Federal construction . . . . .</b>	13,505	957	988	1,080	1,017	1,025	1,130	1,269	1,157	1,709	860	1,164	1,150
Total buildings . . . . .	5,624	406	423	477	460	454	461	540	470	640	402	440	451
Housing . . . . .	510	38	48	31	37	40	41	58	54	53	32	45	33
Industrial . . . . .	941	71	74	90	79	76	73	87	82	100	53	84	73
Educational . . . . .	14	-	1	-	1	1	2	1	2	3	-	1	1
Hospital . . . . .	941	67	62	99	59	84	76	89	80	136	83	59	46
Other federal buildings <sup>3</sup> . . . . .	3,217	229	239	257	283	252	269	306	251	347	234	253	298
Highways and streets . . . . .	243	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	2,377	178	178	225	194	189	212	262	225	210	146	175	184
Conservation and development . . . . .	3,387	182	269	249	236	244	282	299	301	561	184	300	280
Miscellaneous nonbuilding <sup>4</sup> . . . . .	1,873	180	107	117	110	118	151	141	131	269	101	228	221

See footnotes at end of table.

Table 10b. **Annual and Monthly Value of Public Construction Put in Place: 1998-2001—Not Seasonally Adjusted in 1996 Dollars—Con.**

[Millions of dollars]

Type of construction	1999												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . .</b>	141,107	8,706	8,862	9,742	10,944	11,742	12,972	13,433	14,462	14,114	13,365	12,112	10,654
Total buildings . . . . .	67,031	4,610	4,659	4,971	5,324	5,385	6,032	6,186	6,640	6,311	5,999	5,658	5,257
Housing and redevelopment . . . . .	3,834	323	309	343	347	372	319	309	326	331	310	271	273
Educational . . . . .	37,890	2,434	2,427	2,563	2,884	2,957	3,592	3,739	4,054	3,736	3,427	3,174	2,903
Hospital . . . . .	2,838	204	215	214	210	233	252	234	250	270	261	262	232
Other <sup>1</sup> . . . . .	22,469	1,649	1,709	1,850	1,883	1,823	1,869	1,904	2,010	1,974	2,001	1,950	1,848
Highways and streets . . . . .	44,330	2,033	2,161	2,546	3,223	3,781	4,299	4,575	5,003	5,090	4,568	3,934	3,117
Conservation and development . . . . .	1,916	145	131	128	149	138	151	148	182	181	172	206	184
Other State and local construction . . . . .	27,830	1,917	1,912	2,097	2,248	2,439	2,490	2,523	2,636	2,531	2,625	2,315	2,096
Sewer systems . . . . .	9,214	714	659	765	767	810	852	818	821	801	795	736	676
Water supply facilities . . . . .	6,147	457	481	506	524	542	550	589	566	534	520	476	401
Miscellaneous nonbuilding <sup>2</sup> . . . . .	12,469	747	771	826	956	1,087	1,087	1,117	1,249	1,196	1,310	1,103	1,020
<b>Federal construction . . . . .</b>	12,796	922	1,048	1,058	1,062	945	1,078	1,098	1,062	1,440	875	1,112	1,099
Total buildings . . . . .	4,896	365	424	421	387	378	406	428	370	527	372	400	418
Housing . . . . .	384	24	24	34	39	29	35	35	30	41	28	34	29
Industrial . . . . .	827	59	63	77	68	75	65	80	62	99	40	63	77
Educational . . . . .	14	3	1	1	1	1	1	2	3	1	-	-	1
Hospital . . . . .	762	74	112	74	54	61	63	77	41	65	44	38	60
Other federal buildings <sup>3</sup> . . . . .	2,909	205	225	235	224	213	241	234	234	321	261	265	251
Highways and streets . . . . .	229	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	1,922	136	161	172	163	163	168	176	127	186	134	152	184
Conservation and development . . . . .	3,766	233	282	316	277	256	317	312	371	541	218	315	329
Miscellaneous nonbuilding <sup>4</sup> . . . . .	1,983	177	171	136	218	130	165	158	167	159	127	226	151

See footnotes at end of table.

Table 10b. **Annual and Monthly Value of Public Construction Put in Place: 1998-2001—Not Seasonally Adjusted in 1996 Dollars—Con.**

[Millions of dollars]

Type of construction	2000												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . .</b>	142,484	9,455	9,102	10,320	11,160	11,993	12,806	12,873	14,764	14,438	13,613	11,822	10,138
Total buildings . . . . .	71,356	5,075	5,120	5,323	5,574	5,891	6,432	6,445	6,959	6,638	6,433	5,865	5,600
Housing and redevelopment . . . . .	3,395	234	218	258	277	283	298	279	305	317	332	314	280
Educational . . . . .	42,563	2,946	2,960	3,094	3,178	3,443	3,960	4,056	4,422	4,068	3,735	3,362	3,339
Hospital . . . . .	2,920	218	214	231	238	278	257	256	250	269	254	252	204
Other <sup>1</sup> . . . . .	22,478	1,677	1,728	1,739	1,882	1,887	1,917	1,854	1,983	1,984	2,111	1,938	1,778
Highways and streets . . . . .	42,471	2,456	1,963	2,748	3,231	3,653	3,947	4,107	5,223	5,017	4,244	3,407	2,476
Conservation and development . . . . .	1,815	139	161	141	139	141	139	141	138	165	186	164	161
Other State and local construction . . . . .	26,843	1,786	1,858	2,108	2,216	2,309	2,288	2,179	2,444	2,619	2,751	2,386	1,900
Sewer systems . . . . .	7,982	560	549	612	717	696	772	679	730	715	724	670	559
Water supply facilities . . . . .	5,327	395	400	389	433	469	431	413	498	498	521	472	410
Miscellaneous nonbuilding <sup>2</sup> . . . . .	13,534	831	909	1,107	1,066	1,144	1,086	1,087	1,217	1,406	1,506	1,243	931
<b>Federal construction . . . . .</b>	12,418	866	953	1,110	963	975	1,100	930	1,130	1,480	869	1,041	1,000
Total buildings . . . . .	4,416	347	346	373	367	346	387	331	393	478	355	341	352
Housing . . . . .	331	22	24	28	25	26	27	27	27	29	26	30	39
Industrial . . . . .	990	81	83	79	78	77	83	84	93	106	63	78	84
Educational . . . . .	25	-	-	-	6	1	2	1	2	4	-	4	4
Hospital . . . . .	618	58	54	41	69	40	61	42	53	70	38	50	40
Other federal buildings <sup>3</sup> . . . . .	2,452	186	185	224	188	201	214	176	218	268	228	178	185
Highways and streets . . . . .	292	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	2,105	122	184	185	156	173	170	162	181	232	125	238	178
Conservation and development . . . . .	3,679	257	280	318	287	267	328	254	336	546	245	271	289
Miscellaneous nonbuilding <sup>4</sup> . . . . .	1,925	129	129	218	133	163	184	152	183	191	112	167	164

See footnotes at end of table.

Table 10b. **Annual and Monthly Value of Public Construction Put in Place: 1998-2001—Not Seasonally Adjusted in 1996 Dollars—Con.**

[Millions of dollars]

Type of construction	2001												
	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>State and local construction . . .</b>	149,147	9,272	9,038	10,050	11,600	13,154	14,122	14,566	15,278	14,198	14,210	12,739	10,920
Total buildings . . . . .	76,044	5,238	5,115	5,432	6,031	6,351	6,708	7,158	7,528	7,061	6,983	6,424	6,014
Housing and redevelopment . . . . .	3,591	286	267	279	304	314	313	277	282	306	327	318	317
Educational . . . . .	46,119	3,035	2,937	3,142	3,484	3,715	4,065	4,696	4,993	4,462	4,271	3,797	3,522
Hospital . . . . .	2,805	218	211	202	223	232	240	232	245	236	257	249	260
Other <sup>1</sup> . . . . .	23,528	1,699	1,700	1,809	2,021	2,090	2,090	1,954	2,007	2,056	2,128	2,060	1,915
Highways and streets . . . . .	45,177	2,045	1,992	2,569	3,307	4,333	4,923	4,987	5,172	4,602	4,697	3,830	2,720
Conservation and development . . . . .	2,172	172	168	185	176	203	178	181	207	181	169	193	159
Other State and local construction . . . . .	25,754	1,817	1,763	1,864	2,085	2,266	2,313	2,240	2,371	2,353	2,361	2,292	2,028
Sewer systems . . . . .	7,828	548	535	582	651	686	702	669	733	693	723	720	584
Water supply facilities . . . . .	6,138	372	399	444	519	521	563	558	563	589	560	556	495
Miscellaneous nonbuilding <sup>2</sup> . . . . .	11,788	897	829	839	915	1,059	1,048	1,013	1,075	1,071	1,078	1,016	948
<b>Federal construction . . . . .</b>	12,818	989	948	1,028	1,001	1,047	1,091	1,013	1,129	1,527	917	1,055	1,073
Total buildings . . . . .	4,236	339	304	351	331	328	380	357	356	477	309	324	379
Housing . . . . .	349	31	27	25	22	33	31	29	27	26	36	30	32
Industrial . . . . .	1,288	103	85	95	111	90	104	103	103	174	63	95	162
Educational . . . . .	29	2	2	4	3	2	2	2	2	4	2	1	3
Hospital . . . . .	550	35	31	43	36	49	70	54	49	80	36	38	29
Other federal buildings <sup>3</sup> . . . . .	2,021	168	159	185	161	153	174	169	175	193	172	161	153
Highways and streets . . . . .	238	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)	(NA)
Military facilities . . . . .	2,372	182	163	178	216	194	214	199	225	253	162	203	181
Conservation and development . . . . .	4,200	304	315	335	278	343	325	300	386	622	292	352	347
Miscellaneous nonbuilding <sup>4</sup> . . . . .	1,773	151	153	150	157	169	147	130	132	148	127	157	152

- Represents zero or rounds to zero. NA Not available, but estimates are included in total.

<sup>1</sup>Includes general administrative buildings, prisons, police and fire stations, courthouses, passenger terminals, civic centers, etc. <sup>2</sup>Includes open amusement and recreational facilities, power generating facilities, transit systems, airfields, open parking facilities, etc. <sup>3</sup>Includes federal office buildings, prisons, courthouses, space facilities, postal facilities, etc. <sup>4</sup>Includes federal airport facilities, fish and wildlife preservation facilities, VA cemeteries, etc.



