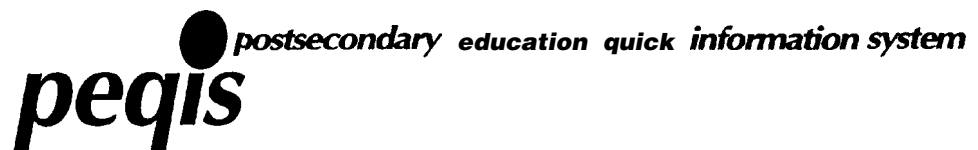

NATIONAL CENTER FOR EDUCATION STATISTICS

Statistical Analysis Report

December 1995

Programs at Higher Education Institutions for Disadvantaged Precollege Students



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**U.S. Department of Education
Office of Educational Research and Improvement**

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"The purpose of the Center shall be to collect, and analyze, and disseminate statistics and other data related to education in the United States and in other nations.:— Section 406(b) of the General Education Provisions Act, as amended (20 U.S. C. 1221e-1).

December 1995

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Highlights

The *Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions* was requested by the Planning and Evaluation Service of the Office of the Under Secretary within the U.S. Department of Education. This survey was intended to obtain information about programs at higher education institutions that are designed to increase the access of educationally or economically disadvantaged elementary and secondary students to higher education. Only the largest such program (based on funding) at each institution was included in the survey. Data were collected from 2-year and 4-year higher education institutions in fall 1994 and were weighted to provide national estimates.

- Roughly one-third (32 percent) of all institutions offered at least one program for precollegiate students in 1993-94 (table 1). Programs were especially common at large institutions (71 percent) and public institutions (45 percent).
- At 47 percent of the institutions with programs, the largest precollegiate program accounted for all of the precollegiate students served by the institution (figure 1).
- The largest precollegiate programs served 317,400 students in 1993-94 and involved 9,600 faculty and staff (table 3). If all precollegiate programs for the disadvantaged are included, the enrollment was at least 525,100, with about 90,000 expected to graduate from high school in the next year. Of the students in the largest programs, 68 percent were from low-income families, 59 percent were female, 39 percent were black, and 29 percent were Hispanic (tables 11 and 12).
- The goals that institutions most often listed among the top three for their largest program were increasing the likelihood of the students attending college (78 percent), increasing general academic skills development (67 percent), and increasing retention in or completion of high school (64 percent; figure 2).
- Almost two-thirds (64 percent) of the precollegiate program participants in 1993-94 were high school students; the next largest group was middle or junior high school students (25 percent; table 14). For slightly under half of the programs (44 percent), students usually entered the program in the freshman or sophomore year of senior high school (figure 5). On average, students participated for 2.9 years (table 9).

- Half (51 percent) of the institutions reported that the federal government was the primary source of funding for the program, while state and/or local government funding was the next most common primary source (20 percent; table 4).
- Most students (58 percent) were in full-year programs, which were much more intensive than the part-year programs (table 8). In full-year programs, students spent a mean of 323 hours in program activities, compared with 166 hours in programs operating only during the summer and 86 hours in programs operating during the academic year (figure 3). Within the full-year programs, most of students' time was spent during the summer (206 hours versus 117 during the academic year).
- The precollegiate services that were most often considered among the three most important by the institutions were social skills development (43 percent), information about college admissions and/or financial aid (35 percent), supplemental courses (33 percent), and career counseling (32 percent; table 16).
- Most of the programs (63 percent) provided some type of financial award, with 50 percent paying a stipend for participation and 33 percent offering financial benefits (such as scholarships and college courses for free or at reduced prices) for successful performance (table 17).
- One focus of this survey was on comparing Upward Bound precollegiate programs with other precollegiate programs at higher education institutions. Upward Bound is the oldest and largest (in terms of funding) of six Special Programs for Disadvantaged Students (TRIO) programs administered by the U.S. Department of Education to help disadvantaged students to complete postsecondary education. It is directed at 13- to 19-years-old high schools student, and generally provides an intensive 6-week summer program at a college campus along with continued support during the school year.

Upward Bound programs had significant differences from other precollegiate programs for the disadvantaged.

- They were more likely to rank the following services as being among their three most important: accelerated courses below the college level (35 percent versus 10 percent), other supplemental courses (44 percent versus 28 percent), and information about admissions and/or financial aid (56 percent versus 27 percent; table 16).

- They were also more likely to have their students usually start in the freshman or sophomore years (97 percent versus 20 percent; table 13).
- As might be expected for a federally funded program, they more frequently said that federal funding was their primary source of funding (97 percent versus 30 percent; table 4).
- Upward Bound programs were much more intensive than other programs, with students spending a mean of 433 hours over the full year, compared with 166 hours for other programs (table 9).
- They also differed in the financial benefits offered, including a greater use of college courses at reduced prices (61 percent versus 22 percent; table 18).

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1. Background

One of the great changes in American society in the last 40 years has been the increased importance placed on education, and especially on higher education. From 1955 to 1995 (projected), college enrollment grew from 2.6 million to 14.9 million.¹ This increase did not merely reflect an increase in the population, but also represented an increase in the proportion of high school graduates attending college: among those individuals ages 16 to 24 who graduated from high school during the preceding 12 months, the percentage enrolled in college increased from 45 percent in 1960 to 63 percent in 1993.² These changes have important implications. It is commonly accepted that higher education is important both nationally, to ensure the Nation's productivity and economic competitiveness, and individually, with respect to a person's lifetime earnings: it is estimated that a 1992 high school graduate who completed college would earn \$600,000 more over a lifetime than one with only a high school education.³

Yet the opportunity to attend college is not distributed equally throughout the population. For example, while 86 percent of unmarried 18- to 24-year-old high school graduates in the top family income quartile were either currently enrolled in college or had previously been enrolled, only 52 percent had been enrolled among those in the bottom income quartile.⁴ In fact, while college attendance overall is growing, the differences in college completion rates by age 24 based on family income are actually increasing and are "wider than they have ever been in the twenty-three years of available data."⁵ Many potential students face one or more economic or educational disadvantages: they may lack role models (especially in their own families) to demonstrate the importance of attending college, they may lack the financial resources required for higher education, and they may lack the academic knowledge and skills required for success in college.

¹U.S. Department of Commerce, Bureau of the Census, *Statistical Abstract of the United States 1994* (Washington, DC: 1993), 152.

²U.S. Department of Education, National Center for Education Statistics, *Digest of Education Statistics 1994* (Washington, DC: 1994), 188.

³U.S. Department of Commerce, Bureau of the Census, *Educational Attainment in the U.S.: 1993 & 1992*.

⁴Thomas G. Mortenson. "Family Income Backgrounds Continue to Determine Chances for Baccalaureate Degree in 1992." *Postsecondary Education Opportunity* 16 (Sept. 1993), 5.

⁵*Ibid.*, 7.

The desire to see these prospective students have equal access to postsecondary education has led to a variety of programs that are designed to encourage disadvantaged students to attend college and to help them obtain the resources and academic skills they will need to be successful. Among the oldest are the TRIO programs administered by the U.S. Department of Education; now a group of six programs -- Upward Bound, Talent Search, Student Support Services, Educational Opportunity Centers, Training Program for Special Services Staff and Leadership Personnel, and the Ronald McNair Post-Baccalaureate Achievement Program -- they exist to help economically disadvantaged students by facilitating high school completion, entry, retention, and completion of postsecondary education, and entry into graduate study. Upward Bound, the largest of these programs in terms of funding, is directed at 13- to 19-years-old high school students whose family income is under 150 percent of the poverty level, and/or who are potential first-generation college students (with neither parent having a college degree).⁶ The Upward Bound program has grown in size from \$28 million in 1967 to \$162.5 million in 1994, and now serves roughly 42,000 precollegiate students. Upward Bound programs generally provide an intensive 6-week summer residential or nonresidential program at a college campus, along with continued academic and support services during the school year, typically on weekends or after school. All Upward Bound projects must provide instruction in mathematics, laboratory science, foreign language, English, and composition; additionally, they typically provide instruction in study skills, academic or personal counseling, exposure to cultural events, tutorial services, information on student financial assistance, and exposure to a range of career options.

A number of other precollegiate programs are like Upward Bound in the sense of being run by higher education institutions in partnership with schools or school districts, though they may differ in their funding, goals, and operations.⁷ Some of these programs receive outside support (e.g., through foundations), while others are internally funded; in either case, they may depend heavily on in-kind support. While Upward Bound has mandates that are specified in the federal legislation, these programs might be considered to have more flexibility (depending on the sponsor) and thus more diversity across programs. They often depend, at least initially, on the vision of one individual who first organizes the program, and their continued operation may depend either on that individual's continued work or on the ability of program staff

⁶Two-thirds of the students in each project must be both low income and first generation.

⁷Detailed descriptions of many such programs are provided in *Reaching for College*, a two-volume report prepared by Westat, Inc., for the U.S. Department of Education, December 1992.

to acquire a stable administrative and funding base within the institution.

Still other precollegiate programs also exist, including state scholarship programs and private programs. A privately sponsored program that has received great attention is the "I Have a Dream" program founded by Eugene Lang. It started in 1986 when Lang promised college educations to an entire class of Harlem sixth-graders, and since has expanded to more than 160 programs with 12,000 students.⁸ This program seeks to increase the motivation of selected groups of students by providing an early promise of financial support for attending college, while also providing support to these students as they prepare for college. Because these programs are not organized by higher education institutions, they can often differ greatly in their characteristics; for example, they may not be able to make use of the physical and personnel resources available in higher education institutions and may need to seek other strategies (such as operating in local schools or community organizations).

The purpose of this study is to provide a general description of precollegiate programs, noting those features that the programs tend to hold in common and those features where there is great diversity. Also, in coordination with a separate U.S. Department of Education evaluation of Upward Bound, a secondary purpose is to place Upward Bound programs within a larger context, to learn whether and how Upward Bound programs differed from other precollegiate programs, and to determine whether Upward Bound staff had something to learn from other programs.

If all precollegiate programs were included in this study, the diversity might be too great to allow meaningful comparisons. Instead, this study was intentionally focused in two ways. First, because of the longstanding federal concern with providing educational access for educationally or economically disadvantaged groups, those programs directed toward motivating such students to attend college and developing their academic skills to succeed in high school and prepare for college were examined. The disadvantaged students could start their participation either in elementary or secondary school. These programs remain highly diverse despite this focus. The programs may be sponsored by national or state governments, by individual colleges, by individual faculty or departments within a college, or by private individuals or foundations. They may take place during the academic year, during the summer, or both; they may be located close to the students, in their schools or neighborhoods, or they may involve bringing the students to college campuses;

⁸*Washington Post*, June 25, 1995, p. A16.

and they may focus on individual subject areas (such as mathematics and science), general academic skills, or even more general traits such as self-esteem.

Second, this study concentrated on precollegiate programs that are operated by higher education institutions, although the sponsor of the program might be outside the institution (such as the federal government or a private foundation); this focus helps to increase the comparability across programs, as well as the usefulness of study findings for making comparisons with Upward Bound. The data were collected by asking each school in a sample of higher education institutions to complete a three-page questionnaire about its largest precollegiate program.

Therefore, this study is not intended to describe the universe of all precollegiate programs at higher education institutions; rather, the focus on precollegiate programs for the disadvantaged is intended to result in more meaningful comparisons than would a study of programs with more dissimilar goals. The decision to focus on only the largest precollegiate program at each institution--defined in terms of the level of funding -- was made to simplify the task of higher education institutions in responding to the survey; in the pretest for the survey it was found that institutions have difficulty in identifying and comparing all their programs.

Except for these two focuses, the definition of precollegiate programs was made intentionally broad in order to capture the diversity of such programs. The programs might or might not include college-level instruction, but all are intended to prepare and motivate disadvantaged students for college. Programs such as those targeted exclusively toward minorities or women, adult literacy programs, or programs allowing high school students to enroll in college courses were excluded from the definition unless they were designed to increase college-enrollment rates among educationally or economically disadvantaged students, as were programs that were simply one-time events (such as attending a high school's college day or bringing students to a campus for a college weekend). Additional information about the sample and the implications for this study is provided in the section on the frequency of precollegiate programs and the section on survey methodology.

The following institutional characteristics were used as independent variables for analyzing the survey data:

- Level: 2-year, 4-year (including graduate level). Two-year institutions are defined as institutions at which the highest level of offering is at least 2 but less than 4 years (below the baccalaureate degree); 4-year institutions are those at which

the highest level of offering is 4 or more years (baccalaureate or higher degree).⁹

- Control: public, private. Private comprises private nonprofit and private for-profit institutions; these private institutions are reported together because there are too few private for-profit institutions to report them as a separate category.
- Region: Northeast, Southeast, Central, and West, based on the National Assessment of Educational Progress (NAEP) definitions of region. The states in each region are as follows:
 - *Northeast*: Connecticut, Delaware, District of Columbia, Maine, Maryland, Massachusetts, New Hampshire, New Jersey, New York, Pennsylvania, Rhode Island, and Vermont.
 - *Southeast*: Alabama, Arkansas, Florida, Georgia, Kentucky, Louisiana, Mississippi, North Carolina, Puerto Rico, South Carolina, Tennessee, Virginia, and West Virginia.
 - *Central*: Illinois, Indiana, Iowa, Kansas, Michigan, Minnesota, Missouri, Nebraska, North Dakota, Ohio, South Dakota, and Wisconsin.
 - *West*: Alaska, Arizona, California, Colorado, Hawaii, Idaho, Montana, Nevada, New Mexico, Oklahoma, Oregon, Texas, Utah, Washington, and Wyoming.
- Size of institution: less than 3,000 students (small), 3,000 to 9,999 students (medium), and 10,000 or more students (large).

