Proposed Revisions to OMB Circular A-21 - Cost Principles for Educational Institutions

AGENCY: Office of Management and Budget.


SUMMARY: This notice proposes to revise Office of Management and Budget Circular A-21, "Cost Principles for Educational Institutions," by: (1) establishing guidance for Federal cost negotiators to assure the reasonableness of facility costs, (2) implementing a new alternative approach to replace using special cost studies for the recovery of utility costs and deferring the elimination of special cost studies for the recovery of library costs, (3) providing additional guidance on the calculation of depreciation and use allowances on buildings and equipment, (4) proposing the use of and soliciting input on a standard format for facility and administrative rate proposal submissions, and (5) changing the distribution basis for the facilities and administrative cost application (from salaries and wages to modified total direct costs) at universities that use the simplified (short-form) method to calculate their facilities and administrative rate.

DATE: Comments on these proposals are due November 10, 1997.

ADDRESSES: Comments should be mailed to Gilbert Tran, Financial Standards and Reporting Branch, Office of Federal Financial Management, Office of Management and Budget, 725 17th Street, N.W., Room 6025, Washington, DC 20503. Comments up to three pages in length may be submitted via facsimile to 202-395-4915. Electronic mail comments may be submitted via Internet to htran@omb.eop.gov. Please include the full body of electronic mail comments in the text and not as an attachment. Please include the name, title, organization, postal address, and E-mail address in the text of the message.

FOR FURTHER INFORMATION: Non-Federal organizations should contact the organization's cognizant Federal agency. Federal agencies should contact Gilbert Tran, Financial Standards and Reporting Branch, Office of Federal Financial Management, Office of Management and Budget, (202) 395-3993.

SUPPLEMENTARY INFORMATION:
A. Purpose of Circular A-21

Office of Management and Budget (OMB) Circular A-21, "Cost Principles for Educational Institutions," establishes principles for determining costs applicable to Federal grants, contracts, and other sponsored agreements with educational institutions.

B. Recent Prior Revisions

Circular A-21 was last amended on May 8, 1996 (61 FR 20880). The 1996 revision incorporated four Cost Accounting Standards applicable to educational institutions, issued by the Cost Accounting Standards Board (CASB) on November 8, 1994 (59 FR 55746), and extended these standards to all sponsored agreements. The revision also: required certain large institutions to disclose their cost accounting practices by the submission of a Disclosure Statement prescribed by the CASB; amended the definition of equipment; eliminated in 1998 the use of special cost studies to allocate utility, library and student services costs; and, required the use of fixed facilities and administrative (F&A) cost rates for the life of sponsored agreements. Furthermore, the 1996 revision: established cost negotiation cognizant agency responsibilities; replaced the term "indirect costs" with "facilities and administrative costs" (to describe more accurately the various cost components of sponsored agreements); clarified the policy for a change from use allowance to depreciation; added criteria to interest allowability; and, disallowed tuition benefits for employee family members.

C. Revisions Proposed for Comment

On February 6, 1995, OMB published two sets of proposed revisions (60 FR 7104 and 60 FR 7105). The first set was finalized in 1996, as described in Section B. The second set required further development prior to proposed implementation. The following proposed revisions address the second set of proposals made in 1995.

1. Establish a review process to ensure the reasonableness of facility costs. To increase accountability in the research component of F&A costs and ensure that the cost of new research facilities passes a "prudent person" test of reasonableness, OMB proposes to establish a review process for research facility construction project costs. The proposal, which is detailed in a new Section F.2.b, would require Federal cost negotiators to determine whether the gross square foot (GSF) cost of new research facilities with an actual or estimated total cost of more than $10 million (or renovation costs of more than $4 million) meet the reasonableness test. The review process would apply to all new research building construction and renovation projects that are included in F&A rates negotiated after January 1, 2000. The review process would apply only to research buildings in which 40 percent or more of total space is devoted to federally-sponsored agreements.
Federal cost negotiators will rely on the most recent GSF data collected by the National Science Foundation (NSF) in response to its biennial survey, "Science and Engineering Facilities at Colleges and Universities." Biennially, NSF will calculate the median cost per GSF figures for new research facilities and the median cost per GSF for renovations to research facilities. NSF will publish these results in its biennial survey report, which is publicly available. The review will apply to projects in the 50 states and the District of Columbia, and the benchmarks will be broken down into the ten Federal regions established by OMB Circular A-105, "Standard Federal Regions," in April of 1974, minus the island territories (in addition, as explained below, Alaska and Hawaii raise unique issues).