# Appendix A.

## Definitions

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### CONSTRUCTION

In this publication, construction includes the following:

1. New buildings and structures.
2. Additions, alterations, conversions, expansions, reconstruction, renovations, rehabilitations, and major replacements (such as the complete replacement of a roof or heating system).
3. Mechanical and electrical installations such as plumbing, heating, electrical work, elevators, escalators, central air-conditioning, and other similar building services.
4. Site preparation and outside construction of fixed structures or facilities such as sidewalks, highways and streets, parking lots, utility connections, outdoor lighting, railroad tracks, airfields, piers, wharves and docks, telephone and telegraph lines, radio and television towers, water supply lines, sewers, water and signal towers, electric light and power distribution and transmission lines, petroleum and gas pipelines, and similar facilities which are built into or fixed to the land.
5. Installation of the following types of equipment: boilers, overhead hoists and cranes, and blast furnaces.
6. Fixed, largely site-fabricated equipment not housed in a building, primarily for petroleum refineries and chemical plants, but also including storage tanks, refrigeration systems, etc.
7. Cost and installation of construction materials placed inside a building and used to support production machinery; for example, concrete platforms, overhead steel girders, and pipes to carry paint, etc. from storage tanks.

The following are excluded from construction:

1. Maintenance and repairs to existing structures or service facilities.
2. Cost and installation of production machinery and equipment items not specifically covered above, such as heavy industrial machinery, printing presses, stamping machines, bottling machines,

and packaging machines; special purpose equipment designed to prepare the structure for a specific use, such as steam tables in restaurants, pews in churches, lockers in school buildings, beds or X-ray machines in hospitals, and display cases and shelving in stores.

3. Drilling of gas and oil wells, including construction of offshore drilling platforms; digging and shoring of mines (construction of buildings at mine sites is included); work which is an integral part of farming operations such as plowing and planting of crops.
4. Land acquisition.

### VALUE OF CONSTRUCTION PUT IN PLACE

The “value of construction put in place” is a measure of the value of construction installed or erected at the site during a given period. For an individual project, this includes—

1. Cost of materials installed or erected.
2. Cost of labor (both by contractors and force account) and a proportionate share of the cost of construction equipment rental.
3. Contractor’s profit.
4. Cost of architectural and engineering work.
5. Miscellaneous overhead and office costs chargeable to the project on the owner’s books.
6. Interest and taxes paid during construction (except for state and locally owned projects).

The total value-in-place for a given period is the sum of the value of work done on all projects underway during this period, regardless of when work on each individual project was started or when payment was made to the contractors. For some categories, published estimates represent payments made during a period rather than the value of work actually done during that period. For other categories, estimates are derived by distributing the total construction cost of the project by means of historic construction progress patterns.

### CLASSIFICATION OF CONSTRUCTION

The following descriptions are used in classifying construction projects. Projects are classified as privately owned or government owned (state, local, or federal government). The distinction is made on the basis of ownership during the construction period.

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## Categories of Private Construction

### Residential Buildings

*New housing units* includes new houses, apartments, condominiums, and townhouses. The classification excludes residential units in buildings which are primarily nonresidential. It also excludes manufactured homes and houseboats.

*Improvements* includes remodeling, additions, and major replacements to properties subsequent to completion of original building. It includes construction of additional housing units in existing residential structures, finishing of basements and attics, modernization of kitchens, bathrooms, etc. Also included are improvements outside of residential structures, such as the addition of swimming pools and garages, and replacement of major equipment items such as water heaters, furnaces and central air-conditioners. Maintenance and repair work is not included.

### Nonresidential Buildings

*Industrial* includes all buildings and structures at manufacturing sites. Office buildings and warehouses owned by industrial companies but not constructed at an industrial site are classified as "office" and "other commercial" respectively.

*Office* includes office and professional buildings used primarily for office space. Office buildings built by public utilities for their own use are included in "public utilities." Office buildings at industrial sites are classified as "industrial"; however, an office building owned by an industrial company and not located at an industrial site is classified as "office."

*Hotels, motels* includes hotels, motels, resort lodging, tourist courts and cabins, and similar facilities.

*Other commercial* includes buildings and structures which are intended for use by wholesale, retail, or service trade establishments. For example, shopping centers or malls, department stores, low-rise banks and financial institutions, drug stores, parking garages, auto service stations and repair garages, beauty schools, grocery stores, restaurants, and dry cleaning stores are included in this category. Also included are warehouses and storage buildings, cold storage plants, grain elevators and silos, except such facilities at industrial sites.

*Religious* includes houses of worship and other religious buildings. Certain buildings, although owned by religious organizations, are not included in this category. These include educational or charitable institutions, hospitals, and publishing houses.

*Educational* includes schools, universities and other academic buildings, and associated buildings (libraries, cafeteria, dormitories, student unions, etc.). Also included are noncommercial museums, art galleries, and similar establishments. Beauty schools and dance schools are classified as "other commercial."

*Hospital and institutional* includes health care and institutional facilities. Also included are sanatoria, convalescent and rest homes, nursing homes, orphanages, and similar establishments for prolonged care. Surgical or outpatient clinics affiliated with a hospital are also part of this category. Buildings which are used primarily for doctors' offices are classified as "office."

*Miscellaneous nonresidential* includes nonresidential buildings which are not classified in any of the above categories. Motion picture studios, theatres, casinos, health clubs, and buildings which provide amusement and recreational services are included. Also included are radio and television studios and bus and airline terminal buildings. Farm buildings and buildings owned by public utility companies for their own use are included in the "farm nonresidential" and "public utilities" categories, respectively.

### Farm Nonresidential

Farm nonresidential construction includes buildings and structures such as barns, storage houses, smokehouses, and fences which are constructed on establishments having annual agricultural sales of \$1,000 or more. Also included are land improvements such as land leveling, terracing, tile drainage, and the construction of dikes, ponds, flood control systems, and roads and lanes.

### Public Utilities

For each of the public utility categories, construction expenditures are classified in terms of the industry rather than the function of the building or structure. Construction expenditures made by the following privately owned public utility companies or cooperatives are included in this category:

Railroad	Petroleum pipelines
Telephone	Electric light and power
Telegraph	Gas (manufacturing, transmission, and distribution)
Television cable	

The estimates include not only the type of construction peculiar to the operation of the utility, but also other types of nonresidential building and nonbuilding construction built by these companies for their own use, such as office buildings.

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## All Other Private

All other private construction includes all privately owned nonbuilding projects (other than built for public utility companies) which are not classified elsewhere, such as streets and bridges, parking areas not associated with a building project, dams and reservoirs, sewer and water facilities, golf courses, parks and playgrounds, and airfields.

## Categories of Public Construction

Public construction is composed of two parts: state and local construction and federal construction.

### State and local Construction

*Housing and redevelopment* includes houses, apartment buildings, and all other residential structures.

*Educational* includes primary, secondary, college and university level educational buildings and associated buildings (libraries, dining halls, dormitories, student unions, etc.). Also included are buildings which serve an educational purpose, i.e., public libraries, museums, art galleries, planetariums, observatories, arboreta, botanical and zoological gardens, archives, conservatories, etc. This category does not include institutions for the handicapped or teaching hospitals which are classified as “hospitals.”

*Hospital* includes health care and institutional facilities such as hospitals, clinics, and infirmaries. Also included are rest homes, nursing homes, sanatoria, psychiatric institutions, schools for the handicapped, orphanages, half-way homes, outpatient clinics, etc.

*Other buildings* includes general administrative buildings; police, fire, and rescue buildings; courthouses, jails and prisons; bus, streetcar, subway and railroad garages and barns, stations and related buildings; enclosed parking facilities; airport buildings; maritime transport, storage and terminal buildings; electric power generating buildings; amusement-recreational buildings; and other commercial, industrial, and miscellaneous buildings not elsewhere classified.

*Highways and streets* includes highways, streets, bridges, overpasses, tunnels, toll facilities, street lighting, and miscellaneous road construction.

*Conservation and development* includes all construction intended for water resources protection and control such as erosion control systems, fish hatcheries, spillways, levees, seawalls, waterfront bulkheads, jetties, river and harbor development, dredging and drainage, canals, irrigation facilities, docks, piers, wharves, berths, and reservoirs built other than for potable water supply.

*Sewer systems* includes storm drainage and sewerage system lines, interceptors, dry waste disposal plants, nonpotable water treatment plants and pumping stations, tunnels, outfalls, and all other sewer construction.

*Water supply facilities* includes potable water distribution systems and storage facilities such as water lines, aqueducts, water pumping stations, treatment plants, dams, reservoirs, artificial lakes, brooks, ponds, and water wells.

*Miscellaneous nonbuilding* construction includes open amusement and recreational facilities; power generating facilities; and other open construction (subway and streetcar construction, airport runways, open parking facilities, etc.).

### Federal Construction

The value-in-place estimates for federal construction are classified into nine separate categories defined below. In general, classification is based on the agency responsible for the work; for example, Veterans Administration expenditures are classified as “hospital” and Bureau of Reclamation expenditures are classified as “conservation and development.” However, the expenditures reported by a few agencies are subdivided into two or more types of construction.

*Housing* includes new family housing units and the rehabilitation of existing units constructed for the armed services. Military barracks, bachelor officers’ quarters and family housing for Coast Guard personnel are classified under “military facilities.” Housing for forest rangers and national park employees is classified under “conservation and development.”

*Industrial* includes construction done at Department of Energy research and development facilities. It also includes manufacturing, assembling and processing buildings and their related facilities such as arsenals, ordnance works, and shipyards.

*Educational* includes academic and associated buildings, laboratories and science buildings, libraries, art galleries, and museums. Educational facilities built by the Department of Defense for its personnel are included under “military facilities.” Federally owned schools on Indian reservations are included in this category.

*Hospital* includes health care and institutional facilities such as veterans’ hospitals and clinics.

*Other buildings* includes general office buildings, customs houses, courthouses, jails and prisons, except such buildings owned by the Department of Defense.

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*Military facilities*, with the specific exceptions noted below, covers construction owned by the Department of Defense and the Coast Guard. This category includes troop housing, administration and training buildings, warehouses, mess halls, recreation centers, educational facilities, airfields and airport buildings, missile sites, etc. The following specific types of construction owned by the Department of Defense are classified in the categories indicated in parentheses:

Family housing for the armed services (Residential)  
Civil Works—Construction by Army Corps of Engineers (Conservation and development)  
Department of Defense owned industrial facilities (Industrial)  
Military hospitals (Hospitals)  
Soldiers' Home (Miscellaneous construction)

*Highways and streets* includes streets, bridges, vehicular tunnels, viaducts, and forest and park roads owned by federal agencies other than the Department of Defense. Also included are the following built in connection with a federal road: culverts, drainage, erosion control, lighting, guard rails, and earthwork protective structures.

*Conservation and development* includes construction work done by agencies which are primarily engaged in the maintenance and supervision of natural resources such as the Army Corps of Engineers, Tennessee Valley Authority, and Bureau of Reclamation.

*Miscellaneous construction* includes federal airport facilities, fish and wildlife preservation facilities, Veterans Administration cemeteries, etc.