Additionally, because one of the purposes of the study was to compare the U.S. Department of Education's Upward Bound program with other precollegiate programs, the study frequently differentiates between the largest precollegiate programs in both those categories.¹⁰

⁹Definitions for level are from the data file documentation for the Integrated Postsecondary Education Data System (IPEDS) Institutional Characteristics file, U.S. Department of Education, National Center for Education Statistics.

¹⁰Upward Bound programs were identified through an item on the questionnaire where institutions wrote the name of the largest precollegiate programs.

The survey was conducted in fall 1994 by the National Center for Education Statistics using the Postsecondary Education Quick Information System (PEQIS). PEQIS is designed to quickly collect limited amounts of policy-relevant information from a previously recruited, nationally representative sample of postsecondary institutions. PEQIS surveys are generally limited to two to three pages of questions with a response burden of 30 minutes per respondent.¹¹ The survey was mailed to the PEQIS survey coordinators at 852 2-year and 4-year higher education institutions.¹² Coordinators were told that the survey was designed to be completed by the person or office that had the most information about the institution's largest precollegiate program. The unweighted survey response rate is 96 percent (the weighted survey response rate is 97 percent). Data were adjusted for questionnaire nonresponse and weighted to provide national estimates. The section of this report on survey methodology and data reliability provides a more detailed discussion of the sample and survey methodology. The survey questionnaire is reproduced in appendix B.

All specific statements of comparison made in this report have been tested for statistical significance through chi-square tests and t-tests adjusted for multiple comparisons using the Bonferroni adjustment and are significant at the 95 percent confidence level or better. However, not all statistically different comparisons have been presented, since some were not of substantive importance.

¹¹Additional information about PEQIS is presented in the methodology section of this report.

¹²Higher education institutions are institutions accredited at the college level by an agency recognized by the Secretary, U.S. Department of Education, and are a subset of all postsecondary education institutions. Other postsecondary institutions were excluded from the sample because the focus of precollegiate programs is to increase students' access to *higher* education. Postsecondary education is the provision of a formal instructional program whose curriculum is designed primarily for students beyond the compulsory age for high school. This includes programs whose purpose is academic, vocational, and continuing professional education, and excludes avocational and adult basic education. (U.S. Department of Education, National Center for Education Statistics, S. Broyles, and P. Vanderhorst. *Integrated Postsecondary Data System Glossary* (Washington, DC: 1992). NCES 92-081.)

2. Frequency of Precollegiate Programs

Approximately one-third (32 percent) of higher education institutions reported having precollegiate programs designed to increase the access of disadvantaged students to college (table 1). Precollegiate programs were more common in large institutions (71 percent) than in small institutions (21 percent), in public institutions (45 percent) than in private institutions (22 percent), and in 4-year institutions (35 percent) than in 2-year institutions (28 percent).

Thirty-one percent of the largest precollegiate programs (based on funding) were Upward Bound.¹³ However, the focus of this study on the largest precollegiate program sometimes resulted in the exclusion of Upward Bound programs.¹⁴ Thus, while this study will often describe Upward Bound programs as forming a relatively distinctive group among all of the largest precollegiate programs, it was not the purpose of this study to provide a general description of all Upward Bound programs. Rather, the statistics presented here should be interpreted only as applying to those Upward Bound programs that were the largest precollegiate program at their institutions.¹⁵

Upward Bound programs were more likely to be found at some institutions than at others. They composed 35 percent of the largest precollegiate programs at 4-year institutions but only 21 percent at 2-year institutions, and about 40 percent at institutions in the Southeast and Central regions versus 13 percent in the Northeast.

¹³If one includes eight institutions that a U.S. Department of Education list showed as having Upward Bound, but that reported having no precollegiate programs, the estimate would be 32 percent. Since no data were collected on these eight programs, and since they would have only a minor effect on the statistics, these eight institutions will be ignored in this report.

¹⁴Upward Bound programs are relatively intensive, so they typically are the largest precollegiate program at each institution in terms of funding, but are not necessarily the largest in terms of the number of precollegiate students. In fact, while Upward Bound programs comprised 30 percent of the largest programs, they had only 10 percent of the precollegiate students in the largest precollegiate programs (see table 3 later in this report), suggesting that they are relatively small from a national perspective in terms of the number of students served.

¹⁵Most likely, statistics for all Upward Bound programs would be roughly similar to those presented here, since the criterion of picking the largest precollegiate program resulted in including 120 of the 147 Upward Bound programs (unweighted) that were identified at the institutions reporting having precollegiate programs. But this study would have been designed differently if the intention were to provide a general description of all Upward Bound programs.

Table 1.--Percent of institutions that had precollegiate programs for disadvantaged students, and the percent of institutions with precollegiate programs where the largest program is Upward Bound, by institutional characteristics: 1994

Institutional characteristic	Have precollegiate programs for disadvantaged students	Largest precollegiate program is Upward Bound*
All institutions	32	31
Control		
Public.....	45	33
Private.....	22	26
Level		
2-year.....	28	21
4-year.....	35	35
Region		
Northeast	33	13
Southeast	37	41
Central.....	31	40
West.....	28	29
Size of institution		
Less than 3,000	21	27
3,000 to 9,999	48	29
10,000 or more.....	71	40

*Percents in this column are based on those institutions that have precollegiate programs for disadvantaged students.

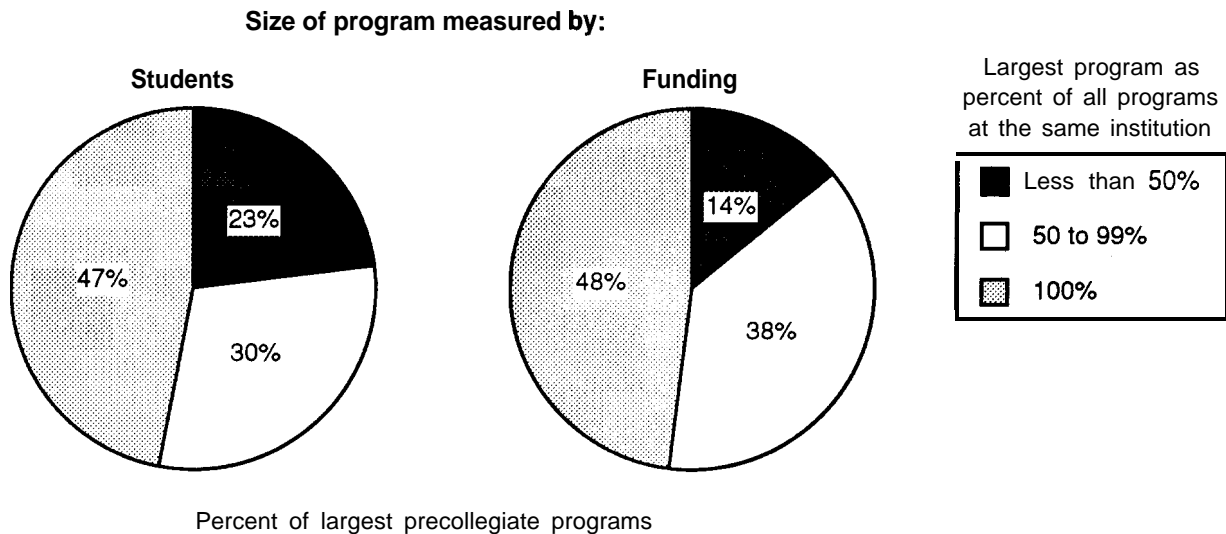
NOTE: Data are for higher education institutions in the 50 states, the District of Columbia, and Puerto Rico.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Institutions were asked to describe what percentage of all funding for precollegiate programs was received by the largest program in terms of funding, and what percentage of all precollegiate students were in the largest program. However, institutional representatives indicated that they could not provide reliable estimates in response to these questions, so their responses were recoded to only reflect very simple judgments by the institution: whether the program was the only precollegiate program at the institution (i.e., it had all of the students and funding), it had at least half of the students and/or funding, or it had less than half (figure 1).

Institutions were asked to describe what percentage of all funding for precollegiate programs was received by the largest program in terms of funding, and what percentage of all precollegiate students were in the largest program. However, institutional representatives indicated that they could not provide reliable estimates in response to these questions, so their responses were recoded to only reflect very simple judgments by the institution: whether the program was the only precollegiate program at the institution (i.e., it had all of the students and funding), it had at least half of the students and/or funding, or it had less than half (figure 1).

Figure 1.--Largest precollegiate program as a percent of all precollegiate programs at the same institution: 1994



SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

By these measures, the largest precollegiate programs accounted for a substantial portion of all precollegiate programs. For approximately half (47 to 48 percent) of the institutions with precollegiate programs, the largest program was the only program. For another 38 percent, the largest program accounted for at least half of the funding, while for 30 percent they accounted for at least half of the students. Even at the largest institutions, which were the most likely to have multiple precollegiate programs, the largest program accounted for all students or funding at 34 percent of the institutions, and for at least half of the students or funding at another 34 to 41 percent (table 2). The largest program was likely to be the only precollegiate program to receive funding at private institutions (59 percent) and at small institutions (61 percent). Thus, though this study is limited to the largest precollegiate programs, often either no precollegiate program for the disadvantaged was excluded (simply because the responding institution had only one such program) or the excluded programs accounted for only a small portion of the funding or students. In short, this survey provided relatively broad coverage of precollegiate programs despite the choice to include only the largest programs.

Table 2.--Percent of precollegiate students and of total funding that was located within the largest precollegiate program at each institution, by institutional characteristics: 1994

Institutional characteristic	Percent of precollegiate students served by largest programs			Percent of precollegiate program funding within the largest programs		
	Less than 50%	50 to 99%	100%	Less than 50%	50 to 99%	100%
	(percent of programs)					
All institutions	23	30	47	14	38	48
Control						
Public.....	25	34	41	15	44	41
Private.....	20	24	56	13	29	59
Level						
2-year.....	18	32	50	10	40	49
4-year.....	25	29	45	16	37	47
Region						
Northeast	18	33	49	14	34	52
Southeast	32	27	41	21	39	40
Central.....	22	31	47	9	43	47
West.....	17	30	53	11	37	53
Size of institution						
Less than 3,000	14	27	59	9	30	61
3,000 to 9,999	28	32	40	14	47	39
10,000 or more.....	32	34	34	24	41	34
Upward Bound is largest program						
Yes.....	34	25	41	12	47	41
No.....	18	32	50	15	34	50

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. Percents may not add to 100 because of rounding.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

3. Characteristics of the Programs

Several questionnaire items were designed to obtain general descriptive information about these largest precollegiate programs: how many students and faculty were involved, how the programs were funded, the primary goals of the programs, where the programs were located (on campus or at other locations), and the length and timing of student participation.

Size of Programs

The largest precollegiate programs had a total of 317,400 students, with a median of 82 students per program (table 3).¹⁶ This total comprised 60 percent of the approximately 525,100 students who were in all (not just the largest) precollegiate programs for the disadvantaged; however, the overall estimate of 525,100 is almost certainly an underestimate because respondents had difficulty in estimating the total enrollment and in identifying all precollegiate programs at the institution.¹⁷ To put this enrollment in perspective, one must first adjust for the fact that the precollegiate students were at a mixture of grade levels: roughly 90,000 of all precollegiate students would be expected to graduate from high school in the next year.¹⁸ By comparison, approximately 1.1 million 17-year-olds were economically disadvantaged in 1991.¹⁹ Thus, precollegiate programs for the disadvantaged enrolled a relatively small

¹⁶Medians rather than means are reported because the presence of a few very large precollegiate programs would cause the mean to overstate the "typical" size of a program. For example, while the West had almost half the total number of precollegiate students, this was due to the presence of a few very large programs in the West; the mean size for the West would appear exceptionally high, while the median size was not even the largest of the four regions.

¹⁷The estimate was computed by dividing the number of precollegiate students by the percentage of all precollegiate students that were in the largest program. Estimates were computed within each institution, and then summed across institutions. A similar calculation suggests that the largest programs had approximately 64 percent of the total funding, although this estimate is only an approximation and probably understates the total funding for all precollegiate programs.

¹⁸The estimate of 90,000 is based on 34 percent of precollegiate students being juniors and seniors in high school (to be presented in chapter 4 of this report), so that roughly half this number (i.e., 17 percent) were seniors. Some additional students might graduate from high school whose experience in precollegiate programs was prior to their senior year.

¹⁹Using a definition of the economically disadvantaged as those whose family incomes are under 150 percent of the poverty level. Statistics are based on the U.S. Department of Commerce, Bureau of the Census, *Current Population Reports*, "Poverty in the United States, 1991," series P-60, No. 175, August 1992, table 6. Some other definitions of disadvantaged would produce an even greater disparity between the number of

Table 3.--Median and total number of precollegiate students served, the institution's faculty and staff, and students who worked with the largest precollegiate program in 1993-94, and the mean student/faculty-staff ratio, by institutional characteristics: 1994

Institutional characteristic	Students served by program		Faculty and staff who worked with the program		Students who worked with the program*		Mean precollegiate student/faculty-staff ratio
	Median	Total	Median	Total	Median	Total	
All institutions.....	82	317,400	6	9,600	6	13,500	46.0
Control							
Public.....	90	264,500	6	6,100	6	8,400	60.3
Private.....	65	52,800	6	3,400	6	5,100	21.7
Level							
2-year.....	75	109,100	5	2,600	4	2,200	50.4
4-year.....	85	208,300	6	7,000	8	11,400	43.8
Region							
Northeast.....	65	52,100	6	2,700	5	3,600	28.7
Southeast.....	95	76,300	6	2,700	7	3,400	51.1
Central.....	75	46,900	5	2,100	6	3,200	26.6
West.....	89	142,100	7	2,100	6	3,300	83.1
Size of institution							
Less than 3,000.....	55	88,000	5	3,500	5	3,200	29.5
3,000 to 9,999.....	100	100,100	6	3,200	8	6,200	43.5
10,000 or more.....	115	129,200	7	2,900	10	4,100	80.0
Upward Bound is largest program							
Yes.....	86	32,300	5	3,000	10	4,200	19.4
No.....	75	285,100	6	6,600	6	9,400	57.7

*Includes institutions where none of the institution's students worked with the program in 1993-94.