The cost items that go into research facility costs have been found to be geographically sensitive and so the costs within contiguous and regional states should be comparable. NSF analyzed previous years’ construction cost data by these longstanding Federal regions, and found that geography explained a significant degree of variation in cost-per-square-foot in university research facilities and that the Federal regional grouping provided a reasonable approximation of comparable construction costs. Further, the geographic regions established in Circular A-105 are used by the Department of Health and Human Services, which has negotiation cognizance over a majority of educational institutions, in their administration of grants and contracts and is familiar with the grantee community. Therefore, OMB proposes to use these ten regions for initiating the review process for a particular university facility costs. Given that other geographic groupings could be contemplated, OMB invites suggestions of other geographic groupings that might be demonstrated to be significant contributors to research facility costs. See proposed new Appendix C to Circular A-21.

In reviewing data pertaining to newly-constructed or renovated space, Federal cost negotiators will determine whether the facility's GSF cost exceeds 125 percent of the NSF median for the region in which the facility is located. No justification is necessary if the GSF cost is below the 125 percent benchmark. If the GSF cost exceeds the 125 percent benchmark, then institutions must submit detailed and quantitative justifications in order for such costs to be considered in rate negotiations. Acceptable justification should address one of the following:

(a) Lower life-cycle costs - The institution must demonstrate that it will incur higher up-front costs in constructing a facility in order to lower operating costs, and that the initial investment will benefit the institution and sponsored research agreements; or

(b) Unique research needs - The institution must demonstrate that unusual design or materials are required for the type of research. For example, biomedical research space costs are typically more expensive than the costs of other types of research space.
Additionally, given the different nature of construction costs in Alaska and Hawaii, a third acceptable justification for construction costs to exceed the benchmarks is that the project lies in one of those states.

If an institution's justification is accepted by the Federal cost negotiators, the full GSF cost amount may be included in the institution's calculation of its depreciation or use allowance. If an institution's justification is not deemed acceptable, the Federal cost negotiators will limit payment of facilities’ depreciation or use allowance to the 125 percent benchmark rate for the region in which the facility is located. If an institution submits justification that justifies costs above the benchmark but justifies an amount less than actual or estimated costs, the Federal cost negotiators and institutions may arrive at an amount above 125 percent of the regional median but less than the actual or estimated costs that may be included in an institution's calculation of depreciation and use allowance.

2. Implement an alternative approach for the payment of utility costs and defer the elimination of special cost studies for the recovery of library costs. The 1996 revision to Circular A-21 indicated that special cost studies will be eliminated starting with fiscal years beginning on or after July 1, 1998. OMB committed to developing an alternative approach to replace special cost studies for utility costs. The proposed alternative approach, as outlined in proposed new subsections F.4.c and d, provides a simple methodology to pay for increased utility costs related to research activities. The approach consists of adding a utility cost adjustment (UCA) of 1.3 percentage points to the university's overall F&A organized research rate calculated using the standard Circular A-21 allocation methods. The 1.3 percentage points represent the weighted average incremental rate that the Federal Government paid above the rate calculated using the standard allocation methodology to institutions that submitted in the past special utility studies for utility costs related to research activities. OMB will periodically reassess the UCA.

The UCA will initially be available, starting with fiscal years beginning on or after July 1, 1998, to the institutions that included special cost studies in their most recently submitted F&A proposal. The list of these institutions, based on review of Federal records, is provided in Attachment A to this proposal. OMB will develop criteria by which the institutions may be periodically recertified and by which other institutions could qualify for the UCA by July 1, 2002 and may change the UCA.

Further, due to the uncertain effects of recent and ongoing changes to university libraries and their services brought about by the increased use of the Internet and on-line research, OMB proposes to defer the elimination of special cost studies to support the allocation of library costs until OMB has an opportunity to evaluate the impact of these changes on the costs of library services benefitting organized research. See proposed revised subsection E.2.d.(5).
3. Provide additional guidelines on depreciation and use allowances. In 1995, OMB stated its intention to examine and potentially revise the current useful life schedules for equipment, the cost of which is allocated to federally-sponsored agreements through a use allowance, to ensure that F&A recovery payments keep pace with the changing nature of scientific equipment. The use allowance methodology is based on an averaging concept that defines a 15-year useful life as an average life for all equipment at educational institutions. OMB's examination of this issue determined that the current 15-year useful life used in the computation of use allowance is, on balance, reasonable. That is, although the 15-year useful life may not match the expected life of some types of equipment (e.g., scientific and computer equipment), it remains appropriate considering the longer useful life of other types of equipment (e.g., furniture and fixtures). Therefore, OMB does not intend to revise the useful life for equipment for the use allowance method.