# Appendix B.

## Data Sources, Assumptions, and Methods

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### INTRODUCTION

This appendix describes the sample design and estimation procedures used to develop current estimates of value of construction put in place.

Value-in-place estimates are not published separately for individual series until data for the series are available. Therefore, publication of separate estimates is limited to quarterly data if the series is quarterly, and to annual data if the series is annual; however, projected or interpolated monthly estimates from these series are included in the monthly totals but are not shown separately.

### PRIVATE RESIDENTIAL BUILDINGS

#### New One-Unit Housing

Construction cost of new one-unit houses started each month is estimated using housing starts and sales data from the U.S. Census Bureau's Survey of Construction (SOC) at [www.census.gov/const/www/newresconstindex.html](http://www.census.gov/const/www/newresconstindex.html) (for starts) or [www.census.gov/const/www/newressalesindex.html](http://www.census.gov/const/www/newressalesindex.html) (for sales). The estimated cost of all single units started is then distributed into monthly value put in place by applying fixed patterns of monthly construction progress. The patterns are shown in Table B-1.

Construction cost is estimated separately for units built to be sold or rented and units built by the owner or for the owner on contract. In both cases, the total cost is obtained by multiplying the number of units started by an average construction cost per unit. For units built to be sold or rented, the average construction cost is the average sales price at the time of start multiplied by the factor 0.8424. This factor eliminates an estimate of the cost of "nonconstruction" items such as raw land, marketing costs, closing costs, and movable appliances. The average construction cost for units built for the owner on contract is the average contract value at time of start increased by the factor 1.102 to eliminate "nonconstruction" items and add the value of land development not already accounted for.

#### New Two-or-More-Unit Buildings

A subsample of new residential building projects with two units or more is selected from the SOC.

Once a project is selected, monthly construction progress reports are requested from the owner until the project is completed. About 2,500 projects are in the survey each month. This number includes newly selected projects as well as projects carried over from the previous months. Estimates of value put in place are obtained by multiplying the final weight of each project by the reported value and summing all projects. The final weight can be expressed as follows:

**Final weight** = (basic weight) × (unit adjustment factor) × (adjustment factor for architectural, engineering, and miscellaneous costs).

- a. **Basic weight.** The basic weight is the reciprocal of the probability of selection. Since the projects in the Two Plus Survey are a subsample of the SOC sample, the basic weight includes the reciprocal of the sampling rate used in the SOC.
- b. **Unit adjustment factor.** The unit adjustment factor is the ratio of the unbiased estimate obtained from the Census Bureau's Building Permits Survey of the number of multi-family units authorized in a month to the unbiased estimate from the Two Plus Survey of the number of multi-family units authorized in a month.
- c. **Adjustment for architectural, engineering, and miscellaneous costs.** The value put in place for the construction of a project includes the total construction cost and fees for architectural and engineering services and miscellaneous costs. However, monthly reports from sample projects do not include architectural, engineering, and miscellaneous costs. Each month's reported value is inflated to account for these costs so that the sum of the values put in place each month is the total cost of the project. This adjustment factor is defined as the ratio of the total estimated value of the project reported by the owner (construction cost and architectural, engineering, and miscellaneous costs) to the estimated construction cost of the project reported by the owner.

#### Improvements

Data for this series are obtained by the Census Bureau from household interviews in a representative sample of owner-occupied units and a mail survey of owners of a sample of rental or vacant properties. Prior to 1985,



these data were collected as part of the Census Bureau's Quarterly Household Survey of Residential Alterations and Repairs. Beginning with January 1984 statistics, estimates of expenditures on owner-occupied properties are based on data from the Consumer Expenditure Survey (CES) conducted by the Census Bureau for the Department of Labor's Bureau of Labor Statistics. A detailed description of this survey and the mail survey and a comparison of the old and new series for 1984 appear in Construction Reports, C50-85-Q1, *Residential Alterations and Repairs*, issued in October 1985. The CES was designed to provide the Bureau of Labor Statistics with a database for purposes relating to the Consumer Price Index. This survey was not designed to provide monthly estimates of residential improvements. As a result, these estimates have high variances and are not shown separately in the tables of monthly estimates.

Data from owner-occupied units are collected through a rotating panel survey design. There are three panels: one panel is interviewed during the first month of a quarter, another panel during the second month and a third panel during the last month. Each panel reports on improvements done since the previous interview 3 months ago; thus, an expenditure may be reported in the month of interview, the month before, 2 months before or 3 months before, but after the previous interview. Data collection for expenditures in a month will not be completed until 3 months after the month and an estimate based on all of the data will not be available until approximately 5 months after the month.

Data from the mail survey of owners of a sample of rental or vacant properties are collected after the end of each quarter. The expenditures are not reported for each month of the quarter but only for the entire quarter. For this report, monthly estimates need to be made by apportioning the quarterly expenditures to the months in the quarter. The quarterly estimate is available 4 months after the end of the quarter and accounts for about 24 percent of the estimate.

The estimates of total residential improvements are usually forecasted data at least 1 or 2 months in advance. The revised estimates are still based on incomplete data and in many cases are still forecasts. Estimates based on complete data are first used in the May publication for revisions to the previous year. The total improvements estimates are subject to substantial revisions from the preliminary estimates due to the necessity of forecasting. For estimates beginning in 1993, time series techniques with the X-12-ARIMA Program have been used to remove the irregular effect.

### PRIVATE NONRESIDENTIAL BUILDINGS

The Census Bureau conducts a monthly Construction Progress Reporting Survey for estimating the value of

private nonresidential building construction in the United States. This survey uses three sources of information for identifying nonresidential building projects:

1. Data from the F.W. Dodge Division of the McGraw-Hill Information Systems Company on projects valued at \$75,000 or more in the United States except Hawaii.
2. Building permit notifications for a sample of projects in the permit-issuing places of Honolulu, Maui, Kauai and Hawaii county in Hawaii.
3. Projects in a sample of areas not covered by building permit systems or reported by Dodge.

Projects from sources 1 and 2 are stratified by type of construction and construction value. Sixty-six strata are created and each stratum is assigned a specific sampling rate. Of the 66 strata, 16 are certainty strata and have a sampling rate of 1-in-1. Within each of the remaining 50 non-certainty strata, a systematic sample of projects is selected each month continuing from the sample selected from the previous month. Projects from source 3 (nonpermit areas) are selected with virtual certainty. Once a project is selected, monthly construction progress reports are requested from the owner until the project is completed. About 8,500 projects are in the survey at any one time.

Estimates of value put in place are obtained by multiplying the final weight of each project by the monthly reported value and summing all projects. The final weight can be expressed as the product of the following:

**Final weight**=(basic weight) x (outlier adjustment factor) x (adjustment factor for architectural, engineering, and miscellaneous costs)

a. **Basic weight.** The basic weight varies with each source and project.

1. For projects from sources 1 and 2, the basic weight is the reciprocal of the probability of selecting a project.
2. For projects from source 3, the basic weight is the reciprocal of the probability of selecting a nonpermit segment.

a. **Outlier adjustment factor.** This factor reduces the influence on the VIP of an extreme noncertainty observation that reports an extremely large total construction value.

b. **Adjustment factor for architectural, engineering, and miscellaneous costs.** This factor is computed in the same manner as in the Two Plus Survey (see above).

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Imputations are made for projects which have not reported at the time of the monthly tabulation, based on estimated total construction value and month of start of the project. Weighted data are summed overall sample projects by type of construction. The results are increased by 25 percent to account for undercoverage of construction projects not reported by F.W. Dodge. The adjustment for undercoverage results from comparison studies, conducted by the Census Bureau, of Dodge reports with building permits for a sample of projects for which permits were issued.

The industrial buildings category is further adjusted by benchmarking the tabulated estimates to the latest detailed structures data from the Census Bureau's Annual Capital Expenditures Survey (ACES). The 1992, 1994, and 1998 levels for industrial buildings are based upon actual ACES data. Estimates for other years are extrapolations from the 1992, 1994, and 1998 levels.

### **FARM NONRESIDENTIAL CONSTRUCTION**

Value-in-place estimates for new farm nonresidential construction are extrapolated from the annual U.S. Department of Agriculture (USDA) report, *Income and Balance Sheet Statistics*. Monthly or quarterly estimates are not available.

To estimate monthly values, including projections for the current and following year, the USDA data are developed using the trend of the "all other private" construction put-in-place estimates.

### **PUBLIC UTILITIES**

Value-in-place estimates for the telephone component of telecommunications construction are based on reports of actual monthly construction progress. For the electric light and power, gas, railroad, petroleum pipeline categories, and the TV cable component of telecommunications, construction put in place estimates are based on annual capital expenditure reports compiled by Federal regulatory agencies and private organizations.

Pending availability of annual data, monthly estimates for railroads are obtained by distributing Surface Transportation Board quarterly construction expenditures estimates into monthly values. Preliminary monthly estimates for TV cable, electric, and gas construction are based on annual forecasts from Paul Kagan Associates, Inc., the Edison Electric Institute, and the American Gas Association; and petroleum pipeline estimates are projections from the latest final year of Federal Energy Regulatory Commission data. Monthly estimates are published only for telecommunications; however, estimates for other public utilities are included in the appropriate totals.

### **ALL OTHER PRIVATE CONSTRUCTION**

Beginning with data for May 1995, estimates for this series are based upon a monthly sample survey of projects. The information for creating the sampling frame is obtained from the same F.W. Dodge data used for private nonresidential buildings (see above). Once a project is selected it remains in the survey until completion of the project, and monthly progress reports are requested from the owner. Tabulation of data is the same as for private nonresidential buildings. The results are also increased by 25 percent to account for projects not reported by F.W. Dodge.

Prior to May 1995, monthly estimates for this series are indirectly measured using Dodge contract awards statistics and construction progress patterns.

### **PUBLIC CONSTRUCTION**

Public construction is composed of two parts: State and local construction and Federal construction.

#### **State and Local**

The information for creating the sampling frame for the state and local survey is obtained from the same F.W. Dodge data used for private nonresidential buildings (see above).

The projects are stratified by type of construction and value according to the information from Dodge. Seventy-two strata are created and a sampling rate is assigned to each stratum. Of the 72 strata, 15 are certainty strata. Within each of the remaining 57 non-certainty strata, a systematic sample of projects is selected each month continuing from the sample selected from the previous month. Once a project is selected, it remains in the survey until completion of the project, and monthly construction progress reports are requested from the appropriate agency in charge of the project or its designated agent, such as the builder or architect responsible for the project. The average number of projects in the survey at any one time is about 8,500. These include newly selected projects as well as projects carried over from previous months.

Tabulation of data is the same as for private nonresidential buildings. The results are increased by 5 percent to account for construction projects not reported by F.W. Dodge. This adjustment results from a comparison study of Dodge reports with state and local agency reports for a sample of projects for which contracts were awarded or force account work started.