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. Details may not add to totals because of rounding.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

precollegiate students and the number who were eligible. For example, over half of all students could probably be considered educationally disadvantaged in the sense that they were the first generation in their family to (potentially) receive a college degree. Among bachelor's degree recipients in 1990, 48 percent met this criterion. *National Study of Student Support Services, Interim Report: Volume 1 -- Program Implementation*, prepared by Westat, Inc. for the U.S. Department of Education, 1994, 2-21.

proportion of the total number of students who might be considered eligible for such programs. Not all of the precollegiate students can be expected to enroll in higher education, and some of these students might have enrolled even without the encouragement of the precollegiate programs, but these estimates might be compared with the total higher education enrollment of 14.5 million to obtain a rough estimate of the potential impact of current precollegiate programs on future higher education enrollment.²⁰

On average, the largest programs in public institutions had a greater number of participants (a median of 90 students) than those in private institutions (a median of 65), but since public institutions were also more likely to have precollegiate programs, there was an even greater difference in the total number of precollegiate students served (264,500 versus 52,800). There were also other large differences in the distribution of students. Many more precollegiate students were served at 4-year institutions than at 2-year institutions (208,300 versus 109,100), even though the median sizes were not greatly different (85 versus 75). Upward Bound programs served only a small proportion of the precollegiate students in the largest programs, with 32,300 students compared to 285,100 in other programs. Since records for Upward Bound indicate that roughly 42,000 students are served nationwide, the choice to sample only the largest precollegiate programs resulted in excluding roughly one-fourth of the Upward Bound students; however, Upward Bound students would constitute at most 13 percent of all precollegiate students even using the larger figure. Since non-Upward Bound students also were excluded through the decision to survey only the largest precollegiate programs, the actual percentage would be less than 13 percent.

The precollegiate programs involved a total of 9,600 faculty and staff, with a median of 6 per program. Public institutions had a lower share of faculty and staff (64 percent) than of students (83 percent), with the result that there was a great difference in the student/faculty-staff ratio in public and private institutions (60 versus 22). Programs at large institutions also had a relatively high student/faculty-staff ratio, with a mean of 80 compared with 30 at small institutions. Upward Bound programs had a relatively low student/faculty-staff ratio (19 versus 58 for other programs) - one indication that while they tended to be small in terms of the number of students served, they were relatively intensive in terms of the services provided.

²⁰The data on higher education enrollment are the estimated 1992 total fall enrollment, including both full-time and part-time students, from the *Digest of Education Statistics 1994*, op. cit., 176.

A median of 6 students at the institution worked with the precollegiate program (e.g., as tutors), with a greater number in 4-year than 2-year institutions (8 students versus 4), and more in large institutions than small institutions (10 students versus 5).

Primary Source of Funding

The federal government was the primary source of funding for 51 percent of the largest programs, while state and local governments were the primary source for 20 percent, institutional funding for 14 percent, and private funding (including both individuals and corporate/foundation funding) for 13 percent (table 4). Federal funding was especially important for public institutions (60 percent versus 36 percent for private institutions) and was more important in the Southeast than in the Northeast (69 percent versus 31 percent). On the other hand, private funding was more important at private institutions than public institutions (28 percent versus 5 percent). As might be expected for the U.S. Department of Education's Upward Bound programs, institutions almost universally stated that federal funding was their primary source of funding (97 percent); this contrasted greatly with how institutions described their other largest programs, with only 30 percent saying federal funding was the primary source.

Table 4.--Primary source of funding for institutions' largest precollegiate program, by institutional characteristics: 1994

Institutional characteristic	Tuition	Institutional funding	Federal government	State/local government	Private/individuals	Other sources
(percent)						
All institutions.....	1	14	51	20	13	1
Control						
Public.....	1	13	60	20	5	1
Private.....	1	16	36	19	28	0
Level						
2-year.....	1	13	57	24	6	0
4-year.....	1	15	48	18	17	1
Region						
Northeast.....	2	18	31	33	15	(+)
Southeast.....	0	5	69	16	9	1
Central.....	2	11	51	14	22	0
West.....	1	24	50	16	7	2
Size of institution						
Less than 3,000.....	2	17	49	16	17	0
3,000 to 9,999.....	0	9	52	26	12	1
10,000 or more.....	1	17	53	20	9	1
Upward Bound is largest program						
Yes.....	0	2	97	0	(+)	1
No.....	2	20	30	29	19	1

(+) Less than 0.5 percent.

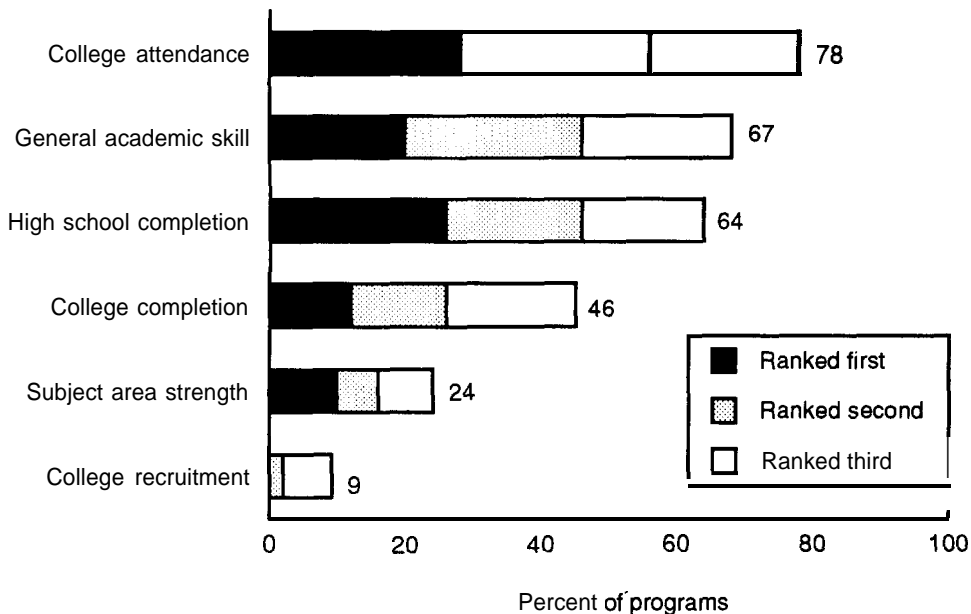
NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. Percents may not add to 100 because of rounding. Zeros appear in the table when no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Primary Goals of Precollegiate Programs

Institutions were asked to rank each of six potential goals for their largest precollegiate program in terms of their importance (figure 2).²¹ Essentially the same number of institutions reported that increasing college attendance or increasing high school completion was the top goal of the program (28 percent and 26 percent, respectively), but increasing college attendance stood out among these two as being more likely to be among the top three goals (78 percent versus 64 percent). Another goal -- increasing general academic skills development -- also was frequently indicated, with 20 percent of institutions saying it was their largest program's top goal and 67 percent saying it was among the top three goals. Each of these three goals was indicated as one of the top three goals for their largest precollegiate program by at least 64 percent of the institutions, while none of the remaining goals was among the top three for more than 45 percent.

Figure 2.--Primary goals of precollegiate programs:1994



SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

²¹Institutions could also write in another goal besides those listed on the questionnaire; however, few institutions added to the list provided.

The ranking of the goals varied depending on the institutional characteristics (table 5). Precollegiate programs at public institutions were more likely than those at private institutions to emphasize high school retention (32 percent versus 17 percent) and increasing the likelihood of attending college (34 percent versus 18 percent) as their single most important goal; programs at private institutions, on the other hand, were more likely to emphasize general academic skills (34 percent versus 12 percent). Programs at small institutions were more likely to emphasize general academic skills than those at large or mid-sized institutions (27 percent versus 12 to 16 percent).

Table 5.--Percent of institutions ranking selected potential goals of the precollegiate program as the most important goal, by institutional characteristics: 1994

Institutional characteristic	Increase retention in or completion of high school	Increase the likelihood of attending college	Increase the likelihood of completing college	Enhance college recruitment for this institution	Increase general academic skills development	Promote interest/strength in particular subject area
All institutions	26	28	12	(+)	20	10
Control						
Public.....	32	34	12	0	12	8
Private.....	17	18	13	1	34	13
Level						
2-year.....	30	35	7	0	12	13
4-year.....	25	25	15	1	24	8
Region						
Northeast	18	17	18	2	23	19
Southeast	30	36	5	0	25	5
Central	26	32	10	0	18	10
West.....	32	28	18	0	13	4
Size						
Less than 3,000	22	27	9	1	27	12
3,000 to 9,999.....	32	23	14	0	16	11
10,000 or more.....	26	39	17	0	12	4
Upward Bound is largest program						
Yes.....	21	46	20	0	14	0
No.....	29	21	9	1	23	14

(+) Less than 0.5 percent.

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. Not shown are the 3 percent of institutions that ranked some goal other than the six listed above as the most important goal. Zeros appear in the table when no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

There also were differences in goals between Upward Bound and other of the largest precollegiate programs. Upward Bound programs were more likely than other programs to emphasize the likelihood of attending college (46 percent versus 21 percent) and completing college (20 percent versus 9 percent), while they were less likely than other programs to emphasize promoting a particular subject area (0 percent versus 14 percent) and general academic skills (14 percent versus 23 percent).

Primary Location for Program

For the overwhelming majority of precollegiate programs run by higher education institutions, the primary location for holding the program was the college campus (80 percent; table 6). The main alternative was to hold the program at elementary or secondary schools (19 percent). Programs were more likely to be held on campus at private institutions than public institutions (91 percent versus 73 percent), at 4-year institutions than 2-year institutions (83 percent versus 73 percent), and at small institutions than at large or mid-sized institutions (88 percent versus 74 percent). Upward Bound programs also more commonly took place on campus than other programs (86 percent versus 77 percent).

Despite the widespread use of college campuses as the primary location, there were some differences with respect to location based on the priorities of the programs (table 7). The greatest use of elementary or secondary schools as the primary locations occurred when programs had either increasing students' completion of high school (34 percent) or increasing students' probability of attending college (24 percent) as their top goal; among the remaining programs, the range was from 0 percent (for programs seeking to enhance college recruitment) to 8 percent (for programs seeking to increase students' probability of attending college).

Table 6.--Percent of institutions using various locations as the primary location in which the largest precollegiate program is held, by institutional characteristics: 1994

Institutional characteristic	College campus	Elementary or secondary schools	Other locations
All institutions	80	19	1
Control			
Public.....	73	26	1
Private.....	91	9	0
Level			
2-year.....	73	27	0
4-year.....	83	16	1
Region			
Northeast	87	13	1
Southeast	77	22	1
Central.....	81	19	0
West.....	75	25	1
Size of institution			
Less than 3,000	88	12	0
3,000 to 9,999.....	74	25	1
10,000 or more.....	74	24	1
Upward Bound is largest program			
Yes.....	86	13	(+)
No.....	77	22	1

(+) Less than 0.5 percent.

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. Percents may not add to 100 because of rounding. Zeros appear in the table when no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 7.--Top goal and the primary location of the largest precollegiate programs: 1994

Institutional top goal	Primary location		
	College campus	Elementary or secondary schools	Other locations
Increase completion of high school	65	34	1
Increase probability of attending college	76	24	0
Increase probability of completing college	92	8	0
Enhance college recruitment	100	0	0
Increase general academic skills	92	7	1
Promote particular subject.....	94	6	0

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Hours of Participation **When programs operated.** Institutions were asked the number of hours a typical precollegiate student spends in program activities during the academic year and during the summer. An estimated 57 percent of the precollegiate programs operated during both the academic year and the summer, while 33 percent operated during the summer only, and 10 percent only during the academic year (table 8). Precollegiate programs at large institutions were more likely to have full-year programs than those at small institutions (74 percent versus 47 percent), while close to half (45 percent) of the programs at small institutions offered activities during the summer only. All Upward Bound programs operated during the full year, compared with only 38 percent of other precollegiate programs.

Just as 57 percent of the programs operated during the full year, an equivalent percentage of the students (58 percent) were in such programs.²² However, for those programs that operated for less than a full year, the distribution of students differed from the distribution of programs. Programs that operated only during the summer accounted for 33 percent of all programs but had just 8 percent of all students. Rather, students who were not in full-year programs tended to be in programs that operated only during the academic year (10 percent of programs, but 34 percent of students). There were also some differences based on institutional characteristics. Programs at large institutions had a greater proportion of students in full-year programs than programs at

²²Since institutions provided information about "typical" students, an individual student's full-year status was not necessarily the same as the program's.

small or mid-sized institutions (72 percent versus 47 to 49 percent).