For those educational institutions that find that a shorter useful life for their equipment is more appropriate, Circular A-21 allows the use of depreciation for the recovery of equipment costs.

To provide more consistency in the treatment of use allowance and depreciation among educational institutions and Federal cognizant agencies, OMB proposes the following clarifications for the calculation of depreciation and use allowance:

(a) Use allowance recovery shall be limited to the acquisition costs of assets, or fair market value of donated assets at the time of donation (see proposed revised subsection J.2.c).

(b) Institutions that report depreciation in their financial statements must use the same depreciation methodology and useful lives for the F&A proposal (see proposed revised subsection J.12.b).

(c) Guidelines are proposed for the calculation of depreciation on buildings when depreciation is calculated on individual building components (see proposed revised subsection J.12.b). This revision establishes general categories of building components for the assignment of useful life.

(d) Gains and losses shall be computed on the disposition of depreciable assets (see proposed revised section J.33). This is how gains and losses are computed under other OMB cost principles found in Circulars A-87, "Cost Principles for State, Local and Indian Tribal Governments," and A-122, "Cost Principles for Non-Profit Organizations," in the treatment of gains or losses resulting from disposition of depreciable assets. Previously, Circular A-21 was silent on this issue because depreciation calculations were not required for educational institutions under generally accepted accounting principles (GAAP).
4. **Propose to develop a standard format for the submission of F&A proposals.** A standard format would assist institutions in completing their F&A rate proposal more efficiently and help the Federal cognizant agency review each proposal on a more consistent basis. It would also allow the Federal Government to collect improved information about F&A costs and to analyze F&A data that could be useful in explaining variances in F&A rates among institutions. OMB intends to develop the standard format with assistance from Federal agencies, universities, and other interested parties, and then request comments under the Paperwork Reduction Act through a notice in the Federal Register. When completed, it will be included as an Appendix to the Circular and be available electronically.

5. **Change the distribution basis for F&A application (from salaries and wages to modified total direct costs) for institutions that use the simplified allocation method.** This change, detailed in proposed revised Section H.2, would provide more comparability between F&A rates at small and large universities.

**D. Other Proposed Items for Consideration in the 1995 Notice**

OMB does not propose at this time to make revisions on two other items that were discussed in the 1995 Federal Register Notice. They were: (1) to develop methods for direct charging of space costs, and (2) to develop new methods for charging specialized services facilities. The following discussion summarizes the result of OMB's analyses on these two items.

1. **Develop methods for direct charging of space costs.** In February 1995, OMB stated its intention to develop and test a model for charging facilities costs directly to sponsored agreements. The objective of this study was to strengthen the incentive for universities to allocate space costs more efficiently. OMB asked the Federal Demonstration Project (FDP), which was created to test ways to improve flexibility and reduce administrative costs associated with grant-making, to perform the study. In October 1995, the FDP reported to OMB that it had developed three models of direct charging space costs to sponsored agreements. It also reported that, although direct charging is likely to produce more efficient use of space, it could also impose an excessive administrative burden on educational institutions and Federal agencies.

In recognition of the FDP's concerns, OMB is not formally pursuing this concept at the present time. However, OMB requests that Federal research agencies attempt to identify candidate institutions willing to pilot test direct charging. Federal agencies should work with pilot institutions to identify the best ways to quantify the efficiencies and administrative burdens direct charging creates and to see if an acceptable balance can be developed.
2. Consider new methods for charging specialized service facilities. In February 1995, OMB stated its intention to develop a standard methodology for uniform treatment of specialized service facilities (e.g., animal care, computer centers and biohazard centers). OMB examined the issue and is not considering a change at this time in the current provisions for charging specialized service facilities costs.