All data are further adjusted by benchmarking the tabulated estimates to annual construction expenditures data collected in the Census Bureau's Annual Survey of Government Finances.

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**Federal**

Monthly value-in-place estimates for federally owned construction are based on monthly data which, with few exceptions, are supplied to the Census Bureau by each federal agency involved in construction activities.

Information is obtained from federal budget documents for a small number of agencies where information cannot be directly supplied. These budget totals are pro-rated over the fiscal year to derive monthly estimates.



**Table B-1. Monthly Progress Patterns for Private One-Unit Residential Buildings by Month of Start**

[Percent of the value of units started monthly]

Month of activity <sup>1</sup>	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
1st .....	15.8	15.8	15.8	15.8	15.9	16.9	16.9	16.9	16.9	16.9	16.9	15.8
2nd .....	21.7	23.2	22.5	22.5	22.9	23.8	23.8	23.8	23.8	23.8	21.7	21.7
3rd .....	21.0	20.1	20.8	20.8	20.8	20.8	20.8	20.8	20.8	18.3	18.3	18.3
4th .....	16.3	16.0	16.0	16.0	16.0	16.0	16.0	16.0	13.7	13.7	13.7	16.8
5th .....	10.6	10.3	10.3	10.3	10.3	9.5	9.5	8.8	8.8	8.8	11.7	11.7
6th .....	6.1	6.1	6.1	6.1	6.1	5.8	5.8	5.1	5.1	7.4	7.6	6.7
7th .....	3.5	3.5	3.5	3.5	3.5	2.7	2.7	2.7	4.3	4.8	4.3	4.0
8th .....	2.0	2.0	2.0	2.0	1.5	1.5	1.5	2.5	2.8	3.3	2.8	2.0
9th .....	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.6	2.0	1.2	1.2	1.2
10th .....	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8	0.8
11th .....	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
12th .....	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.4

<sup>1</sup>Month of start is first month of activity.

# Appendix C.

## Reliability of the Estimates

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The statistics on the value of construction put in place result from direct measurement and indirect estimation. A series results from direct measurement when it is based on reports of the actual value of construction progress or construction expenditures obtained from a complete census or sample survey. All other series are developed by indirect estimation using related construction statistics.

On an annual basis, the estimates for series directly measured monthly, quarterly, or annually accounted for about 70 percent of total construction in 2001 (private multi-family residential, private residential improvements, private nonresidential buildings, farm nonresidential construction, public utility construction, all other private construction, and virtually all of public construction). On a monthly basis, directly measured data are available for about 51 percent of the value-in-place estimates.

Some of the directly measured monthly construction value-in-place estimates are based on samples. Estimates from these samples may differ from statistics which would have been obtained from a complete census using the same schedules and procedures. An estimate based on a sample survey is subject to both sampling error and nonsampling error. The accuracy of a survey result is determined by the joint effects of these errors.

### MEASURE OF SAMPLING ERRORS

Sampling error reflects the fact that only a particular sample was surveyed rather than the entire population. Each sample selected for the monthly value-in-place survey is one of a large number of similar probability samples that, by chance, might have been selected under the same specifications. Estimates derived from the different samples would differ from one another. The standard error, or sampling error, of a survey estimate is a measure of the variation among the estimates from all possible samples and, thus, is a measure of the precision with which an estimate from a particular sample approximates the average from all possible samples.

Estimates of the standard errors for the monthly, year-to-date and annual estimates were computed from the sample data for selected statistics in this report. They

are presented in the form of relative standard errors in Table C-1. The relative standard error equals the standard error divided by the estimated value to which it refers.

The sample estimate and an estimate of its standard error allow us to construct interval estimates with prescribed confidence that the interval includes the average result of all possible samples with the same size and design. A 90-percent confidence interval is defined to be from 1.6 standard errors below the estimate to 1.6 standard errors above the estimate. If all possible samples were selected and surveyed under essentially the same conditions and all the respective 90-percent confidence intervals were generated, then approximately nine-tenths of the intervals would include the average value of all sample estimates and approximately one-tenth would not include this estimate. For example, suppose Table 3 of this report showed that the monthly VIP estimate for “total private nonresidential buildings” was \$10.0 billion in a particular month. According to Table C-1, the relative standard error of this estimate is 2 percent. Multiplying \$10.0 billion by .02, we obtain \$200 million as the standard error. To obtain a 90-percent confidence interval, multiply \$200 million by 1.6 and add and subtract the result from \$10.0 billion, yielding limits of \$9.68 billion and \$10.32 billion. The average value of the monthly VIP estimate for “total private nonresidential buildings” may or may not be contained in this computed interval, but one can say that the average is included in the constructed interval with a specified confidence of 90 percent.

Table C-1 also presents coefficients necessary to compute standard errors for the month-to-month and year-to-date changes. To derive a specific standard error of a change, look up an appropriate coefficient (k1 or k2) for the change and apply the following formula:

$$\text{Standard error of a change} = k (100 + \text{percent change shown in Tables 3 through 6})$$

Once the standard error is available, one can construct a 90-percent confidence interval of the change by multiplying the standard error by 1.6.

No standard errors are shown for farm nonresidential or public utilities because the estimates are based on a complete enumeration.

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## **NONSAMPLING ERRORS**

As calculated for this report, the coefficient of variation estimates sampling variation but does not measure all nonsampling error in the data. Nonsampling error consists of both a variance component and a bias component. Bias is the difference, averaged over all possible samples of the same size and design, between the estimate and the true value being estimated. Nonsampling errors are usually attributed to many possible sources: (1) coverage error—failure to accurately represent all population units in the sample, (2) inability to obtain information about all sample cases, (3) response errors, possibly due to definitional difficulties or misreporting, (4) mistakes in recording or coding the data obtained, and (5) other errors of coverage, collection and nonresponse, response, processing, or imputing for missing or inconsistent data. These nonsampling errors also occur in complete censuses. Although no direct measures of these errors have been obtained, precautionary steps were taken in all phases of the collection, processing, and tabulation of the data to minimize their influence.

A major source of nonsampling error in the published estimates is due to the need to impute data for nonrespondents and for late and inconsistent reports. For preliminary value-in-place estimates, the average imputation rates for major components are as follows: private nonresidential construction, 49 percent; state and locally owned public construction, 33 percent; private residential construction of 2 units or more, 42 percent; and private residential improvements, 15 percent. Each of these imputation rates is not an explicit indication of the potential error in statistics, but the degree of uncertainty regarding the accuracy of the statistics increases as the percentage of imputation increases.

Other potential sources of bias are the upward adjustment of 25 percent made to the private nonresidential construction and the adjustment of the state and local owned public construction to the construction outlays from the Annual Survey of Government Finances in order to account for construction projects not included in their respective sampling frames. The adjustment for the nonresidential construction results from a coverage evaluation sample; hence, the estimated percentage adjustment is subject to sampling error and nonsampling errors associated with the evaluation study. In addition, the percentage was estimated from data collected during a limited time period; therefore, these adjustments do not reflect any recent changes in the proportion of projects not included in the frame.

For state and locally owned construction, construction outlays from the Survey of Government Finances are available only through Fiscal Year 1999. (Outlays are

included if a government agency's fiscal year ending date falls within July 1998 to June 1999 inclusive, and for three state agencies with fiscal years ending in August or September 1999.) As a result, the adjustment to the construction outlay levels of this survey must be projected ahead for 4 years from 1999 through April 2003. The relationship between the state and locally owned value-in-place and the capital outlays estimate changes from year to year so that revisions of 4 to 5 percent are expected in state and local construction and substantially larger revisions can be expected in the individual types of construction. In addition, because of the definition of fiscal year for the Survey of Government Finances, the reported capital outlays do not correspond to any 12 month period but result from capital outlays made over a 26 month period. There are also definitional and timing differences between the concepts of capital outlays and value put in place.

Consequently, even though the private nonresidential and state and local owned construction adjustments are designed to reduce the bias due to the failure to include projects in the sampling frames, for the above stated reasons, these adjustment procedures, themselves, may introduce a bias in the current estimates of value-in-place.

Furthermore, additional nonsampling errors may be introduced into the estimates because the procedures such as phasing, extrapolating, and forecasting used to develop the indirectly measured series are subject to the validity of the underlying assumptions made and mathematical models used. No explicit measures of the effects of these procedures are available.

## **MONTHLY REVISIONS TO ESTIMATES**

Statistics for the current month are preliminary estimates. These estimates are released to provide government and private data users with early measures of construction activity. A necessary part of the process of issuing these early data involves the issuance of subsequent revisions. The revisions to monthly construction put in place estimates are primarily the result of the replacement of imputed data with data which are reported in subsequent months.

For total construction, the range of the difference between the last 12 preliminary and second revision estimates for the same months was from -1.5 percent to 1.0 percent with a median of -0.1 percent (see Table C-2). The range of the difference between first revision and second revision was from -1.2 to 0.8 percent, with a median of 0.1 percent.

**Table C-1. Relative Standard Errors and Coefficients for Standard Errors of Changes**

Type of construction	Relative standard error (percent)			Coefficient for changes	
	Monthly estimate	Year-to-date estimate	Annual estimate	Month-to-month change (k1)	Year-to-date change (k2)
<b>Total construction</b> .....	<b>2</b>	<b>2</b>	<b>1</b>	<b>.03</b>	<b>.02</b>
Private construction .....	3	2	1	.04	.03
Residential buildings .....	5	3	2	.06	.05
New housing units .....	2	2	1	.01	.02
1 unit .....	2	2	2	.01	.02
2 units or more .....	4	4	3	.03	.04
Nonresidential buildings .....	2	1	1	.02	.01
Industrial .....	3	2	2	.04	.03
Office .....	4	3	2	.05	.04
Hotels, motels .....	7	6	5	.09	.08
Other commercial .....	5	3	2	.06	.04
Religious .....	9	8	5	.12	.11
Educational .....	7	5	5	.10	.07
Hospital and institutional .....	6	5	5	.07	.07
Miscellaneous buildings .....	7	5	4	.09	.07
Public construction .....	2	1	1	.03	.01
Housing and redevelopment .....	8	5	4	.11	.07
Industrial .....	(NA)	(NA)	(NA)	(NA)	(NA)
Educational .....	3	2	2	.04	.03
Hospital .....	6	5	4	.08	.07
Other public buildings .....	3	2	2	.04	.03
Highways and streets .....	4	3	2	.05	.04
Military facilities .....	(NA)	(NA)	(NA)	(NA)	(NA)
Conservation and development .....	4	3	2	.06	.04
Sewer systems .....	6	4	3	.08	.06
Water supply facilities .....	8	5	3	.11	.07
Miscellaneous public .....	8	5	4	.11	.07
State and local construction .....	2	1	1	.03	.01
Housing and redevelopment .....	8	5	5	.11	.07
Educational .....	3	2	2	.04	.03
Hospital .....	8	7	5	.11	.10
Other public buildings .....	4	3	2	.05	.04
Highways and streets .....	4	3	2	.05	.04
Conservation and development .....	16	10	9	.23	.14
Sewer systems .....	6	4	3	.08	.06
Water supply facilities .....	8	5	3	.11	.07
Miscellaneous public .....	9	6	4	.12	.09
Federal construction .....	(NA)	(NA)	(NA)	(NA)	(NA)

NA Not available.