Table 8.--Percent of the largest precollegiate programs in 1993-94 with program activities in the academic year only, in the summer only, or in both time periods, and the percent of students in each type of program, by institutional characteristics: 1994

Institutional characteristic	Percent of programs during			Percent of precollegiate students in programs operating during		
	Academic year only	Summer only	Both	Academic year only	Summer only	Both
All institutions.....	10	33	57	34	8	58
Control						
Public.....	12	28	60	35	6	58
Private.....	8	41	51	31	15	54
Level						
2-year.....	13	36	51	50	6	44
4-year.....	9	31	60	26	9	65
Region						
Northeast.....	13	43	44	38	16	46
Southeast.....	7	27	66	32	8	60
Central.....	9	27	64	27	11	63
West.....	13	33	53	37	4	59
Size of institution						
Less than 3,000.....	8	45	47	42	9	49
3,000 to 9,999.....	14	28	58	44	9	47
10,000 or more.....	9	17	74	21	7	72
Upward Bound is largest program						
Yes.....	0	0	100	0	0	100
No.....	15	47	38	38	9	53

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. Percents may not add to 100 because of rounding. Zeros appear in the table when no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Number of hours of activities. Typical students in precollegiate programs spent a mean of 247 hours in program activities during the academic year and the summer combined (table 9). Typical students spent more hours in program activities in 4-year institutions than in 2-year institutions (277 versus 189) and in large institutions than in small institutions (284 versus 216).

Table 9.--Mean number of total hours spent in program activities during the academic year, during the summer, and during both time periods, and the mean number of years a typical precollegiate student continues to participate in the largest precollegiate program, by institutional characteristics: 1994

Institutional characteristic	Total hours during the academic year ¹	Total hours during the summer ²	Total hours combined ³	Number of years a typical student participates
All institutions	112.3	191.6	247.4	2.9
Control				
Public.....	117.7	187.0	249.8	3.0
Private.....	100.9	199.1	243.5	2.6
Level				
2-year.....	108.7	137.4	189.2	2.7
4-year.....	113.9	217.6	276.7	2.9
Region				
Northeast	101.8	187.4	221.5	2.3
Southeast	110.2	183.3	251.5	3.2
Central	113.9	199.0	263.5	3.2
West.....	123.9	199.2	255.1	2.8
Size of institution				
Less than 3,000	89.0	181.6	216.3	2.5
3,000 to 9,999.....	122.6	204.1	263.0	3.0
10,000 or more.....	128.8	194.1	283.8	3.3
Upward Bound is largest program				
Yes.....	141.0	291.6	432.6	3.5
No.....	88.4	139.9	166.0	2.6

¹Includes only those institutions with programs held during the academic year.

²Includes only those institutions with programs held during the summer.

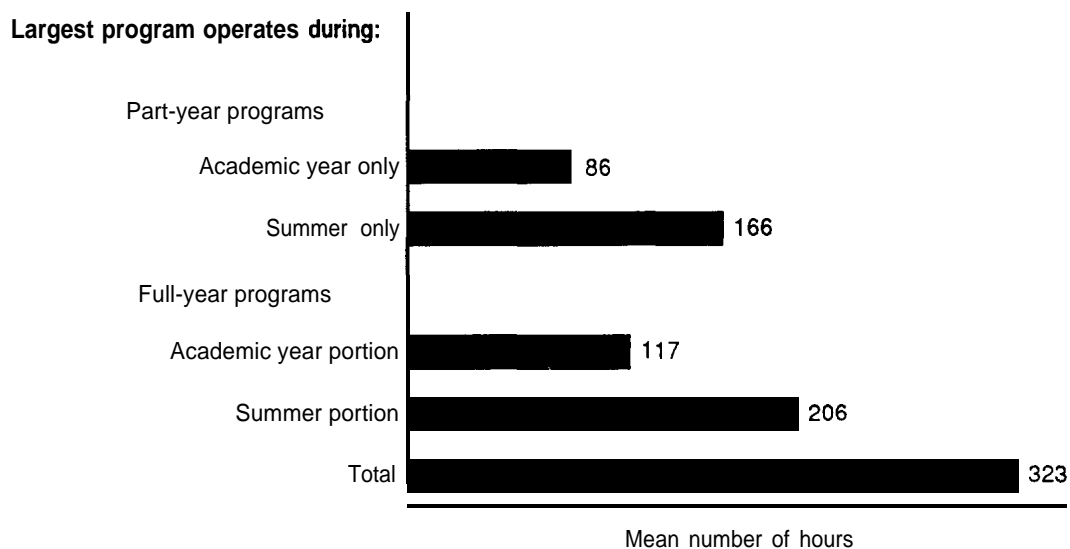
³Based on the sum of the total hours during the academic year and the total hours during the summer. If institutions only offered program activities during one part of the year, then that amount is treated as the total for the full year.

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Since 57 percent of the programs operated during both the summer and academic year, while others operated during only one time period or the other, institutions had several strategies available for apportioning the time. For example, one possibility is that programs that operate during the entire year would require the same level of activity as other programs while dividing that activity over the entire year. In fact, however, the intensity of the program was related to the time period in which it operated (figure 3). Programs that operated only during the academic year were the least intensive (with typical students spending a mean of 86 hours per year), and programs that operated during the entire year were the most intensive (a mean of 323 hours). Moreover, typical students actually spent more hours on average in summer program activities if they were in full-year programs (206 hours) than if they were in summer-only programs (166 hours). Thus, though fewer months are available during the summer than in the academic year, typical students spent more of their time in program activities during the summer when there presumably was less conflict with other school activities.

Figure 3.--Mean number of hours spent in program activities by precollegiate students: 1994



SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 9 shows how much time typical students spent in program activities if all programs are combined. As also shown in figure 3, the typical student spent more time in precollegiate programs in the summer than in the academic year (a mean of 192 hours, compared with 112).²³ Students in precollegiate programs at 2-year institutions spent an especially large number of hours in the summer (a mean of 218 hours versus 137 hours at programs in 4-year institutions), though students in 2-year and 4-year institutions had roughly equivalent hours of precollegiate program activities during the academic year (109 hours and 114 hours, respectively). A different pattern occurred for students in precollegiate programs in large institutions as compared to those in small institutions, with precollegiate students at large institutions spending a greater mean number of hours in the academic year (129 versus 89), but essentially the same number of hours in the summer (194 versus 182).

Upward Bound programs again were much more intensive than other precollegiate programs, with a mean of 433 hours over the full year, compared with 166 hours for other programs. In part, the difference was due to Upward Bound programs' greater use of full-year programs (noted earlier), but even for the academic year and the summer alone, students in Upward Bound programs had more hours of activities (141 versus 88 during the academic year, and 292 versus 140 during the summer).

Length of student participation. On average, institutions reported that typical precollegiate students in their largest programs participated for 2.9 years. Programs had somewhat longer periods of participation if they were at large institutions than if they were at small institutions (a mean of 3.3 years versus 2.5 years), and if they were Upward Bound programs than if they were other programs (3.5 years versus 2.6 years).

²³These means are based only on those programs with activities during the appropriate time period (i.e., zeroes are excluded). No distinction was made based on whether the program operated during both the academic year and the summer, or during one time period only.

4. Characteristics of the Students Served

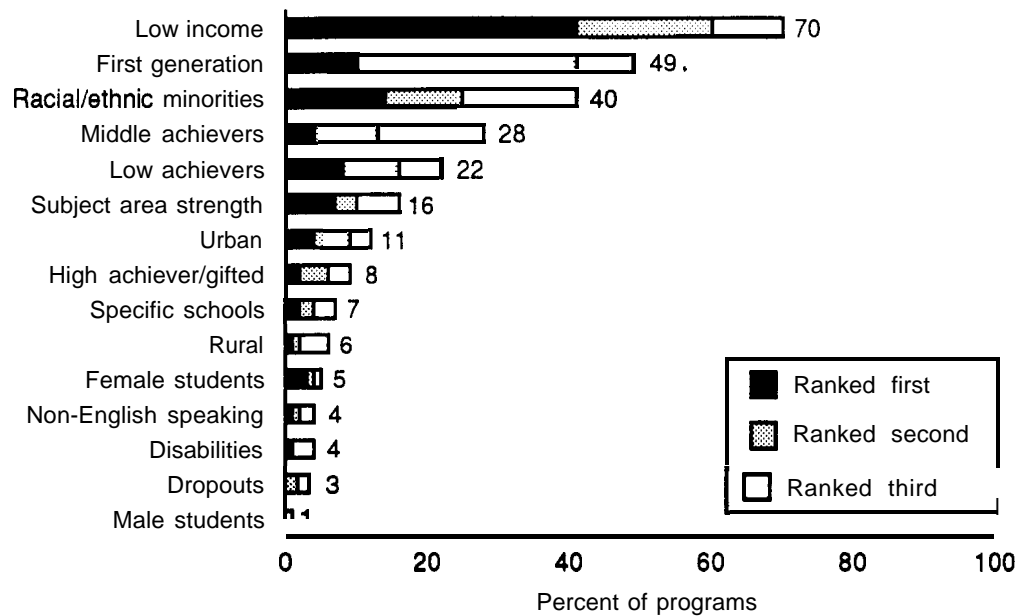
One of the defining attributes of a precollegiate program is the characteristics of the students who are served. This study looked at what types of students the largest programs chose to target and the distribution of participating students; it also looked at a program characteristic that affects student participation -- the grade levels served -- and the distribution of students with respect to this program feature.

Targeted Characteristics

While this study was directed toward precollegiate programs for the disadvantaged, disadvantage could be defined in either educational or economic terms, and precollegiate programs could still give other student characteristics a high priority for targeting. For example, a program might be targeted toward minority students who are disadvantaged, with students' minority status listed as the top priority and their disadvantaged status as the second priority.²⁴ To provide a more comprehensive picture of the types of students targeted, the survey questionnaire provided a list of 15 characteristics and asked the respondents to rank the top 3 that were specifically targeted. By far, the student characteristic that was most often targeted, and the only characteristic that was one of the top three targeted characteristics for a majority of programs, was low income (70 percent; figure 4). Two other characteristics were among the top three targeted characteristics for a third or more of the programs: being the first generation in the family to attend college (49 percent), and belonging to a racial or ethnic minority (40 percent). Because many of the characteristics listed in figure 4 received relatively low rankings (eight were listed among the top three characteristics by fewer than 10 percent of the programs), one might be tempted to conclude that few student characteristics were targeted. However, institutions were only asked to indicate the top three characteristics targeted by their largest precollegiate program; since 87 percent of the respondents used all three available rankings, many also might have targeted other characteristics (statistics not shown in tables).

²⁴The study required that a program target the disadvantaged in order to be included in the survey. However, it did not require that the disadvantaged be the top priority in targeting.

Figure 4.--Most important student characteristics for targeting: 1994



SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

There again were variations depending on institutional characteristics (table 10). Programs at public institutions were much more likely than those at private institutions to target first-generation students among the top three (58 percent versus 35 percent), as were programs at large institutions compared with those at small or mid-sized institutions (65 percent versus 41 to 49 percent). By contrast, precollegiate programs at private institutions were more likely to highly target a specific subject area interest or strength (26 percent versus 10 percent).

Upward Bound programs had different priorities in targeting than other programs, as might be expected since a focus on low-income and first-generation students is a specific goal of Upward Bound. In fact, these characteristics were listed almost universally among Upward Bound programs but less often among the other largest programs (98 percent versus 58 percent for low-income students, and 95 percent versus 29 percent for first-generation students). Upward Bound programs were less likely than other programs to target some other student characteristics: racial/ethnic minorities (23 percent versus 48 percent), and subject area interests or strengths (4 percent versus 21 percent).

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Table 10.--Percent of precollegiate programs ranking specified qualities among the top three student characteristics for targeting by their precollegiate program, by institutional characteristics: 1994

Institutional characteristic	Low income	First generation	Racial/ethnic minorities	Middle achievers	Low achievers	Specific subject area interest/strength	Urban	High achievers or gifted/talented	All students at specific schools	Rural
		to attend college								
All institutions.....	70	49	40	28	22	16	11	8	7	6
Control										
Public.....	70	58	41	32	22	10	7	5	7	5
Private.....	70	35	39	22	22	26	18	13	7	6
Level										
2-year.....	68	48	38	28	26	13	6	5	8	4
4-year.....	71	50	41	28	20	17	14	10	6	7
Region										
Northeast.....	67	30	46	24	28	17	15	8	5	7
Southeast.....	77	61	22	27	25	18	7	16	5	7
Central.....	67	52	52	24	12	19	17	5	5	5
West.....	68	55	41	38	22	8	6	2	12	3
Size of institution										
Less than 3,000.....	70	41	37	26	24	22	10	10	6	8
3,000 to 9,999.....	69	49	38	32	22	12	14	8	7	5
10,000 or more.....	72	65	49	26	18	9	11	4	8	1
Upward Bound is largest program										
Yes.....	98	95	23	32	11	4	3	1	5	10
No.....	58	29	48	26	26	21	15	11	8	4

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Demographic Characteristics of the Precollegiate Students

While a description of targeting is useful to describe precollegiate program emphases, it may not necessarily provide a good description of the students' characteristics overall. Precollegiate programs may vary in the degree to which they are effective in their targeting of student characteristics. Also, two programs may target different characteristics, but if those characteristics are interrelated, the programs may end up with similar types of students. This study did not seek to obtain a full description of the students in terms of all of the characteristics that might be targeted, but it did ask for the percentages of precollegiate students who were from low-income families, who were female, and who fit various racial/ethnic categories. These percentages were multiplied by the total number of precollegiate students in the programs and summed across all institutions to produce national estimates of the characteristics of the students served.

Overall, 68 percent of all precollegiate students in the largest programs were from low-income families, and 59 percent were female (table 11). Upward Bound programs, perhaps reflecting their special focus, had a higher proportion of low-income students than other programs (83 percent versus 67 percent). Also, programs in the Central and Southeast regions had a higher proportion of low-income participants than those in the West (76 percent versus 59 percent).