OMB intended to identify the operating expenses of specialized service facilities that should be allocated to the direct costs and those to be included in a facility-specific rate or the general facilities cost pool. Based on OMB's analysis, costs associated with the specialized service facilities can be generally identified to these facilities. In accordance with current provisions of Circular A-21, these costs shall be directly assigned to the special service facilities and shall not be included in a facility-specific rate or the general facilities cost pool, unless the costs are immaterial or not readily identifiable. To allow the allocation of facilities and general administrative costs associated with specific specialized service facilities to a general facilities cost pool would violate the basic allocability principles of OMB cost principles Circulars (A-21, A-87 and A-122) and inequitably distribute costs to projects that do not benefit from the specialized service facilities.

E. Clarification on the Use of Fixed Rates for the Life of the Sponsored Agreement

On May 8, 1996, OMB revised Circular A-21 by adding section G.7, "Fixed rates for the life of the sponsored agreement," (61 FR 20891) to require Federal agencies to "use the negotiated rates for F&A costs in effect at the time of the initial award throughout the life of the sponsored agreement." In a response to public comments in the preamble section (61 FR 20884), OMB indicated that "negotiated rates" could include predetermined, fixed or provisional rates; and that provisional rates could be used for both funding and reimbursement throughout the life of the award.

OMB's intention in section G.7 was to require the Federal funding agencies to use the negotiated rates (final, fixed or predetermined rate) in effect at the time of the initial award to determine the total funding and the reimbursement of F&A costs of a multi-year project. Therefore, this notice is to clarify that "negotiated rates," as mentioned in section G.7, do not include provisional rates.

G. Edward DeSeve,

Controller
Circular A-21 is proposed to be revised as follows:

1. Replace subsection E.2.d.(5) with the following:

   (5) Notwithstanding subsection (3), effective July 1, 1998, a cost analysis or base other than that in Section F shall not be used to distribute utility or student services costs. Instead, subsections F.4.c and F.4.d may be used in the recovery of utility costs.

2. Renumber subsection F.2.b to F.2.c, and change the reference in subsection F.4.b from "subsection 2.b" to "subsection 2.c."

3. Add new subsection F.2.b:

   b. **Review of selected research facilities construction costs.** Cognizant agencies shall review the reasonableness of the construction costs, used in an institution's calculation of depreciation or use allowance, for all research-related capital projects that meet the criteria in subsection (1). The review requires Federal cost negotiators to determine, prior to including a new or renovated research facility's costs in an institution's F&A proposal, whether the cost per gross square foot (GSF) of new facilities is reasonable when compared with benchmarks for construction or renovation costs discussed in subsection (2). The goals of this objective review process are: to ensure that research facility costs charged to federally-sponsored agreements are reasonable, to increase accountability in the facilities component of F&A costs, and to encourage efficient construction and renovation of research facilities.

   (1) All new research capital projects, on which design and construction begins after July 1, 1998, which are included in F&A rate proposals negotiated after January 1, 2000, shall be reviewed if they meet the following criteria:

   (a) Facilities construction costs are greater than or equal to $10 million, or renovation costs greater than or equal to $4 million; and

   (b) 40 percent or more of the facility's depreciation or use allowance is assigned to federally-sponsored agreements at any time during the life of the building.

   (2) The benchmark is equal to 125 percent of the most recent cost per GSF data the National Science Foundation (NSF) collects in response to its biennial survey, "Science and Engineering Facilities at Colleges and Universities." Using these survey data, NSF will biennially calculate median cost per GSF for new research facilities constructed and median cost per GSF for renovation projects completed at colleges and universities. These benchmarks will be broken down according to ten Federal regions (see Appendix C of Circular A-21).
(3) No justification is necessary if the cost per GSF is below the 125 percent benchmark. If the cost per GSF exceeds 125 percent of the median cost for the region in which the facility of an institution is located, then the institution must submit detailed and quantitative justification in order for such costs to be considered in rate negotiation. While the submission can address other justifications, the institution must address whether the following justify the higher rates:

(a) Lower life-cycle costs - The institution incurred higher up-front costs in constructing a facility in order to lower operating costs. This initial investment will benefit the institution and sponsored research agreements; or

(b) Unique research needs - The unusual design or materials, if required for the type of research, that significantly increased the construction costs of the facility. For example, biomedical research space costs are typically more expensive than the costs for other types of research space, according to NSF facilities data.