Note: All statistics are based upon 2001 data. The coefficient (k1) for the month-to-month change is applicable to change from the previous month and change from the same month a year ago.

**Table C-2. Analysis of Revisions to Monthly Seasonally Adjusted Annual Rate Estimates in Current Dollars**

Type of construction	Percent changes between estimates - last 12 months					
	Preliminary versus second revision			First revision versus second revision		
	Range		Median	Range		Median
	From	To		From	To	
<b>Total construction</b> .....	<b>-1.5</b>	<b>1.0</b>	<b>-0.1</b>	<b>-1.2</b>	<b>0.8</b>	<b>0.1</b>
Private construction .....	-0.4	3.0	0.5	0.0	2.1	1.0
Residential buildings .....	-0.7	3.3	0.9	-0.9	2.1	0.2
New housing units .....	-0.7	1.1	0.3	-0.3	0.5	0.2
1 unit .....	-0.4	1.4	0.0	-0.2	0.2	0.0
2 units or more .....	-3.5	6.6	2.0	-2.3	7.4	0.4
Nonresidential buildings .....	-2.2	3.5	1.0	0.0	3.3	2.2
Industrial .....	-6.4	3.0	-0.1	-1.9	4.1	2.1
Office .....	-3.9	3.6	-0.3	0.0	3.3	1.4
Hotel, motel .....	-2.5	5.7	0.8	-0.5	4.4	2.5
Other commercial .....	-1.5	10.3	1.8	0.0	7.3	4.4
Religious .....	-3.1	7.9	3.5	-1.4	5.0	2.4
Educational .....	-6.4	4.6	-2.9	-2.2	1.0	-0.3
Hospital and institutional .....	-0.9	4.1	1.2	-0.9	3.4	0.9
Miscellaneous buildings .....	-4.9	5.5	2.2	-0.1	4.4	2.3
Telecommunications .....	-18.9	8.9	-3.7	-5.5	1.1	0.1
All other private .....	-9.2	18.6	1.9	-5.4	15.8	-0.9
Public construction .....	-6.9	0.9	-3.6	-5.5	-1.0	-2.5
Housing and redevelopment .....	-15.1	2.6	-4.5	-11.9	-0.7	-5.8
Industrial .....	-1.1	41.5	0.2	-0.5	0.4	-0.1
Educational .....	-12.0	0.7	-6.8	-7.0	-0.8	-3.9
Hospital .....	-13.2	8.1	0.1	-6.1	2.0	-2.1
Other public buildings .....	-6.6	7.3	-4.2	-5.2	1.4	-4.0
Highways and streets .....	-6.1	3.1	-1.3	-4.8	1.2	-2.2
Military facilities .....	-1.0	4.7	0.0	-1.0	0.6	0.0
Conservation and development .....	-3.3	4.8	1.6	-3.4	3.2	1.8
Sewer systems .....	-20.0	3.2	-8.0	-12.4	0.7	-3.8
Water supply facilities .....	-18.3	1.2	-9.5	-16.6	0.8	-6.9
Miscellaneous public .....	-4.4	6.2	2.3	-3.1	4.2	-0.1

# Appendix D.

## Adjustments for Seasonal Variations and Cost Changes

### ADJUSTMENT FOR SEASONAL VARIATIONS

Seasonally adjusted estimates result by removing normal seasonal movement from the unadjusted data to bring out underlying trends and business cycles. Seasonal adjustment accounts for month-to-month variations resulting from normal or average changes in any phenomena affecting the data such as weather conditions, the differing lengths of months, and the varying number of weekdays and weekends within each month. It neither adjusts for abnormal conditions within each month nor for year-to-year variations in weather. The relationship between unadjusted estimates and seasonally adjusted estimates can best be explained with the following scenario. Suppose the normal month-to-month change in an unadjusted series between February and March is 20 percent. Then an increase in the unadjusted series of less than 20 percent will be seen as a decrease in the seasonally adjusted series; an increase of exactly 20 percent will result in no change in the adjusted series; and an increase of more than 20 percent will be shown as an increase in the adjusted series.

An assumption underlying the seasonal adjustment process is that the original series can be separated into a seasonal component, a trend-cycle component, a trading day component, and an irregular component. The seasonally adjusted series consists of the trend-cycle and the irregular components taken together. The trend-cycle component includes the long-term and business cycle. The irregular component is made up of residual variations such as the sudden impact of political events, the effects of strikes, unusual weather conditions, reporting errors, and sampling errors. The trading-day component represents the effect due to the varying number of weekdays and weekends in each month. The seasonally adjusted monthly rate is found by dividing the unadjusted monthly estimate by its seasonal component and trading day components.

The seasonally adjusted annual rate is the seasonally adjusted monthly rate multiplied by 12. It is neither a forecast nor a projection. Rather it is a description of the annual rate at which construction is put in place in that particular month. Changes in the seasonally adjusted estimates may indicate changes in the trend or rate of construction put in place, but changes in the unadjusted estimates may be strictly due to seasonal variation. Seasonally adjusted annual rates facilitate

comparisons with previous annual data as well as with the seasonally adjusted annual rates for prior months.

The seasonally adjusted estimates or seasonal factors are obtained by running the unadjusted data through X-12-ARIMA. The X-12-ARIMA is a seasonal adjustment program developed at the U.S. Census Bureau. The program is based on the Bureau's earlier X-11 program and the X-11-ARIMA/88 program developed at Statistics Canada. Table D-1 provides a description of the components found in seasonally adjusted series. Further information on X-12-ARIMA is available on the Internet at [www.census.gov/pub/ts](http://www.census.gov/pub/ts). Also, a list of frequently asked questions (FAQ) on seasonal adjustment may be seen at [www.census.gov/const/www/faq2.html](http://www.census.gov/const/www/faq2.html).

Each monthly series is run through the X-12-ARIMA program every month as new data become available. This procedure, known as concurrent seasonal adjustment, utilizes the current month estimate to calculate that month's seasonal adjustment factor. Several studies indicate that use of the most current data to estimate seasonal factors is generally effective; the seasonal factors are subject to less revision. Table D-2 shows the past 11 months and the year ago seasonal factors. Seasonal factors that are shown in this table are the combined factors of the seasonal and trading data where appropriate.

As the unadjusted data are revised, so are the seasonal factors. Thus, changes in seasonally adjusted estimates will not only reflect changes in the unadjusted data, but also changes to the seasonal factors. In addition, the seasonally adjusted data are revised back for 4 years each year with the release of May data.

### ADJUSTMENT FOR COST CHANGES

The monthly value-in-place estimates in current dollars are converted to a constant 1996 dollar series using cost indexes derived for each category of construction. The deflators for the various categories are related indexes or combinations of related indexes from private companies and federal agencies. The selection of the indexes and procedures used for developing the

deflators for each category resulted primarily from recommendations made jointly by the Bureau of Economic Analysis and the Census Bureau.<sup>1</sup>

The index or combinations of indexes which apply to the individual categories of construction are shown in Table D-3. These indexes are indicated in the column headed "Applicable deflating index."

Since most of the indexes were originally compiled for different base years, all indexes were converted to the 1996 dollar base (1996=100).

Indexes which are available quarterly or semiannually are linked with a "monthly trend index" shown in Table D-3. The results are monthly indexes which have the movement of the monthly trend index and the level of the quarterly or semiannual index.

Table D-4 shows the indexes used to deflate value put in place. The source and description of each index follow:

**U.S. Census Bureau Composite Fixed-Weighted Price Index** (Source: U.S. Census Bureau, U.S. Department of Commerce, Washington, DC)

The composite index is a weighted average of the individual price index series used to deflate the value-in-place series. In calculating the index each month, the weights (the composition of current dollar value-in-place in 1996 by category of construction) are held constant. Consequently, the index reflects only changes in prices. The composite index is calculated using the U.S. Census Bureau Single-Family Houses Under Construction Fixed-Weighted Price Index.

The annual index is an average of the monthly indexes. Monthly and annual indexes are shown in Table D-5.

**U.S. Census Bureau Implicit Price Deflator** (Source: U.S. Census Bureau, U.S. Department of Commerce, Washington, DC)

The implicit price deflator is a derived ratio of total current to constant dollar value put in place (multiplied by 100). It is the average of the individual price indexes used in the deflation of value put in place, but the indexes are weighted by the changing composition of value put in place each month. Consequently, the implicit price deflator reflects not only changes in prices, but also changes in the composition of value put in place, and its use as a measure of price change is discouraged. Monthly and annual deflators are shown in Table D-6.

<sup>1</sup>A description of the deflators and their development appears in Part 1 of the August 1974 issue of the *Survey of Current Business*, U.S. Department of Commerce.

**Engineering News-Record Indexes** (Source: *Engineering News-Record*, McGraw-Hill Publishing Company, New York, NY)

*Engineering News-Record* (ENR) compiles monthly national cost indexes with 1913 as the base period for total construction and for buildings.

Both the construction index and the building index have four components—three materials items plus labor. The materials items for both indexes are as follows: 1) the base price of structural steel, which is a 20-city average of wholesale prices; 2) consumers' net price of cement, which is a 20-city average of f.o.b. bulk prices; 3) lumber, which is 2" x 4" S4Spine and fir in carload lots (ENR 20-city average). The labor component of the construction cost index, which is designed to show the movement of construction cost in general, is the common labor rate (ENR 20-city average), while the labor component of the building cost index is the skilled labor rate (ENR 20-city average).

The component series are weighted according to their relative importance as determined by the compilers. As a step in arriving at the weights, the average production of steel and cement in the years 1913, 1916, and 1919; average production of lumber for 1913 and 1916; and the number of common industrial laborers according to the 1919 Census were placed on a dollar-value basis using 1913 average prices as compiled by ENR wherever possible.

A complete description of the quantities and unit prices or labor rates used in developing the weights for the materials and labor components of both indexes is published in *Business Statistics*, 1963 Edition, a supplement to the *Survey of Current Business*, published by the Office of Business Economics (now the Bureau of Economic Analysis), U.S. Department of Commerce.

Annual indexes are averages of the monthly indexes.