When delineated by racial group, 39 percent of students served across all precollegiate programs were black, while 29 percent were Hispanic and 24 percent were white (table 12). Blacks formed a larger proportion of participants in private institutions than in public institutions (59 percent versus 36 percent) and in the Southeast (65 percent) than in the West (19 percent). By contrast, programs in the West had a higher proportion of Hispanic participants than those in any other region (53 percent versus 7 to 21 percent). Upward Bound programs had a higher proportion of blacks than other programs (49 percent versus 38 percent) and a lower proportion of Hispanics (13 percent versus 31 percent).

The demographic characteristics of students in the precollegiate programs were different from that of the general population of students in higher education. The students were more likely to be black (39 percent versus 23 percent) or to be Hispanic (29 percent versus 10 percent).²⁵ There was little difference, however, in the percentage who were female (59 percent versus 55 percent).

²⁵*Digest of Education Statistics 1994*, op. cit., 207-208. It is difficult to compare the students in terms of their family income because different precollegiate programs may have defined *low income* in different ways.

Table 11.--Percent of precollegiate students who are low income and who are female, by institutional characteristics: 1994

Institutional characteristic	Low income	Female
All institutions.....	68	59
Control		
Public.....	67	59
Private.....	77	61
Level		
2-year.....	66	58
4-year.....	69	60
Region		
Northeast.....	75	61
Southeast.....	76	62
Central.....	76	58
West.....	59	58
Size of institution		
Less than 3,000.....	65	58
3,000 to 9,999.....	72	60
10,000 or more.....	67	60
Upward Bound is largest program		
Yes.....	83	61
No.....	67	59

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 12.--Percent of precollegiate students in each racial/ethnic category, by institutional characteristics: 1994

Institutional characteristic	Hispanic	Black, non-Hispanic	White, non-Hispanic	Asian or Pacific Islander	American Indian or Alaskan Native	Race/ ethnicity unknown
All institutions	29	39	24	4	3	1
Control						
Public.....	31	36	25	4	3	1
Private.....	19	59	18	4	(+)	(+)
Level						
2-year.....	28	30	37	2	3	1
4-year.....	30	44	18	4	2	1
Region						
Northeast	21	49	24	4	(+)	1
Southeast	4	65	29	1	(+)	(+)
Central	7	50	33	5	5	1
West.....	53	19	19	4	4	2
Size of institution						
Less than 3,000	26	31	40	1	1	(+)
3,000 to 9,999.....	23	48	21	4	2	1
10,000 or more.....	36	38	16	5	3	2
Upward Bound is largest program						
Yes.....	13	49	29	6	2	(+)
No.....	31	38	24	3	2	1

(+) Less than 0.5 percent.

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. Percents may not add to 100 because of rounding.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

The Grade Level at Which Students Usually Enter Precollegiate Programs

Just as precollegiate programs target certain student characteristics (such as low-income or first-generation students), they also target certain grade levels. One program might serve only elementary students, another might serve only high school seniors, and another might serve a broad range of grade levels. The choice of which grade levels to serve affects the structure of precollegiate programs. A program will need different resources and skills for serving elementary school students than for serving high school students, and it may need a wider range of resources and skills if a broad mix of grade levels is served. Also, the greater the number of years a student participates, the greater the cost is likely to be per student. Finally, the ability to influence students conceivably might vary depending on the grade level served. If the programs start at an early grade, there may be a greater ability to prevent disadvantaged students from falling behind their peers, the students may be more open to influence, and there may be a chance to prevent students from dropping out of school. On the other hand, it might be harder to motivate students if college seems a more distant goal.

To provide information about the typical entry age of a program, institutions were asked when students *usually* enter the largest precollegiate program.²⁶ The remainder of this section discusses precollegiate programs from this perspective. In the succeeding section precollegiate programs are also examined with respect to the total range of grade levels served. This provides a better measure of the diversity that precollegiate programs encounter; it differs from the discussion in this section by looking at when students leave the program and by using the earliest grade for which there are participants, rather than when students usually enter.

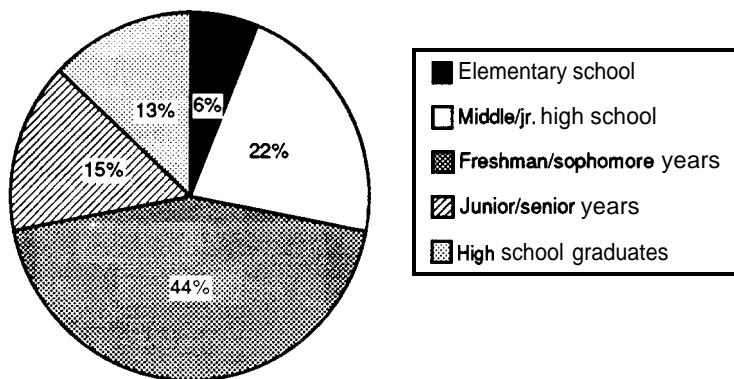
Most commonly, institutions reported that students usually entered the program in their freshman or sophomore years of senior high school (44 percent; figure 5). The remaining institutions said students usually started the programs in middle or junior high school (22 percent), the junior or senior year in high school (15 percent), as high school graduates (13 percent), and in elementary school (6 percent).

Some of the differences in the starting times were related to the characteristics of the higher education institutions (table 13). Programs at 4-year institutions were more likely than those at 2-year institutions to have precollegiate students usually start in the

²⁶For programs that operated only during the summer, institutions were asked to use the grade level completed just before participating in the summer program, except that high school graduates were treated as a separate group rather than being combined with high school seniors.

freshman/sophomore years (51 percent versus 30 percent), while the entry times for programs at 2-year institutions were more spread out among junior and senior high school grades. Programs in the Northeast were more likely than those in the Central and Southeast regions to have programs for high school graduates (31 percent versus 1 to 4 percent), and programs at

Figure 5.--Grade in which students typically start participating in precollegiate programs:
1994



Percent of programs

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 13.--Percent of institutions indicating each grade level as the one grade level at which precollegiate students usually enter the program, by institutional characteristics: 1994

Institutional characteristic	Elementary school	Middle/ junior high school	Freshman or sophomore year in senior high school	Junior or senior year in senior high school	High school graduate
All institutions	6	22	44	15	13
Control					
Public.....	5	27	43	14	11
Private.....	8	14	44	17	16
Level					
2-year.....	5	28	30	24	13
4-year.....	7	19	51	10	13
Region					
Northeast	3	15	29	22	31
Southeast	4	29	49	15	4
Central	13	24	54	8	1
West.....	7	21	42	15	15
Size					
Less than 3,000	7	19	37	20	17
3,000 to 9,999	8	24	47	11	10
10,000 or more.....	3	25	51	11	10
Upward Bound is largest program					
Yes.....	0	2	97	1	0
No.....	9	31	20	21	18

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. Percents may not add to 100 because of rounding. Zeros appear in the table when no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

large institutions were more likely than those at small institutions to have programs usually starting in the freshman/sophomore years of high school.

While there were some differences based on institutional characteristics, there were some even larger differences based on characteristics of the programs. One such difference was between Upward Bound and other programs: Upward Bound programs were much more likely than other programs to have students usually starting in the freshman or sophomore years (97 percent versus 20 percent), while other programs often started either earlier (40 percent) or later (39 percent). Another difference between programs was related to the primary goal of each program -- a difference that is logical since some goals might require earlier intervention than others. The largest precollegiate programs were much more likely to start at least by the sophomore year in high school (or earlier) if the top goal was high school completion (86 percent) or college attendance (84 percent) than if it was increasing general academic skills (62 percent) or college completion (54 percent; figure 6).²⁷ Furthermore, if the top program goal was high school completion, then half (52 percent) of the programs usually had students start before high school, compared with one-fourth if the goal was increasing general academic skills (25 percent) or college attendance (22 percent), and 3 percent if the top goal was college completion.

The Grade Levels Served by the Precollegiate Programs

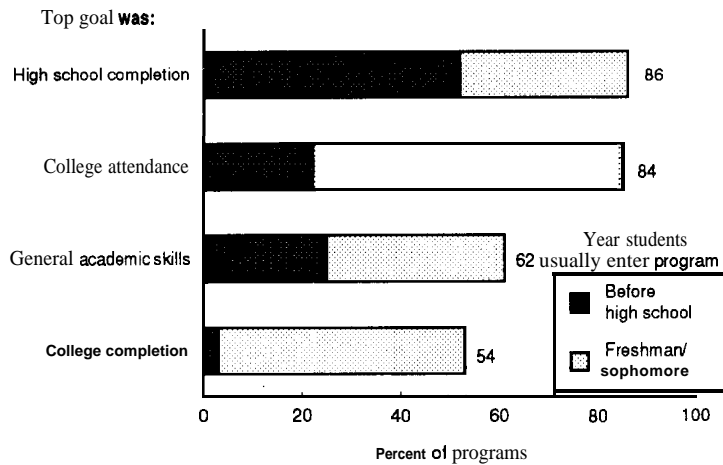
A focus on when students *usually* enter a precollegiate program, though useful in providing an initial picture of the programs, understates the great variation in grade levels that programs serve. Programs may admit some students before they reach the usual grade level, and programs vary in how long students stay in them. Some programs include a full grade span from elementary school through high school, while others deal with only one or two grade levels (e.g., a program might promote mathematics skills in junior high school students). This section examines the grade ranges served by the largest precollegiate programs from two perspectives: in terms of the diversity within each individual program, and summing across all programs, in terms of the overall distribution of students.

Figure 7 provides an overview of the grade ranges covered by the individual programs, and clearly shows there were some tremendous differences in those ranges. A small percentage of programs had a very extended grade range (e.g., 5 percent had both students in elementary school and students who were juniors

²⁷Two goals, college recruitment and promoting interest/strength in a particular subject area, are not included in the figure because there were too few institutions naming these goals as their top goal to produce reliable statistics.

or seniors in high school), while others dealt with only one or two grades (8 percent had only high school juniors and/or

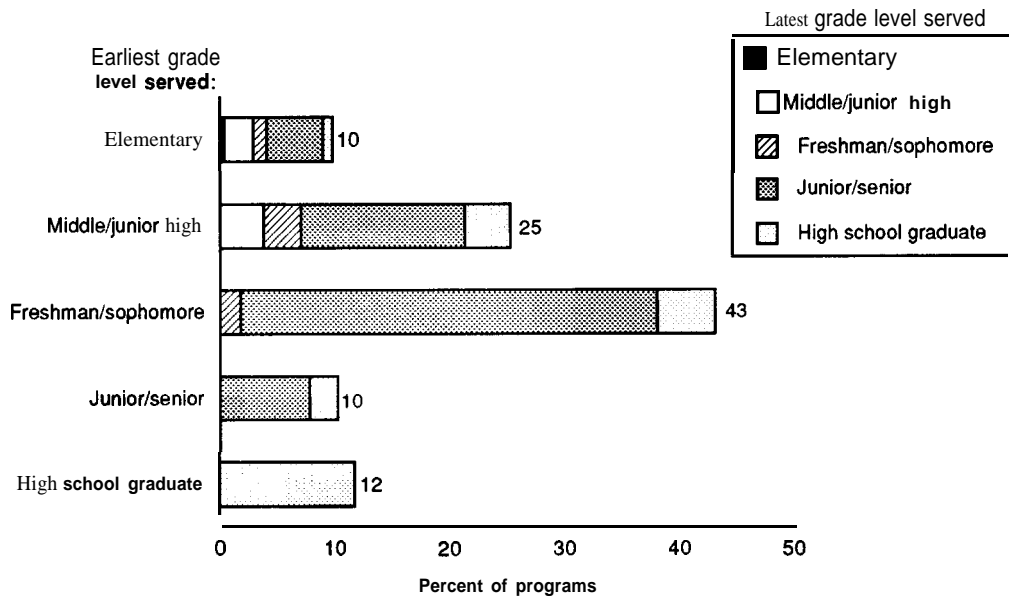
Figure 6.--Precollegiate program goals and the year in which students usually start: 1994



NOTE: The remainder of precollegiate programs with one of the above goals as the top goal said that students usually entered the program either during the junior/senior years of high school or as high school graduates.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Figure 7.--Grade ranges served by precollegiate programs: 1994



NOTE: The total length of a bar shows the percent of programs that start with the specified grade level, while the components of each bar show the last grade level served. For example, 10 percent of all precollegiate programs had elementary school students in the earliest grade level served. Within this group, the largest group was of programs for which high school juniors and/or seniors were in the latest grade level served.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

seniors and 12 percent had only high school graduates).²⁸ However, the general orientation of the programs was toward the 4 years of high school. By far the most common practice was to make the freshman/sophomore level in high school the earliest grade level served (43 percent); among these programs, most (36 percent of all programs) also ended their involvement with juniors or seniors in high school. Or, to summarize the data in a different way, almost half (46 percent) of the programs were limited to the high school years (either freshmen/sophomores only, juniors/seniors only, or both), and most of the remaining programs (36 percent of the total) included some or all of the high school years in combination with grades outside of high school.

One cannot directly extrapolate from these statistics on programs to statistics on the overall distribution of students. However, given the programmatic emphasis on the high school years, it should not be surprising that the majority of precollegiate students were either freshmen or sophomores in high school (30 percent) or juniors or seniors (34 percent; table 14).²⁹ This was especially true of Upward Bound programs, for which 98 percent of all students were in high school, but was true as well for other programs, for which 60 percent of the precollegiate students were in high school.

²⁸Additional information on the estimates in figure 7 is presented in table 24.