Additionally, given the different nature of construction costs in Alaska and Hawaii, a third acceptable justification for construction costs to exceed the benchmarks is that the project lies in one of those states.

If the Federal cost negotiators determine that an institution’s justification is acceptable, then the full GSF cost amount may be included in the institution’s calculation of its depreciation or use allowance. If the Federal cost negotiators determine that an institution’s justification is not acceptable, then the Federal cost negotiators will limit payment of facility’s depreciation or use allowance to the 125 percent benchmark rate for the region in which the facility is located. If the Federal cost negotiators determine that an institution has submitted a justification that justifies costs above the benchmark but at an amount less than actual or estimated costs, then the Federal cost negotiators and institutions may arrive at an amount above 125 percent of the regional median but less than the actual or estimated costs that may be included in an institution’s calculation of depreciation or use allowance.

4. Add new subsections F.4.c and F.4.d:

c. For F&A rates negotiated on or after July 1, 1998, an institution that previously employed a utility special cost study in its most recently negotiated F&A rate proposal in accordance with Section E.2.d, may add a utility cost adjustment (UCA) of 1.3 percentage points to its negotiated overall F&A rate for organized research. The allocation of utility costs to the benefitting functions shall otherwise be made in the same manner as described in subsection F.4.b. Beginning on July 1, 2002, Federal agencies shall reassess periodically the eligibility of institutions to receive the UCA.
d. Beginning on July 1, 2002, Federal agencies shall receive applications for utilization of the UCA from institutions not subject to the provisions of subsection F.4.c.

5. Replace subsection H.1.a with the following:

   a. Where the total direct cost of work covered by Circular A-21 at an institution does not exceed $10 million in a fiscal year, the use of the simplified procedure described in subsection 2, may be used in determining allowable F&A costs. Under this simplified procedure, the institution's most recent annual financial report and immediately available supporting information shall be utilized as basis for determining the F&A cost rate applicable to all sponsored agreements.

6. Replace subsection H.2.a with the following:

   a. Establish the total costs incurred by the institution for the base period.

7. Replace subsection H.2.c with the following:

   c. Establish the modified total direct cost distribution base, as defined in Section G.2.

8. Replace subsection H.2.e with the following:

   e. Apply the F&A cost rate to the modified total direct costs for individual agreements to determine the amount of F&A costs allocable to such agreements.

9. Replace subsection J.12.b.(2) with the following:

   (2) The depreciation method used to charge the cost of an asset (or group of assets) to accounting periods shall reflect the pattern of consumption of the asset during its useful life. In the absence of clear evidence indicating that the expected consumption of the asset will be significantly greater in the early portions than in the later portions of its useful life, the straight-line method shall be presumed to be the appropriate method. Depreciation methods once used shall not be changed unless approved in advance by the cognizant Federal agency.

   The depreciation methods used to calculate the depreciation amounts for F&A rate purposes shall be the same methods used by the institution for its financial statements. This section does not apply to institutions (e.g., public institutions) which are not required to record depreciation by applicable generally accepted accounting principles (GAAP).

10. Replace subsection J.12.b.(4) with the following:

   (4) When the depreciation method is used for buildings, a building may be divided into three general components. Each component item must then be depreciated over its estimated useful
life. The three general components of a building are: building shell (including construction and design costs), building services systems (e.g., elevators, HVAC, plumbing system and heating and air-conditioning system) and fixed equipment (e.g., sterilizers, casework, fumehoods, cold rooms and glassware/washers). When an institution elects to depreciate its buildings by its components, the same depreciation methods must be used for F&A purposes and financial statements purposes, as described in subsection b.(2). However, the entire building, including the shell and all components, may be treated as a single asset and depreciated over a single useful life.

11. Replace subsection J.12.c.(1) with the following:

(1) The use allowance for buildings and improvements (including improvements such as paved parking areas, fences, and sidewalks) shall be computed at an annual rate not exceeding two percent of acquisition cost. The use allowance for equipment shall be computed at an annual rate not exceeding six and two-thirds percent of acquisition cost. Use allowance recovery is limited to the acquisition costs of the assets. For donated assets, use allowance is limited to the fair market of the assets at the time of donation.

12. Replace section J.33 with the following:

33. Profits and losses on disposition of plant equipment or other capital assets.

a. (1) Gains and losses on the sale, retirement, or other disposition of depreciable property shall be included in the year in which they occur as credits or charges to the asset cost grouping(s) in which the property was included. The amount of the gain or loss to be included as a credit or charge to the appropriate asset cost grouping(s) shall be the difference between the amount realized on the property and the undepreciated basis of the property.