More information about the indexes can be found on the ENR Internet site at [www.enr.com](http://www.enr.com).

**Federal Highway Administration Composite Index** (Source: Federal Highway Administration, U.S. Department of Transportation, Washington, DC)

The composite index is compiled quarterly with 1987 as the base period. The index is derived from average unit bid prices for fixed amounts of the following items put in place: common excavation, surfacing (portland cement concrete and bituminous concrete), and structures (reinforcing steel, structural steel, and structural concrete).

To eliminate erratic quarter-to-quarter movement in the Federal Highway Administration composite index, the quarterly index is adjusted with the application of 12-quarter phasing patterns based upon highway construction activity.



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The annual index is a weighted average of the indicator items for the composite index.

**U.S. Census Bureau Single-Family Houses Under Construction Fixed-Weighted Price Index** (Source: U.S. Census Bureau, U.S. Department of Commerce, Washington, DC)

This price index is designed to measure changes over time in the price of new single-family houses under construction each month and year. It is calculated using the “hedonic” or regression methodology whereby physical characteristics of new houses are regressed against house values to obtain “prices” of those characteristics. These prices can then be used in an index calculation such that “quality” of new houses is kept constant and inflation measured.

The index is based on the Laspeyres index methodology which compares the current period construction value of the kinds of houses built in the base year (1996) to the actual houses built in 1996. In effect, a fixed market basket of goods is repriced each time period, and the index reflects only changes in prices.

The price index is computed from information on the physical characteristics and transaction prices obtained from the Census Bureau’s Survey of Construction. The annual index is computed independently of the monthly indexes, and may not equal the average of the monthly indexes.

Detailed information on the methodology used to calculate this index is available upon request.

**U.S. Census Bureau Single-Family Houses Under Construction Price Deflator** (Source: U.S. Census Bureau, U.S. Department of Commerce, Washington, DC)

The index is calculated based on the same data and regression analysis described above under the U.S. Census Bureau Single-Family Houses Under Construction Fixed-Weighted Price Index. In the calculation of the deflator index series, however, the Fisher ideal chain-type annual-weighted index methodology is employed in place of the Laspeyres.

Monthly Fisher Ideal indexes are derived directly. The annual Fisher Ideal index is computed indirectly as a weighted average of the monthly Fisher Ideal indexes.

**Bureau of Reclamation Composite Index** (Source: Bureau of Reclamation, U.S. Department of Interior, Denver, CO)

The index is compiled quarterly with 1977 as the base period. The Bureau of Reclamation composite index for dams and reclamation projects reflects the Bureau of Reclamation’s cost of constructing these projects in 17 Western States. The index is a weighted average of

costs of labor, materials, and equipment furnished by contractors and the government. When possible, labor and materials costs are based on unit bid prices from contracts let by the Bureau of Reclamation. These data are supplemented by components of the Federal Highway Administration index, Bureau of Labor Statistics wholesale indexes, quotations of wage rates published in *Engineering News-Record* and judgment of Bureau of Reclamation analysts.

For 11 categories of reclamation work listed below, basic cost components have been defined and relative weights for each of these components derived from contracts awarded during the period 1930-46. This is a fixed weight index with weights determined within each category for labor, materials, and equipment furnished by contractors and the government.

The major categories of work which make up the composite index are—dams, pumping plants, steel penstocks and discharge pipes, canals and conduits, laterals and drains, hydroelectric power plants, concrete pipelines, switchyards and substations, transmission lines, general property (buildings), and roads and bridges.

The Census Bureau computes an annual index by averaging the quarterly indexes.

This index is available on the Internet at [www.usbr.gov/tsc/cost\\_trend.html](http://www.usbr.gov/tsc/cost_trend.html).

**Turner Construction Company Index** (Source: Turner Construction Company, New York, NY)

This index is compiled quarterly with 1967 as the base period. The index is a price index for national building construction costs and is derived from the firm’s current cost experience with respect to the following factors considered on a nationwide basis: labor rates and productivity, material prices, and the competitive condition of the market place.

The annual index is an average of the quarterly indexes.

This index is available on the Internet at [www.turnerconstruction.com](http://www.turnerconstruction.com).

**Handy-Whitman Indexes** (Source: Computed by the U.S. Census Bureau from data compiled by Whitman, Requardt and Associates, Baltimore, MD)

Whitman, Requardt and Associates compile semiannual (January and July) cost indexes for various elements for four types of construction—utility buildings, electric light and power plants, gas plants, and water—within six geographical regions. The base period for the utility indexes is 1973. The Census Bureau computes semiannual national average indexes for the types of construction as follows:



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*Utility Buildings.* The national average is a simple average of indexes for reinforced concrete buildings and brick buildings in each of the six regions.

*Electric Light and Power Plants.* The national average is a simple average of indexes for total construction and equipment for steam operated electric plants in each of the six regions.

*Gas.* The national average is a simple average of indexes for total gas plant in each of the six regions.

*Water.* The national average is a simple average of indexes for structures and improvements at water facilities in each of the six regions.

Each of the original source indexes is based on prices for materials, labor costs, and prices of mechanical and electrical equipment. Prices of basic materials such as cement, sand, stone, cast iron pipe, wire, and the like are obtained from standard publications such as *Engineering News-Record* and checked against prices actually being paid for such materials. Labor cost trends are computed from labor rates obtained from sources such as the Construction Labor Research Council. Mechanical and electrical equipment prices and trends are obtained from nationally known manufacturers and operating utilities.

**C.A. Turner Telephone Plant Index** (Source: Computed by U.S. Census Bureau from data compiled by AUS Consultants Inc., Harrisburg, PA)

AUS Consultants developed an independent telephone plant index in 1977. This index had been published since then through affiliation with Whitman, Requardt and Associates as the Handy-Whitman Index of Public Utility Construction Cost for the telephone industry. As of January 1, 1990, Handy-Whitman no longer publishes the index which is now available only through C.A. Turner, the publications division of AUS Consultants.

The telephone plant index numbers cover each major FCC plant account and are published with 1973 as the base period at January 1 and July 1 price levels each year. Data from many operating companies and suppliers related to construction methods, plant investment, and component costs are analyzed and summarized as a basis for preparing the index.

The Census Bureau computes a semiannual national index by averaging the weighted component indexes published for the six geographic regions.

Table D-1. **Average Percentage Changes and Related Measures of Variability for the Value of Construction Put in Place**

Type of construction	Average percentage change				$\bar{I}/\bar{C}$	MCD
	$\bar{O}$	$\bar{C}$	$\bar{I}$	$\bar{C}$		
<b>Total construction</b> .....	<b>5.86</b>	<b>1.13</b>	<b>0.91</b>	<b>0.60</b>	<b>1.52</b>	<b>2</b>
Private construction.....	4.87	1.17	0.89	0.65	1.37	2
Residential buildings.....	6.41	1.21	0.67	0.90	0.75	1
Nonresidential buildings.....	3.97	2.05	1.74	0.94	1.86	2
Public construction.....	8.94	2.25	2.03	0.77	2.65	4
Buildings.....	5.38	2.55	2.35	0.92	2.56	3
Military facilities.....	17.88	11.30	10.84	2.32	4.67	5
Highways.....	18.43	4.10	3.79	1.11	3.42	5
Conservation and development.....	15.71	7.83	7.65	1.64	4.68	5
All other public.....	7.77	4.47	4.14	1.10	3.77	5

### DEFINITIONS OF SUMMARY MEASURES

Summary measures of the seasonal, cyclical, and irregular components of the construction put in place series provide a rough guide for use in interpreting current percentage changes in the seasonally adjusted data. Detailed explanations of the basic method and definitions of the measures used appear in Electronic Computers and Business Indicators, Occasional Paper 57, National Bureau of Economic Research, New York, 1957.

The following are brief descriptions of the measures shown in Table D-1:

- $\bar{O}$  is the average month-to-month percentage change (without regard to sign) in the original series before seasonal adjustment.
- $\bar{C}$  is the average month-to-month percentage change (without regard to sign) in the seasonally adjusted figures.
- $\bar{I}$  is the average month-to-month percentage change (without regard to sign) for the irregular component. The irregular component is obtained by dividing the cyclical component into the seasonally adjusted series.
- $\bar{C}$  is the average month-to-month percentage change (without regard to sign) for the cyclical component, which is a smooth, flexible moving average.
- $\bar{I}/\bar{C}$  is the average month-to-month percentage change (without regard to sign) of the irregular component divided by the average month-to-month percentage change (without regard to sign) of the cyclical component. It serves as an indication of the series' relative smoothness (small values) or irregularity (large values).
- MCD (months for cyclical dominance) gives an estimate of the appropriate time span over which to observe cyclical movements in a monthly series. In deriving MCD, the average percentage changes (without regard to sign) in the irregular and in the cyclical component are computed for 1-month spans (Jan.-Feb., Feb.-Mar., etc.), 2-month spans (Jan.-Mar., Feb.-Apr., etc.), up to 12-month spans. MCD is the shortest span for which the average percentage change (without regard to sign) in the cyclical component is larger than the average percentage change (without regard to sign) in the irregular component; thus, it indicates the point at which fluctuations begin to be more attributable to cyclical than to irregular movements.

**Table D-2. Factors Used to Seasonally Adjust Estimates of the Value of Construction Put in Place**

[Percent]