²⁹Note that the distribution of students is somewhat different than might be expected from the stated policies of the programs. Thus, while figure 7 shows that 12 percent of the programs served only high school graduates, and that another 12 percent of programs served high school graduates in combination with other grade levels, the total percentage of precollegiate students who were high school graduates was only 5 percent. This difference in the distributions occurred because the programs that served high school graduates tended to be small, while the programs serving elementary and middle/junior high students were disproportionately large.

Table 14.--Percent of precollegiate students at each grade level, by institutional characteristics: 1994

Institutional characteristic	Elementary school students	Middle/junior high school students	Freshman or sophomore students in senior high school	Junior or senior students in senior high school	High school graduates
All institutions.....	6	25	30	34	5
Control					
Public	5	27	30	34	4
Private.....	9	19	32	35	6
Level					
2-year.....	5	25	27	39	3
4-year.....	6	26	32	32	6
Region					
Northeast.....	6	22	20	34	17
Southeast.....	3	28	34	32	3
Central.....	3	29	35	31	2
West.....	8	24	30	36	2
Size					
Less than 3,000.....	7	24	32	34	3
3,000 to 9,999	10	22	28	35	5
10,000 or more	1	29	31	33	6
Upward Bound is largest program					
Yes	(+)	1	48	50	1
No.....	6	28	28	32	5

(+) Less than 0.5 percent.

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. A zero estimate means that all programs in the sample reported that 0 percent of their precollegiate students were in the category. Percents may not add to 100 because of rounding.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

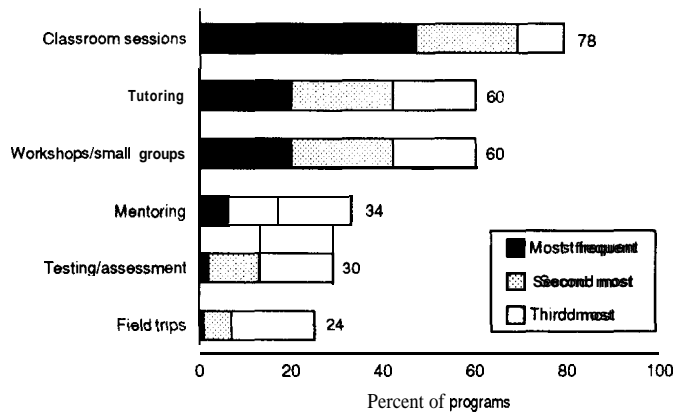
5. Services Offered by the Largest Precollegiate Programs

Services offered by the largest precollegiate programs were examined in three ways: in terms of the approaches used to provide the services, the services that were the most important, and the financial benefits that were offered to participants,

Approaches for Providing Services

When given a list of six methods that programs might use to provide services, 78 percent of the institutions ranked classroom sessions among the top three for their largest precollegiate program, 60 percent indicated tutoring, and 60 percent indicated workshops and small groups (figure 8). Among the remaining methods, 34 percent said mentoring was in the top three, 30 percent picked testing/assessment, and 24 percent indicated field trips.

Figure 8.--Most frequently used approaches for providing services in largest precollegiate programs: 1994



SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

There often were differences in the approaches that were used, depending on the characteristics of the institutions offering the programs (table 15). Four-year institutions more often said tutoring was the single most used approach than did 2-year institutions (24 percent versus 11 percent), and small institutions more often said workshops and small groups were the top approach than did large institutions (25 percent versus 13 percent). Upward Bound programs differed from other programs by having a greater emphasis on tutoring (32 percent versus 14 percent) and less emphasis on workshops and small groups (13 percent versus 23 percent).

Table 15.--Percent of institutions indicating a particular approach to providing services was the single most frequently used one, by type of approach and institutional characteristics: 1994

Institutional characteristic	Tutoring	Mentoring	Classroom sessions	Testing/assessment	Workshops and small group meetings	Field trips
All institutions	20	6	47	2	20	1
Control						
Public.....	20	5	43	3	22	1
Private.....	19	7	53	1	16	0
Level						
2-year.....	11	4	53	3	26	1
4-year.....	24	7	44	2	17	(+)
Region						
Northeast	16	7	53	1	19	1
Southeast	21	3	46	3	26	0
Central.....	28	4	34	3	23	1
West.....	12	12	55	3	11	2
Size						
Less than 3,000	17	6	49	0	25	1
3,000 to 9,999.....	21	5	45	3	20	0
10,000 or more.....	22	7	45	6	13	1
Upward Bound is largest program						
Yes.....	32	0	48	4	13	0
No.....	14	9	47	2	23	1

(+) Less than 0.5 percent.

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. Not shown are the 4 percent of institutions that ranked some approach other than the six listed above as the most frequently used approach. Zeros appear in the table when no institution in the sample gave the indicated response.

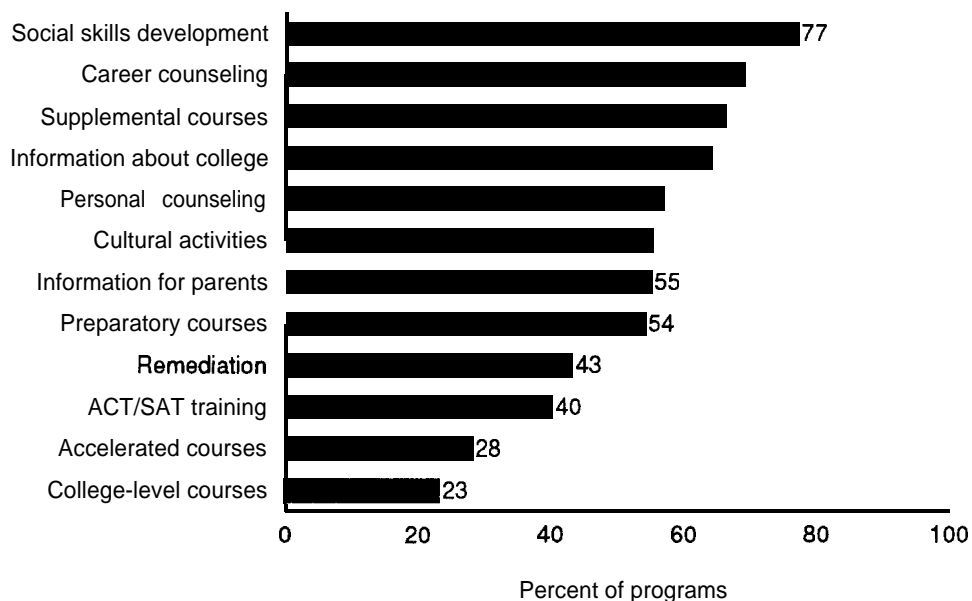
SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Most Important Services

At the time the survey questionnaire was developed, it was not known whether precollegiate programs were structured around just a few services or reflected a more multifaceted approach. For this reason, the questionnaire was designed to ask about a list of 12 program services in two different ways: first by asking whether each service was very important, somewhat important, or not at all important, and second by ranking the top 3 services in order.

The responses showed that the largest precollegiate programs took a multifaceted approach to working with their students, rather than simply emphasizing one or two services. Of the 12 listed services, 8 were described as very important by a majority of the programs (figure 9). The services most often described in this way were social skills development/confidence building (77 percent), career counseling (69 percent), supplemental courses (66 percent), and information about college admissions and/or financial aid (64 percent). Because so many items were described as very important, however, these statistics provide only rough information about programs' priorities.

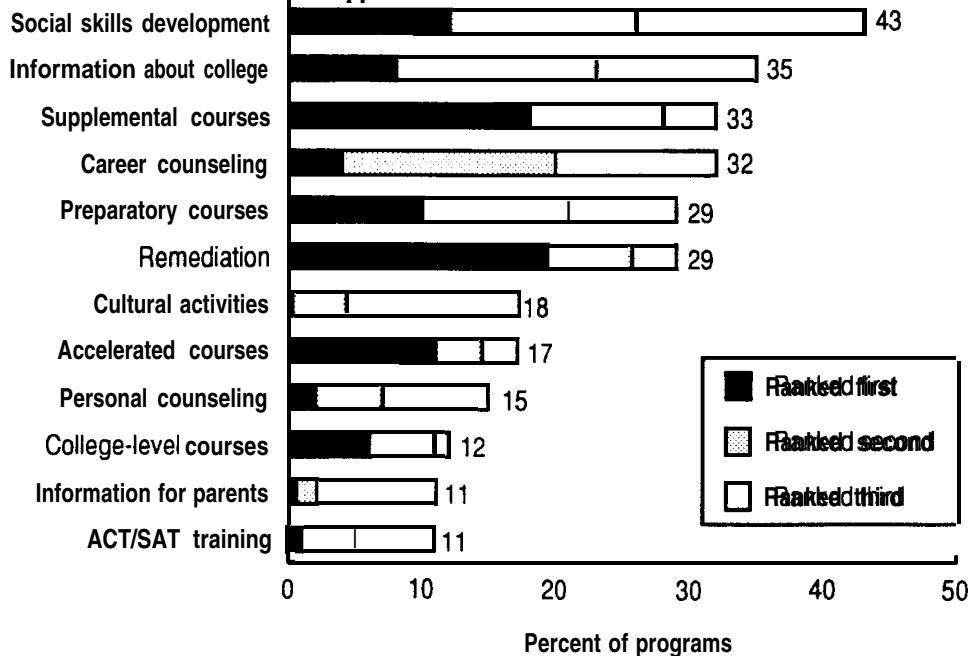
Figure 9.--Percent of largest precollegiate programs rating selected services as very important: 1994



SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

The rankings that institutions provided supply considerably more detail about programs' priorities. The services most often ranked among the top three were social skills development (43 percent), information about college admissions and/or financial aid (35 percent), supplemental courses (33 percent), career counseling (32 percent), preparatory courses (29 percent), and remediation (29 percent; figure 10). However, it would be incorrect to infer from the high ranking given to social skills development that this service was emphasized more than academic skills. In fact, institutions were more likely to rank as the single most important priority either remediation (19 percent) or supplemental courses (18 percent) than social skills development (12 percent); further, if the five academically related services are grouped together (remediation, academically accelerated courses below the college level, college-level courses, special preparatory courses, and other supplemental courses), then programs were far more likely to rate among the top three one of these academic services (81 percent; not in tables) than social skills development (43 percent).

Figure 10.--Percent of largest precollegiate programs ranking selected services as among the three most important: 1994



SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

In some cases there were differences in program priorities based on institutional characteristics (table 16). Supplemental courses were reported among the top three more often by 4-year institutions than 2-year institutions (37 percent versus 24 percent), and information about admissions and/or financial aid was more often among the top three for programs at public institutions than at private institutions (45 percent versus 19 percent) and programs at large institutions than at small institutions (50 percent versus 27 percent). Perhaps reflecting a greater vocational focus, career counseling was more often among the top three at 2-year institutions than at 4-year institutions (48 percent versus 25 percent).

There also were some significant differences between Upward Bound and other programs. Upward Bound programs were more likely than other programs to rank accelerated courses below the college level among the top three (35 percent versus 10 percent), as well as other supplemental courses (44 percent versus 28 percent) and information about admissions and/or financial aid (56 percent versus 27 percent); they were less likely to put social skills development among the top three (26 percent versus 51 percent).

Financial Awards to Participants

An estimated 63 percent of the largest precollegiate programs provided some type of financial award, including 50 percent that paid a stipend for participation and 33 percent that offered financial incentives for successful performance (table 17).³⁰ Financial awards were especially common among Upward Bound programs, both overall (99 percent versus 47 percent) as well as for each type of aid (98 percent versus 28 percent for stipends for participation, and 49 percent versus 26 percent for benefits for successful performance).

The incentives that programs provided for successful performance included a variety of types of aid (table 18). In fact, 63 percent of the institutions providing such benefits indicated that they provided some other benefit in addition to or in place of any of the five types listed on the questionnaire. Often, however, these "other" incentives were quite similar to those listed on the questionnaire, except that they provided for only partial payments or they applied to only a small number of precollegiate students. Most commonly, these responses indicated that a scholarship or stipend was paid to at least some students (32 percent) or that some costs (e.g., tuition, room and board, books) were at least partially met (25 percent). Among the five benefits listed on the questionnaire, the most often reported benefit was college-level

³⁰Some programs provided both benefits.

courses offered for credit free of charge or at reduced prices (39 percent).