(2) Gains and losses on the disposition of depreciable property shall not be recognized as a separate credit or charge under the following conditions:

(a) The gain or loss is processed through a depreciation account and is reflected in the depreciation allowable under Section J.12.

(b) The property is given in exchange as part of the purchase price of a similar item and the gain or loss is taken into account in determining the depreciation cost basis of the new item.

(c) A loss results from the failure to maintain permissible insurance, except as otherwise provided in Section J.21.d.
(d) Compensation for the use of the property was provided through use allowances in lieu of depreciation.

b. Gains or losses of any nature arising from the sale or exchange of property other than the property covered in subsection a shall be excluded in computing Federal award costs.

c. When assets acquired with Federal funds, in part or wholly, are disposed of, the distribution of the proceeds shall be made in accordance with Circular A-110, "Uniform Administrative Requirements for Grants and Agreements with Institutions of Higher Education, Hospitals, and Other Non-Profit Organizations."

13. Add new Appendix C.

---

Appendix C

Federal Regions for Construction Benchmark Facilities Costs

<table>
<thead>
<tr>
<th>REGION</th>
<th>STATES (AND THE DISTRICT OF COLUMBIA)</th>
</tr>
</thead>
<tbody>
<tr>
<td>I</td>
<td>Connecticut, Maine, Massachusetts, New Hampshire, Rhode Island and Vermont.</td>
</tr>
<tr>
<td>II</td>
<td>New York and New Jersey.</td>
</tr>
<tr>
<td>III</td>
<td>Delaware, Maryland, Pennsylvania, Virginia, West Virginia and District of Columbia.</td>
</tr>
<tr>
<td>IV</td>
<td>Alabama, Florida, Georgia, Kentucky, Mississippi, North Carolina, South Carolina and Tennessee.</td>
</tr>
<tr>
<td>V</td>
<td>Illinois, Indiana, Michigan, Minnesota, Ohio and Wisconsin.</td>
</tr>
<tr>
<td>VI</td>
<td>Arkansas, Louisiana, New Mexico, Oklahoma and Texas.</td>
</tr>
<tr>
<td>VII</td>
<td>Iowa, Kansas, Missouri and Nebraska.</td>
</tr>
<tr>
<td>VIII</td>
<td>Colorado, Montana, North Dakota, South Dakota, Utah and Wyoming.</td>
</tr>
<tr>
<td>IX</td>
<td>Arizona, California, Hawaii and Nevada.</td>
</tr>
</tbody>
</table>
Attachment A

Listing of institutions that included special cost studies for the recovery of utility costs in their most recent F&A proposal submission based on a review of Federal records.

1. Boston College
2. Boston University
3. California Institute of Technology
4. Columbia University
5. Cornell University (Endowed)
6. Cornell University (Statutory)
7. Cornell University (Medical)
8. Emory University
9. Harvard Medical School
10. Harvard University
11. Johns Hopkins University
12. Massachusetts Institute of Technology
13. Medical University of South Carolina
14. Mount Sinai School of Medicine
15. New York University (except New York University Medical Center)
16. New York University Medical Center
17. North Carolina State University
18. Northeastern University
19. Oregon Health Sciences University
20. Oregon State University
21. Rice University
22. Rockefeller University
23. Stanford University
24. Tufts University
25. Tulane University
26. University of Arizona
27. University of CA, Berkeley
28. University of CA, Irvine
29. University of CA, Los Angeles
30. University of CA, San Diego
31. University of CA, San Francisco
32. University of Colorado, Health Sciences Center
33. University of Illinois, Urbana
34. University of Pennsylvania
35. University of Pittsburgh
36. University of Rochester
37. University of Southern California
38. University of Virginia
39. University of Michigan
40. University of Massachusetts, Medical Center
41. University of Medicine & Dentistry of New Jersey
42. University of Connecticut, Health Sciences Center
43. University of Vermont & State Agriculture College
44. University of Texas, Austin
45. University of Texas Southwestern Medical Center
46. Virginia Commonwealth University
47. Vanderbilt University
48. Washington University
49. Yale University
50. Yeshiva University

Billing Code 3110-01-P