Type of construction	May 2002 <sup>P</sup>	Apr. 2002 <sup>r</sup>	Mar. 2002 <sup>r</sup>	Feb. 2002 <sup>r</sup>	Jan. 2002 <sup>r</sup>	Dec. 2001 <sup>r</sup>	Nov. 2001 <sup>r</sup>	Oct. 2001 <sup>r</sup>	Sep. 2001 <sup>r</sup>	Aug. 2001 <sup>r</sup>	July 2001 <sup>r</sup>	May 2001 <sup>r</sup>
<b>PRIVATE CONSTRUCTION</b>												
Residential buildings:												
New housing units:												
1 unit .....	103.4	97.1	92.1	77.4	81.8	88.0	104.4	109.0	111.7	113.5	112.6	103.5
2 units or more.....	104.9	99.2	95.6	89.0	90.7	94.7	100.7	105.1	102.3	106.8	103.7	105.3
Nonresidential buildings:												
Industrial .....	99.1	97.0	94.5	88.3	90.1	101.4	102.8	108.0	106.0	104.6	103.3	101.0
Office .....	104.0	100.6	97.2	92.6	93.4	95.6	102.3	104.9	102.4	104.1	101.1	104.9
Hotels, motels .....	100.6	102.3	96.4	94.0	94.8	98.6	100.9	102.4	100.0	102.7	101.3	102.4
Other commercial .....	100.8	96.0	91.6	85.8	84.4	93.6	103.7	109.9	111.0	110.9	107.0	101.1
Religious .....	95.0	95.9	90.2	88.9	93.6	98.2	107.9	112.7	108.5	107.8	100.9	98.4
Educational.....	103.4	95.1	90.4	85.0	84.6	88.9	96.2	100.4	106.4	119.0	117.1	103.7
Hospital and institutional .....	101.3	101.1	99.2	94.5	93.3	98.8	103.4	104.0	102.5	102.0	97.9	101.1
Miscellaneous nonresidential .....	102.3	102.4	99.0	91.9	89.4	97.1	102.1	105.1	103.0	103.2	101.5	102.0
Telecommunications .....	103.0	96.7	92.7	84.2	84.0	102.1	110.9	113.8	97.9	112.5	100.3	102.6
All other private .....	94.9	90.4	88.6	81.2	84.1	103.2	105.4	114.5	112.9	117.4	107.4	95.3
<b>PUBLIC CONSTRUCTION</b>												
<b>State and Local</b>												
Buildings:												
Housing and redevelopment .....	103.3	99.1	93.7	87.3	91.0	97.3	102.8	108.9	106.5	100.8	99.5	103.7
Educational.....	97.1	91.4	84.5	81.0	83.1	88.9	95.2	105.4	114.6	127.6	120.2	96.7
Hospital .....	102.9	99.3	93.2	90.9	94.4	96.0	101.8	109.3	103.7	102.2	101.3	102.5
Other buildings.....	102.9	100.4	92.2	88.8	89.9	94.0	104.0	108.0	105.3	106.7	101.7	103.8
Highways and streets .....	107.0	82.3	63.2	53.8	57.9	71.9	101.9	131.0	132.7	144.9	127.0	106.6
Conservation and development .....	102.6	94.2	82.7	77.9	77.4	89.5	102.7	118.0	117.5	119.1	109.8	101.6
Sewer systems.....	102.1	95.6	88.8	80.3	82.6	89.0	104.5	113.3	113.2	112.8	106.4	102.4
Water supply facilities.....	103.7	97.2	87.0	82.4	81.1	91.6	105.5	116.5	110.2	109.7	108.5	104.0
Miscellaneous construction .....	102.6	94.2	82.7	77.9	77.4	89.5	102.7	118.0	117.5	119.1	109.8	101.6
<b>Federal</b>												
Buildings:												
Housing and redevelopment .....	96.3	97.8	98.7	89.7	91.7	102.9	97.7	88.5	133.5	99.4	101.7	95.0
Industrial .....	96.3	97.8	98.7	89.7	91.7	102.9	97.7	88.5	133.5	99.4	101.7	95.0
Educational.....	96.3	97.8	98.7	89.7	91.7	102.9	97.7	88.5	133.5	99.4	101.7	95.0
Hospital .....	96.3	97.8	98.7	89.7	91.7	102.9	97.7	88.5	133.5	99.4	101.7	95.0
Other buildings.....	96.3	97.8	98.7	89.7	91.7	102.9	97.7	88.5	133.5	99.4	101.7	95.0
Military .....	101.7	94.6	102.3	86.5	90.7	103.2	103.5	81.2	125.4	103.8	102.2	100.9
Conservation and development .....	99.2	95.4	96.8	88.7	89.2	92.7	102.3	74.0	152.5	111.2	96.0	97.1
Miscellaneous construction .....	99.2	95.4	96.8	88.7	89.2	92.7	102.3	74.0	152.5	111.2	96.0	97.1

<sup>P</sup>Preliminary. <sup>r</sup>Revised.

**Table D-3. Sources of Cost Indexes Used to Derive Estimates of the Value of Construction Put in Place in 1996 Dollars**

Type of construction	Applicable deflating index		Monthly trend index
	Name of index	Availability	
Residential buildings . . . . .	U.S. Census Bureau Single-Family Houses Under Construction . . . . .	Monthly	
Industrial buildings . . . . .	Unweighted average of—		
Office buildings . . . . .	Turner Construction Company . . . . .	Quarterly	Engineering News-Record—buildings
Hotels and motels . . . . .	U.S. Census Bureau Single-Family Houses Under Construction . . . . .	Monthly	
Other commercial buildings . . . . .			
Educational buildings . . . . .			
Hospital and institutional buildings . . . . .			
Religious buildings . . . . .			
Miscellaneous nonresidential buildings . . . . .			
Farm nonresidential . . . . .			
Railroads . . . . .	Unweighted average of—		
	Federal Highway Admin.-composite . . . . .	Quarterly	Engineering News-Record—construction
	Bureau of Reclamation . . . . .	Quarterly	Engineering News-Record—construction
Telecommunications . . . . .	C.A. Turner Telephone Plant . . . . .	Semiannually	Engineering News-Record—construction
Electric light and power . . . . .	Weighted average of—		
	Handy-Whitman—electric (weight 9) . . . . .	Semiannually	Engineering News-Record—construction
	Handy-Whitman—utility building (weight 1) . . . . .	Semiannually	Engineering News-Record—buildings
Gas and petroleum pipelines . . . . .	Handy-Whitman—gas . . . . .	Semiannually	Engineering News-Record—construction
Military facilities . . . . .	Weighted average of—		
	Federal Highway Admin.-composite (weight 2) . . . . .	Quarterly	Engineering News-Record—construction
	U.S. Census Bureau Single-Family Houses Under Construction (weight 1) . . . . .	Monthly	
	Turner Construction Company (weight 1) . . . . .	Quarterly	Engineering News-Record—construction
Highways and streets . . . . .	Federal Highway Admin.-composite . . . . .	Quarterly	Engineering News-Record—construction
Sewer systems and conservation and development . . . . .	Bureau of Reclamation . . . . .	Quarterly	Engineering News-Record—construction
Water supply facilities . . . . .	Handy-Whitman—water . . . . .	Semiannually	Engineering News-Record—construction
All other private and public . . . . .	Unweighted average of—		
	Federal Highway Admin.-composite . . . . .	Quarterly	Engineering News-Record—construction
	Bureau of Reclamation . . . . .	Quarterly	Engineering News-Record—construction

Note: Federal Highway Administration composite index, adjusted with the application of 12-quarter phasing patterns, is used before the monthly indexes are developed.

Table D-4. **Indexes Used in Deriving Estimates of the Value of Construction Put in Place in Constant Dollars**

[1996 = 100]

Period	U.S. Census Bureau		Engineering News-Record		U.S. Census Bureau Houses Under Construction		Federal Highway Administration composite	Bureau of Reclamation	Turner Construction Company	Handy-Whitman public utility				C.A. Turner telephone plant
	Composite fixed-weighted	Implicit price deflator	Buildings	Construction	Fixed-weighted	Price deflator				Buildings	Electric	Gas	Water	
	Annual indexes													
1997.....	103.2	103.3	105.0	103.6	102.9	102.9	107.5	103	104	103	102	102	102	102
1998.....	106.0	106.1	105.8	105.3	105.6	105.6	105.2	105	109	104	104	104	104	102
1999.....	110.3	110.4	107.9	107.8	110.4	110.4	111.9	107	113	107	105	107	107	101
2000.....	115.3	115.4	110.5	110.7	115.4	115.5	119.3	111	118	110	109	111	112	103
2001.....	119.6	119.6	111.6	112.8	120.6	120.5	118.7	112	121	113	113	114	116	106
	Monthly indexes						Quarterly indexes			Semiannual indexes				
2000: January .....	113.3	113.3	109.4	109.0	113.6	113.7								
February .....	113.7	113.8	110.0	109.6	114.0	114.1	113.2	109	116					
March.....	114.0	113.9	110.4	110.3	114.4	114.4				109	106	110	108	101
April.....	114.5	114.6	110.3	110.3	114.6	114.7								
May.....	114.8	114.9	111.1	110.9	114.9	115.1	128.4	111	117					
June.....	115.1	115.1	110.9	111.0	115.3	115.5								
July.....	115.6	115.6	110.7	110.7	115.7	115.8								
August.....	115.8	115.8	110.7	110.9	115.9	115.9	113.0	111	119					
September .....	116.1	115.9	110.5	110.7	116.3	116.2				111	110	111	113	103
October.....	116.5	116.4	110.5	110.7	116.6	116.5								
November.....	116.8	116.7	110.6	111.4	116.9	116.9	122.9	111	120					
December.....	117.2	117.1	110.8	111.7	117.6	117.7								
2001: January .....	117.8	117.9	110.7	111.7	118.2	118.4								
February.....	118.3	118.3	110.4	111.6	118.7	118.8	123.9	112	121					
March.....	118.7	118.6	110.5	111.7	119.2	119.2				112	111	113	115	105
April.....	118.8	118.7	110.5	111.8	119.7	119.6								
May.....	119.2	119.0	110.7	111.8	120.3	120.1	111.9	112	121					
June.....	119.7	119.5	111.5	112.4	120.3	120.1								
July.....	119.6	119.4	113.2	113.9	120.5	120.2								
August.....	119.9	119.7	112.6	113.6	121.1	120.9	115.2	112	122					
September.....	120.2	120.0	112.3	113.7	121.4	121.3				114	112	114	117	106
October.....	120.9	120.8	112.4	113.8	122.3	122.2								
November.....	121.1	121.0	112.3	114.0	122.8	122.7	127.1	113	122					
December.....	121.5	121.2	111.7	113.7	122.9	122.7								
2002: January.....	<sup>r</sup> 121.5	<sup>r</sup> 121.2	111.8	114.9	<sup>r</sup> 123.0	<sup>r</sup> 122.6								
February.....	<sup>r</sup> 121.5	<sup>r</sup> 121.2	111.8	114.9	<sup>r</sup> 122.7	<sup>r</sup> 122.4	121.6	113	122					
March.....	<sup>r</sup> 121.3	<sup>r</sup> 121.3	112.3	115.6	<sup>r</sup> 122.6	<sup>r</sup> 122.7				114	114	115	117	107
April.....	<sup>r</sup> 121.3	<sup>r</sup> 121.4	111.8	115.3	<sup>r</sup> 122.2	<sup>r</sup> 122.4								
May.....	<sup>p</sup> 121.5	<sup>p</sup> 121.5	112.8	115.8	<sup>p</sup> 122.3	<sup>p</sup> 122.5	(NA)	113	122					
June.....			113.1	116.2										

NA Not available. <sup>p</sup>Preliminary. <sup>r</sup>Revised.