Table 16.--Percent of institutions ranking selected services among the three most important in their largest precollegiate program, by institutional characteristics: 1994

Institutional characteristic	Social	Remedia- tion	Accelerated	College-	Special	Other	ACT/ SAT training	Information	Career counseling	Personal counseling	Cultural	Information
	skills development		courses, below college level	level courses	prepar- atory courses	supple- mental courses		about admissions/ financial aid			activities and field trips	
All institutions.....	43	29	17	12	29	33	11	35	32	15	18	11
Control												
Public	39	27	17	9	28	31	14	45	35	13	18	13
Private	51	31	17	18	31	36	7	19	29	18	18	9
Level												
2-year	45	32	15	10	28	24	9	37	48	13	15	11
4-year	43	27	19	13	30	37	13	35	25	16	19	11
Region												
Northeast	51	40	12	18	30	31	6	26	32	17	10	8
Southeast	37	23	28	13	24	35	17	36	32	16	22	10
Central	37	24	15	5	31	35	8	40	39	13	24	13
West	50	28	12	13	31	30	14	42	25	14	15	15
Size of institution												
Less than 3,000	46	33	16	16	30	28	6	27	36	16	23	7
3,000 to 9,999	44	27	18	10	29	39	12	37	30	12	12	15
10,000 or more	36	23	18	8	28	33	19	50	29	16	16	15
Upward Bound is largest program												
Yes	26	24	35	5	32	44	19	56	20	17	11	6
No	51	31	10	15	28	28	8	27	38	14	21	13

NOTE: Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 17.--Percent of institutions at which the largest precollegiate program provides one or more financial benefits, by institutional characteristics: 1994

Institutional characteristic	Any financial benefits*	Stipends paid for participation	Financial benefits offered for successful performance
All institutions.....	63	50	33
Control			
Public.....	61	49	34
Private.....	67	50	31
Level			
2-year.....	58	48	28
4-year.....	66	51	35
Region			
Northeast.....	64	45	34
Southeast.....	65	54	29
Central.....	60	52	32
West.....	61	47	38
Size of institution			
Less than 3,000.....	63	50	30
3,000 to 9,999.....	62	48	35
10,000 or more.....	64	51	36
Upward Bound is largest program			
Yes.....	99	98	49
No.....	47	28	26

*Includes institutions that pay stipends for participation in the program, offer financial benefits for successful performance, or both.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 18.--Percent of institutions providing specific financial benefits among those that offer benefits for successful performance, by institutional characteristics: 1994

Institutional characteristic	Financial benefits offered*					
	Full tuition guarantee at any college	Full tuition guarantee at your institution	Last dollars needed for tuition after receipt of other financial aid	College courses for credit free or at reduced prices	Pay for grades received at the precollegiate level	Other financial benefit
All institutions	4	16	15	39	12	63
Control						
Public.....	2	14	12	43	17	67
Private.....	8	19	20	33	5	55
Level						
2-year.....	5	21	16	56	12	54
4-year.....	4	13	14	33	13	66
Region						
Northeast	0	8	27	26	2	67
Southeast	6	28	16	49	22	49
Central.....	6	18	2	45	19	60
West.....	5	9	13	39	9	73
Size of institution						
Less than 3,000	7	22	13	42	7	53
3,000 to 9,999.....	3	12	19	32	17	75
10,000 or more.....	2	11	10	44	16	62
Upward Bound is largest program						
Yes.....	5	6	7	61	21	57
No.....	3	23	21	22	5	68

*Percentages in these columns are based on the 33 percent of precollegiate programs that offered financial benefits for successful performance.

NOTE: Other financial benefits mentioned included scholarships, book grants, and partial financial aid. Data are for the largest precollegiate program (in terms of funding) at higher education institutions in the 50 states, the District of Columbia, and Puerto Rico.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Upward Bound programs differed from other precollegiate programs in their use of several of these benefits, with a greater use of college courses at reduced prices (61 percent versus 22 percent) and pay for precollege grades (21 percent versus 5 percent); Upward Bound programs less often reported use of a full tuition guarantee at the institution (6 percent versus 23 percent) and the last dollars needed for tuition (7 percent versus 21 percent). Other differences between programs were a greater use of reduced cost college-level courses at 2-year institutions than at 4-year institutions (56 percent versus 33 percent) and a greater offering of pay for grades at public institutions than at private institutions (17 percent versus 5 percent).

6. Summary

Approximately one-third of all institutions--including most large institutions (71 percent) and almost half of all public institutions (45 percent)--offered at least one precollegiate program for disadvantaged students in 1993-94. Considering only the largest precollegiate program at each institution, these programs served an estimated 317,400 students and involved 9,600 faculty and staff in 1993-94. It was estimated that 68 percent of participants were from low-income families, 59 percent were female, 39 percent were black, and 29 percent were Hispanic. These largest precollegiate programs are likely to account for roughly 64 percent of the funding and 60 percent of the students in all such programs.

In scope, precollegiate programs for the disadvantaged were ancillary to institutions' primary mission of providing postsecondary education. About 90,000 students in these programs were expected to graduate from high school in the next year and thus potentially enter postsecondary education, compared with a total higher education enrollment of 14.5 million. Similarly, the institutional resources provided to the largest precollegiate programs were small compared with the resources for higher education; the programs had 9,600 faculty and staff compared with a total of 826,000 senior instructional faculty.³¹ The programs were also small with respect to the total number of students who might be considered eligible; the estimated 90,000 high school graduates contrasted with 1.1 million students of a comparable age who were economically disadvantaged.

Institutional respondents commonly indicated that increasing the likelihood of the students attending college was one of their top three goals (78 percent), while other goals that were frequently cited among the top three were increasing general academic skills development (67 percent) and increasing retention in or completion of high school (64 percent). Most of the precollegiate programs used the college campus as their primary location, but programs that had as their top goal either increasing high school completion or increasing college attendance were more likely than others to use elementary or secondary schools as their primary location.

³¹Statistics are for 1991. *Digest of Education Statistics, 1994*. op. cit., 230.

Precollegiate programs for the disadvantaged were primarily directed towards high school students, with 44 percent stating the students usually entered the program in the freshman or sophomore year and 15 percent in the junior or senior year. Overall, almost two-thirds of the precollegiate program participants in 1993-94 were high school students. The goals of the largest precollegiate programs were sometimes related to the grade levels being served, with programs being more likely to target younger students if the top goal was high school completion or increasing college attendance.

For half (51 percent) of the programs, the federal government was their primary source of funding, while other common sources were the state and/or local governments (20 percent), institutional funding (14 percent), and private sources (13 percent).

The largest precollegiate programs most often operated during both the academic year and the summer, but in programs that ran for a full year, students typically participated for a greater number of hours during the summer. On average, students participated for 2.9 years. The services offered through the precollegiate programs that were most often considered among the three most important, according to the program officials, were social skills development (43 percent), information about admissions and/or financial aid (35 percent), and supplemental courses (33 percent). However, remediation (19 percent) and supplemental courses (18 percent) were both ranked first more often than social skills development (12 percent). Most programs also provided some type of financial benefit, with 50 percent paying a stipend for participation and 33 percent offering financial benefits for successful performance.

This survey was not designed as an evaluation of either federal or institutional programs, and cannot compare the various precollegiate programs in terms of students' ultimate performance. What can be said is that federal support formed an important part of the largest precollegiate programs. Half (51 percent) said that the federal government was the primary source of funding; even excluding Upward Bound programs (among whom 97 percent made this claim), federal funding was still the primary funding source for 30 percent of the remaining programs. Of course, by focusing on the largest precollegiate programs based on funding, this survey may overrepresent programs receiving outside funding compared with the remaining precollegiate programs.

Upward Bound programs differed in many ways from other large precollegiate programs. In this sense, though many institutions have precollegiate programs for the disadvantaged, Upward Bound might be viewed as producing a relatively unique set of

program characteristics. Upward Bound programs served a relatively small number of students (about one-tenth of the total) and were relatively intensive: they had a lower student/faculty-staff ratio, a longer average student participation, and a greater number of hours of student participation during both the academic year and the summer. Their top goals were more likely to be increasing college attendance and increasing college completion. Their services placed a greater emphasis on accelerated courses below the college level, other supplemental courses, and providing information about admissions and/or financial aid. Compared with other programs, their precollegiate students were more likely to come from low income families and to be black, and were less likely to be Hispanic.

Survey Methodology and Data Reliability

Postsecondary Education Quick Information System

The Postsecondary Education Quick Information System (PEQIS) was established in 1991 by the National Center for Education Statistics, U.S. Department of Education. PEQIS is designed to conduct brief surveys of postsecondary institutions or state higher education agencies on postsecondary education topics of national importance. Surveys are generally limited to two or three pages of questions, with a response burden of about 30 minutes per respondent. Most PEQIS institutional surveys use a previously recruited, nationally representative panel of institutions. The sampling frame for the PEQIS panel recruited in 1992 was constructed from the 1990-91 Integrated Postsecondary Education Data System (IPEDS) Institutional Characteristics file. Institutions eligible for the PEQIS frame for the panel recruited in 1992 included 2-year and 4-year (including graduate-level) institutions (both institutions of higher education and other postsecondary institutions), and less-than-2-year institutions of higher education located in the 50 states, the District of Columbia, and Puerto Rico: a total of 5,317 institutions.

The PEQIS sampling frame for the panel recruited in 1992 was stratified by instructional level (4-year, 2-year, less-than-2-year), control (public, private nonprofit, private for-profit), highest level of offering (doctor's/first professional, master's, bachelor's, less than bachelor's), total enrollment, and status as either an institution of higher education or other postsecondary institution. Within each of the strata, institutions were sorted by region (Northeast, Southeast, Central, West), whether the institution had a relatively high minority enrollment, and whether the institution had research expenditures exceeding \$1 million. The sample of 1,665 institutions was allocated to the strata in proportion to the aggregate square root of full-time-equivalent enrollment. Institutions within a stratum were sampled with equal probabilities of selection. During panel recruitment, 50 institutions were found to be ineligible for PEQIS, primarily because they had closed or offered just correspondence courses. The final unweighted response rate at the end of PEQIS panel recruitment in spring 1992 was 98 percent (1,576 of the 1,615 eligible institutions). The weighted response rate for panel recruitment was 96 percent.

Each institution in the PEQIS panel was asked to identify a campus representative to serve as survey coordinator. The campus representative facilitates data collection by identifying the appropriate respondent for each survey and forwarding the questionnaire to that person.

Focus on the Largest Programs for Disadvantaged Students

As suggested in the background section, precollegiate programs are extremely diverse in their organizations, in the students that they reach, and in the services that they provide. In fact, while this study focuses on precollegiate programs designed to improve the access of disadvantaged students to college, there are a number of programs that are targeted towards precollegiate students for other reasons, such as to promote students' interest or skills in particular subject areas or to reach special groups of students (e.g., minorities, women, or low achievers) who are not necessarily disadvantaged. Results from a pretest of this questionnaire indicated that essentially every institution has at least one program for precollegiate students if a broader definition of precollegiate programs is used, and that many higher education institutions have multiple programs. Since programs with substantially different goals may be too different to provide useful comparisons, this study intentionally is limited only to precollegiate programs for the disadvantaged--a topic of particular interest to the U.S. Department of Education.

This study also focuses more specifically on only the largest precollegiate programs for the disadvantaged, defined as the largest precollegiate program at each institution based on funding. Thus, it is not able to provide the total number of extant precollegiate programs for the disadvantaged or the total number of precollegiate students involved in them, although the information presented in table 1 suggests that most of the precollegiate students and funding are probably included. The decision to focus on the largest precollegiate program was made because of a desire to limit the respondent burden of completing the questionnaires, and because the pretest showed that respondents often do not know the total number of programs at the institution. Precollegiate programs often are run in a highly decentralized manner, perhaps by a single department or even by an individual faculty member, without the involvement of the college's central administration. The pretest suggested that the largest program was generally sufficiently visible that it could be identified, but identifying all programs was a much more difficult task.

Because of the lack of a centralized information source about precollegiate programs, some institutions failed to properly identify their largest precollegiate programs. One indication of this failing is that after the data collection was completed, eight responding institutions were externally identified as having Upward Bound programs, although on the survey they reported having no precollegiate programs for the disadvantaged; it is probable that other non-Upward Bound precollegiate programs were also omitted.³² Since large programs tend to be more visible than small ones, the failure to report having a precollegiate program may be most likely when an institution has only small programs; thus, in those cases where the size of the program is related to other program characteristics, this report may understate the relative frequency of those characteristics that are typical of small programs. For similar reasons, some respondents with multiple precollegiate programs may have misidentified the largest program. Special attention was devoted to this issue during data collection, and numerous such errors were detected and resolved; for this reason the misidentification of the largest precollegiate programs should be a relatively infrequent error.

Another implication of the decentralized structure of precollegiate programs is that institutional respondents had little sense of how the largest program compared to the totality of all programs. While they were asked to describe (in percentages) how the largest program compared to all other precollegiate programs in size, they at best could compare the largest program only to others *that they were aware of*. To minimize this problem, this report focuses on percentages more than on actual numbers of programs, and it treats respondents' answers about the relative size of the largest precollegiate program as providing only very general information rather than precise numerical estimates.

Sample and Response Rates

The sample for this survey consisted of two-thirds of the 2-year and 4-year (including graduate-level) higher education institutions in the PEQIS panel, for a sample of 852 institutions. In early September 1994, questionnaires (see appendix B) were mailed to the PEQIS coordinators at the institutions. Coordinators were told that the survey was designed to be completed by the person at the institution most knowledgeable about the largest (in terms of funding) precollegiate program for disadvantaged students. Coordinators were also told that they might need to contact another office on campus to assist in identifying the largest program and responding to the first three questions.

³²Probably at least some of the eight respondents were aware that their institutions had Upward Bound programs, so the problem in identifying precollegiate programs is not just a lack of knowledge, but the manner in which people think of such programs.

Two institutions were found to be out of the scope of the survey because they were closed, leaving 850 eligible institutions. These 850 institutions represent the universe of approximately 3,470 2-year and 4-year (including graduate-level) higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. Telephone followup of nonrespondents was initiated in late September; data collection was completed in early December. For the eligible institutions that received surveys, an unweighted response rate of 96 percent (813 responding institutions divided by the 850 eligible institutions in the sample) was obtained. The weighted response rate for this survey was 97 percent. The unweighted overall response rate was 93 percent (97.6 percent panel recruitment participation rate multiplied by the 95.6 percent survey response rate). The weighted overall response rate was 93 percent (96.1 percent weighted panel recruitment participation rate multiplied by the 96.9 percent weighted survey response rate).

Weighted item nonresponse rates ranged from 0 percent to 2.8 percent; for most items, nonresponse rates were less than 1 percent. Because the item nonresponse rates were so low, imputation for item nonresponse was not implemented.