**Table D-5. Monthly U.S. Census Bureau Composite Fixed-Weighted Price Index: 1964 to 2002**  
 [1996=100]

Year	Month												Annual composite index
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept	Oct.	Nov.	Dec.	
1964	18.7	18.3	18.0	18.3	18.5	18.6	18.5	18.4	18.4	18.7	18.8	18.9	18.5
1965	18.9	18.8	18.8	18.8	19.0	19.1	19.0	19.0	19.0	19.4	19.6	19.7	19.1
1966	19.5	19.3	19.3	19.8	20.2	20.2	20.1	20.0	19.9	20.2	20.3	20.5	19.9
1967	20.3	20.2	20.3	20.3	20.4	20.4	20.5	20.6	20.7	20.8	20.9	21.1	20.5
1968	21.2	21.3	21.4	21.5	21.6	21.6	21.5	21.6	21.7	22.0	22.4	22.8	21.7
1969	22.6	22.7	22.9	23.0	23.3	23.1	23.3	23.2	23.2	23.5	23.7	23.8	23.2
1970	23.7	23.8	24.0	24.5	24.8	25.2	24.7	24.4	24.4	24.6	24.7	25.1	24.5
1971	25.0	25.6	25.8	25.9	25.9	26.1	26.2	26.7	26.6	26.8	27.0	27.2	26.2
1972	27.3	27.3	27.5	27.5	27.5	27.6	27.8	28.1	28.3	28.6	28.8	29.2	28.0
1973	29.2	29.2	29.5	29.8	30.0	30.1	30.5	30.9	31.1	31.4	31.6	31.7	30.4
1974	32.3	32.5	33.3	33.1	33.5	34.5	34.9	34.9	35.1	35.4	35.8	36.0	34.3
1975	36.4	36.3	36.4	36.7	37.1	37.4	37.4	37.1	37.5	37.6	37.8	38.1	37.2
1976	38.0	38.0	38.1	38.5	39.1	39.4	39.5	39.4	39.5	39.8	40.0	40.2	39.1
1977	40.8	41.0	41.2	41.4	41.9	42.5	42.6	42.9	43.3	43.5	43.9	44.4	42.5
1978	44.8	45.1	45.4	45.9	46.2	46.7	47.1	47.6	48.1	48.7	49.3	49.7	47.1
1979	50.2	50.7	50.9	51.3	52.2	53.0	53.4	54.1	54.4	54.9	55.5	55.9	53.0
1980	56.7	57.2	57.5	57.8	58.5	59.3	59.9	60.2	60.4	60.9	61.4	61.7	59.3
1981	62.1	62.4	63.1	63.4	63.6	63.9	64.2	64.4	64.4	65.0	65.2	65.3	63.9
1982	65.4	65.3	65.4	65.4	65.6	65.9	65.6	65.7	65.8	65.7	66.1	66.2	65.7
1983	66.6	66.5	66.4	66.2	66.8	67.2	67.3	67.4	67.4	67.9	68.1	68.3	67.2
1984	68.5	68.8	69.0	69.0	69.3	69.5	69.7	70.2	70.5	70.9	71.0	71.0	69.8
1985	71.3	71.2	71.3	71.2	71.4	71.6	71.7	71.8	72.1	72.4	72.6	73.0	71.8
1986	73.4	73.5	73.7	73.9	74.3	74.7	75.0	75.1	75.4	75.8	76.1	76.5	74.8
1987	76.7	76.9	77.0	77.2	77.3	77.6	77.8	77.9	78.0	78.1	78.7	79.0	77.7
1988	79.5	79.7	79.7	79.7	80.0	80.1	80.3	80.5	80.8	81.1	81.4	81.5	80.4
1989	81.7	82.2	82.3	82.7	83.0	83.1	83.4	83.7	83.9	84.0	84.1	84.2	83.2
1990	84.5	84.6	84.8	84.9	85.1	85.4	85.8	86.0	86.0	86.0	86.3	86.3	85.5
1991	86.3	86.2	85.9	85.8	86.0	86.4	86.5	86.5	86.4	86.2	86.1	86.0	86.2
1992	86.0	86.2	86.2	86.4	86.3	86.4	86.5	86.7	86.9	87.4	87.7	88.2	86.7
1993	88.4	88.8	89.4	89.8	89.5	89.4	89.9	90.4	90.7	91.0	91.5	91.9	90.1
1994	92.2	92.4	92.5	92.6	93.0	93.4	93.8	94.2	94.7	95.2	95.9	96.6	93.9
1995	97.1	97.1	97.1	97.1	97.4	97.8	97.8	97.9	98.2	98.5	98.4	98.4	97.7
1996	98.8	99.0	99.1	99.0	99.2	99.6	100.2	100.4	100.7	100.9	100.9	101.3	100.0
1997	101.7	101.8	102.2	102.5	102.7	102.9	103.3	103.5	103.9	104.2	104.7	104.8	103.2
1998	104.9	104.7	104.8	105.0	105.3	105.9	106.2	106.5	106.6	106.9	107.3	107.9	106.0
1999	108.3	108.6	109.0	109.4	109.8	110.5	110.7	110.8	110.9	111.4	111.9	112.3	110.3
2000	113.3	113.7	114.0	114.5	114.8	115.1	115.6	115.8	116.1	116.5	116.8	117.2	115.3
2001	117.8	118.3	118.7	118.8	119.2	119.7	119.6	119.9	120.2	120.9	121.1	121.5	119.6
2002	<sup>r</sup> 121.5	<sup>r</sup> 121.5	<sup>r</sup> 121.3	<sup>r</sup> 121.3	<sup>p</sup> 121.5								

<sup>p</sup>Preliminary. <sup>r</sup>Revised.

**Table D-6. Monthly U.S. Census Bureau Implicit Price Deflator: 1964 to 2002**

[1996=100]

Year	Month												Annual deflator
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept	Oct.	Nov.	Dec.	
1964	18.6	18.2	17.9	18.3	18.5	18.6	18.6	18.5	18.5	18.6	18.8	18.8	18.5
1965	18.9	18.8	18.8	18.8	19.0	19.1	19.1	19.0	19.0	19.3	19.6	19.6	19.1
1966	19.4	19.2	19.3	19.7	20.2	20.2	20.0	19.9	19.9	20.2	20.3	20.4	19.9
1967	20.3	20.2	20.3	20.3	20.4	20.4	20.6	20.6	20.7	20.8	20.9	21.1	20.6
1968	21.1	21.3	21.4	21.4	21.6	21.6	21.5	21.6	21.7	22.0	22.4	22.7	21.7
1969	22.6	22.6	22.8	22.9	23.2	23.1	23.3	23.2	23.2	23.6	23.8	24.0	23.2
1970	23.8	23.8	24.1	24.6	24.9	25.3	24.9	24.7	24.7	24.9	24.9	25.2	24.7
1971	25.0	25.7	25.8	25.9	25.9	26.1	26.2	26.7	26.7	26.8	27.0	27.2	26.3
1972	27.2	27.3	27.5	27.5	27.5	27.5	27.7	28.1	28.1	28.5	28.7	29.1	27.9
1973	29.0	29.1	29.3	29.8	29.9	30.0	30.4	30.8	31.0	31.3	31.6	31.7	30.4
1974	32.2	32.7	33.4	33.2	33.7	34.7	35.0	35.1	35.3	35.8	36.2	36.5	34.5
1975	36.9	36.9	36.9	37.2	37.6	38.0	38.0	37.8	38.1	38.2	38.4	38.6	37.8
1976	38.3	38.3	38.4	38.9	39.5	39.8	39.9	39.9	40.0	40.1	40.2	40.4	39.5
1977	40.7	41.0	41.1	41.2	41.8	42.6	42.7	43.2	43.5	43.7	44.0	44.3	42.6
1978	44.7	45.1	45.6	46.2	46.4	47.3	47.6	48.2	48.3	48.9	49.2	49.5	47.5
1979	49.7	50.1	50.4	50.9	52.2	53.1	53.5	54.4	54.4	55.2	55.4	55.6	53.1
1980	56.1	56.7	57.0	57.4	58.2	59.1	59.7	59.7	60.1	60.8	61.0	61.1	59.0
1981	61.5	61.8	62.6	62.7	63.0	63.5	63.9	64.1	64.2	64.7	64.6	64.6	63.5
1982	64.8	64.8	65.2	65.1	65.7	66.2	66.1	66.5	66.6	66.3	66.4	66.4	65.9
1983	66.8	66.7	66.6	66.4	66.7	67.0	67.1	67.1	67.1	67.6	67.6	67.7	67.1
1984	68.1	68.5	68.6	68.6	68.7	68.8	69.2	69.7	69.8	70.0	70.0	70.1	69.3
1985	70.5	70.6	70.8	70.6	70.7	70.8	70.9	71.1	71.3	71.6	71.7	71.8	71.1
1986	72.3	72.4	72.6	72.8	73.1	73.4	73.7	73.9	74.2	74.5	74.7	75.0	73.6
1987	75.3	75.4	75.4	75.7	75.8	76.2	76.5	76.6	76.7	76.9	77.3	77.5	76.3
1988	78.1	78.4	78.5	78.6	78.8	78.9	79.1	79.3	79.6	79.9	80.1	80.3	79.2
1989	80.7	81.1	81.3	81.8	82.3	82.4	82.6	82.8	83.0	83.1	83.2	83.5	82.4
1990	84.0	84.1	84.2	84.4	84.6	84.9	85.3	85.6	85.5	85.7	85.7	85.7	85.0
1991	85.6	85.6	85.2	85.4	85.6	86.0	86.2	86.3	86.3	86.2	85.9	85.9	85.9
1992	86.0	86.3	86.3	86.4	86.4	86.6	86.8	86.9	87.2	87.6	88.0	88.4	86.9
1993	88.7	89.0	89.6	89.9	89.6	89.5	90.0	90.5	90.8	91.0	91.5	91.8	90.2
1994	92.2	92.4	92.5	92.7	92.9	93.3	93.6	94.1	94.6	95.2	95.8	96.4	93.9
1995	96.9	97.0	97.0	97.2	97.4	97.8	97.9	98.0	98.4	98.5	98.6	98.7	97.8
1996	98.8	99.0	99.1	99.0	99.2	99.6	100.2	100.4	100.7	100.9	101.0	101.3	100.0
1997	101.8	101.8	102.3	102.5	102.7	102.9	103.3	103.6	103.9	104.2	104.7	104.8	103.3
1998	105.0	104.9	104.9	105.0	105.2	105.9	106.1	106.4	106.6	107.0	107.4	107.9	106.1
1999	108.4	108.6	109.0	109.3	109.8	110.4	110.5	110.8	110.8	111.3	111.8	112.1	110.4
2000	113.3	113.8	113.9	114.6	114.9	115.1	115.6	115.8	115.9	116.4	116.7	117.1	115.4
2001	117.9	118.3	118.6	118.7	119.0	119.5	119.4	119.7	120.0	120.8	121.0	121.2	119.6
2002	<sup>r</sup> 121.2	<sup>r</sup> 121.2	<sup>r</sup> 121.3	<sup>r</sup> 121.4	<sup>r</sup> 121.5								

<sup>r</sup>Preliminary. <sup>r</sup>Revised.