Sampling and Nonsampling Errors

The response data were weighted to produce national estimates (see table 19). The weights were designed to adjust for the variable probabilities of selection and differential nonresponse. The findings in this report are estimates based on the sample selected and, consequently, are subject to sampling variability.

Table 19.--Number and percent of institutions in the study, and the estimated number and percent in the Nation, by institutional characteristics: 1994

Institutional characteristic	Respondents		National estimate*	
	Number	Percent	Number	Percent
All institutions.....	813	100	3,470	100
Control				
Public.....	481	59	1,560	45
Private.....	332	41	1,910	55
Level				
2-year.....	300	37	1,330	38
4-year.....	513	63	2,140	62
Region				
Northeast.....	194	24	880	25
Southeast.....	197	24	830	24
Central.....	207	26	900	26
West.....	215	26	850	24
Size of institution				
Less than 3,000.....	358	44	2,340	67
3,000 to 9,999.....	225	28	760	22
10,000 or more.....	230	28	380	11

*Data presented in all tables are weighted to produce national estimates. The sample was selected with probabilities proportionate to the square root of full-time-equivalent enrollment. Institutions with larger full-time-equivalent enrollments have higher probabilities of inclusion and lower weights. The weighted numbers of institutions have been rounded to the nearest 10.

NOTE: Data are for higher education institutions in the 50 states, the District of Columbia, and Puerto Rico. Percents may not add to 100 and numbers may not add to totals because of rounding.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

The survey estimates are also subject to nonsampling errors that can arise because of nonobservation (nonresponse or noncoverage) errors, errors of reporting, and errors made in data collection. These errors can sometimes bias the data.

Nonsampling errors may include such problems as misrecording of responses; incorrect editing, coding, and data entry; differences related to the particular time the survey was conducted; or errors in data preparation. While general sampling theory can be used in part to determine how to estimate the sampling variability of a statistic, nonsampling errors are not easy to measure and, for measurement purposes, usually require that an experiment be conducted as part of the data collection procedures or that data external to the study be used.

To minimize the potential for nonsampling errors, the questionnaire was pretested with respondents at institutions like those that completed the survey. During the design of the survey and the survey pretest, an effort was made to check for consistency of interpretation of questions and to eliminate ambiguous items. The questionnaire and instructions were extensively reviewed by the National Center for Education Statistics and the Office of the Under Secretary, U.S. Department of Education. Manual and machine editing of the questionnaire responses were conducted to check the data for accuracy and consistency. Cases with missing or inconsistent items were recontacted by telephone. Data were keyed with 100 percent verification.

Variations

The standard error is a measure of the variability of estimates due to sampling. It indicates the variability of a sample estimate that would be obtained from all possible samples of a given design and size. Standard errors are used as a measure of the precision expected from a particular sample. If all possible samples were surveyed under similar conditions, intervals of 1.96 standard errors below to 1.96 standard errors above a particular statistic would include the true population parameter being estimated in about 95 percent of the samples. This is a 95 percent confidence interval. For example, the estimated percentage of institutions reporting that the institution had precollegiate programs for disadvantaged students is 32.4 percent, and the estimated standard error is 1.6 percent. The 95 percent confidence interval for the statistic extends from $[32.4 - (1.6 \text{ times } 1.96)]$ to $[32.4 + (1.6 \text{ times } 1.96)]$, or from 29.3 to 35.5 percent. Tables of standard errors for each table and figure in the report are provided in appendix A.³³

³³Standard errors for figures 1 and 5 are not provided in separate tables because the same statistics are also included in tables 2 and 13, respectively.

Estimates of standard errors were computed using a technique known as jackknife replication. As with any replication method, jackknife replication involves constructing a number of subsamples (replicates) from the full sample and computing the statistic of interest for each replicate. The mean square error of the replicate estimates around the full sample estimate provides an estimate of the variances of the statistics.³⁴ To construct the replications, 51 stratified subsamples of the full sample were created and then dropped one at a time to define 51 jackknife replicates.³⁵ A computer program (WESVAR), available at Westat, Inc., was used to calculate the estimates of standard errors. The software runs under IBM/OS and VAX/VMS systems.

The test statistics used in the analysis were calculated using the jackknife variances and thus appropriately reflected the complex nature of the sample design. In particular, an adjusted chi-square test using Satterthwaite's approximation to the design effect was used in the analysis of the two-way tables.³⁶ Finally, Bonferroni adjustments were made to control for multiple comparisons where appropriate. For example, for an "experiment-wise" comparison involving g pairwise comparisons, each difference was tested at the $0.05/g$ significance level to control for the fact that g differences were simultaneously tested.

Background Information

The survey was performed under contract with Westat, Inc., using the Postsecondary Education Quick Information System (PEQIS). This is the third PEQIS survey to be conducted. Westat's Project Director was Elizabeth Farris, and the Survey Managers were Laurie Lewis and Bradford Chaney. Bernie Greene was the NCES Project Officer. The data were requested by David Goodwin, Planning and Evaluation Service, Office of the Under Secretary, U.S. Department of Education.

This report was reviewed by the following individuals:

Outside NCES

- Elizabeth Eisner, Planning and Evaluation Service, Office of the Undersecretary, U.S. Department of Education

³⁴K. Wolter. *Introduction to Variance Estimation*, Springer-Verlag, 1985.

³⁵Ibid, 183.

³⁶For example, see D. Rao and A. Scott. "On Chi-square Tests for Multi-way Contingency Tables with Cell Proportions Estimated from Survey Data," *Annals of Statistics* 12 (1984): 46-60.

- Julia Tower, Educational Services, National Council of Educational Opportunity Associations

Inside NCES

- Roslyn Korb, Postsecondary Education Statistics Division
- Michael Cohen, Statistical Standards and Services Group
- Marilyn McMillen, Survey and Cooperative Systems Group
- Thomas Smith, Data Development and Longitudinal Studies Group
- Shi-Chang Wu, Education Assessment Group

For more information about the Postsecondary Education Quick Information System or the Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, contact Bernie Greene, Education Surveys Division, National Center for Education Statistics, Office of Educational Research and Improvement, 555 New Jersey Avenue, NW, Washington, DC 20208-5651, telephone (202) 219-1366.

Appendix A

Tables of Standard Errors

Table 1a.--Standard errors of the percent of institutions that had precollegiate programs for disadvantaged students, and standard errors of the percent of institutions with precollegiate programs where the largest program is Upward Bound, by institutional characteristics: 1994

Institutional characteristic	Have precollegiate programs for disadvantaged students	Largest precollegiate program is Upward Bound*
All institutions.....	1.6	2.0
Control		
Public.....	2.4	2.5
Private.....	1.9	3.8
Level		
2-year.....	2.9	3.3
4-year.....	1.6	2.6
Region		
Northeast.....	3.1	3.7
Southeast.....	3.5	5.6
Central.....	2.7	5.7
West.....	2.4	4.7
Size of institution		
Less than 3,000.....	2.0	3.1
3,000 to 9,999.....	2.7	3.7
10,000 or more.....	2.0	2.0

*Percents in this column are based on those institutions that have precollegiate programs for disadvantaged students.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 2a.--Standard errors of the percent of precollegiate students and of total funding that was located within the largest precollegiate program at each institution, by institutional characteristics: 1994

Institutional characteristic	Percent of precollegiate students served by largest programs			Percent of precollegiate program funding within the largest programs		
	Less than 50	50 to 99	100	Less than 50	50 to 99	100
	(percent of programs)					
All institutions	1.7	2.7	3.2	1.7	3.5	3.5
Control						
Public.....	1.7	3.6	3.7	1.6	4.0	3.7
Private.....	4.1	3.8	4.7	4.2	5.8	5.8
Level						
2-year.....	3.4	5.1	5.0	2.5	5.3	5.0
4-year.....	2.6	2.4	3.5	2.5	3.4	3.8
Region						
Northeast	3.6	4.6	5.2	2.8	6.0	6.3
Southeast	5.4	4.9	4.7	5.9	5.4	4.8
Central.....	3.9	5.9	6.6	2.4	6.8	6.7
West.....	2.9	5.0	5.1	1.9	4.9	5.1
Size of institution						
Less than 3,000	3.6	4.4	6.1	3.6	6.1	6.8
3,000 to 9,999.....	2.5	4.8	4.7	2.0	5.3	4.6
10,000 or more.....	1.9	2.1	2.1	2.0	2.3	2.0
Upward Bound is largest program						
Yes.....	4.2	4.6	4.8	2.7	5.4	4.8
No.....	2.3	3.1	3.2	2.3	3.8	3.4

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 3a.--Standard errors of the median and total number of precollegiate students, the institution's faculty and staff, and students who worked with the precollegiate program in 1993-94, and the standard errors of the mean student/faculty-staff ratio, by institutional characteristics: 1994

Institutional characteristic	Students served by program		Faculty and staff who worked with the program		Students who worked with the program*		Mean precollegiate student/faculty-staff ratio
	Median	Total	Median	Total	Median	Total	
All institutions.....	1.8	32,403.8	0.0	540.9	0.3	1,038.7	4.0
Control							
Public.....	3.6	32,685.4	0.0	410.1	0.3	825.1	5.7
Private.....	5.1	10,491.7	0.3	397.5	0.5	848.9	4.2
Level							
2-year.....	4.1	27,327.0	0.3	276.4	0.3	328.6	8.6
4-year.....	1.5	19,196.7	0.3	455.1	0.3	1,019.9	4.1
Region							
Northeast.....	3.8	9,116.2	0.2	252.8	0.5	673.9	5.4
Southeast.....	1.7	10,218.3	0.2	328.3	0.3	586.9	7.3
Central.....	2.3	7,040.5	0.2	223.3	0.5	352.8	3.9
West.....	3.7	31,855.1	0.3	259.4	0.2	456.2	14.1
Size of institution							
Less than 3,000.....	0.6	25,659.9	0.2	408.3	0.2	383.5	6.3
3,000 to 9,999.....	2.9	15,214.5	0.0	266.5	0.2	895.6	5.5
10,000 or more.....	2.9	12,809.2	0.2	176.8	0.0	336.1	8.2
Upward Bound is largest program							
Yes.....	1.3	2,359.5	0.3	264.7	0.3	418.5	1.2
No.....	4.1	32,843.6	0.0	526.1	0.3	889.4	5.7

*Includes institutions where none of the institution's students worked with the program in 1993-94.

NOTE: Standard errors are computed on unrounded numbers. Standard errors of medians are estimates using the Woodruff method.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 4a.--Standard errors of the primary source of funding for institutions' largest precollegiate program, by institutional characteristics: 1994

Institutional characteristic	Tuition	Institutional funding	Federal government	State/local government	Private/individuals	Other sources
All institutions	0.6	2.1	2.5	2.6	2.2	0.3
Control						
Public.....	0.6	1.8	2.4	2.0	1.0	0.4
Private.....	1.2	4.2	5.2	7.0	5.3	0.0
Level						
2-year.....	0.4	3.4	4.0	3.2	2.1	0.0
4-year.....	0.9	2.2	3.0	2.8	3.0	0.4
Region						
Northeast	1.7	3.6	6.1	5.0	3.8	0.3
Southeast	0.0	1.5	6.1	5.4	3.0	0.3
Central	1.5	4.1	6.4	3.0	6.1	0.0
West.....	0.4	5.1	4.9	2.9	2.2	1.1
Size of institution						
Less than 3,000	1.3	4.7	5.0	5.8	4.5	0.0
3,000 to 9,999.....	0.0	2.0	3.1	3.0	3.3	0.7
10,000 or more.....	0.5	1.5	2.5	1.9	1.3	0.4
Upward Bound is largest program						
Yes.....	0.0	1.4	1.6	0.0	0.3	0.6
No.....	0.8	2.6	3.1	3.7	3.1	0.3

NOTE: A standard error of 0.0 appears if no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 5a.--Standard errors of the percent of institutions ranking selected potential goals of the precollegiate program as the most important goal, by institutional characteristics: 1994

Institutional characteristic	Increase retention in or completion of high school	Increase the likelihood of attending college	Increase the likelihood of completing college	Enhance college recruitment for this institution	Increase general academic skills development	Promote interest/strength in particular subject area
All institutions.....	2.5	2.3	1.8	0.4	2.2	1.9
Control						
Public.....	3.2	2.6	2.1	0.0	1.6	1.4
Private.....	3.0	4.0	3.4	1.2	5.6	4.5
Level						
2-year.....	5.1	4.8	2.3	0.0	3.0	3.9
4-year.....	2.3	2.3	2.0	0.7	3.0	1.8
Region						
Northeast.....	3.4	4.0	4.3	1.7	3.1	6.2
Southeast.....	5.9	5.0	1.5	0.0	5.7	1.9
Central.....	5.4	5.9	1.9	0.0	6.2	2.3
West.....	4.6	3.8	4.6	0.0	3.9	2.4
Size						
Less than 3,000.....	4.6	4.3	2.6	1.0	4.4	3.8
3,000 to 9,999.....	4.3	3.4	3.2	0.0	2.5	2.8
10,000 or more.....	2.2	2.5	1.9	0.0	2.0	0.7
Upward Bound is largest program						
Yes.....	4.2	4.1	3.6	0.0	3.0	0.0
No.....	3.0	2.5	2.1	0.6	2.6	2.7

NOTE: A standard error of 0.0 appears if no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 6a.--Standard errors of the percent of institutions using various locations as the primary location in which the largest precollegiate program is held, by institutional characteristics: 1994

Institutional characteristic	College campus	Elementary or secondary schools	Other locations
All institutions	1.6	1.5	0.3
Control			
Public.....	2.4	2.4	0.5
Private.....	2.1	2.1	0.0
Level			
2-year.....	3.6	3.6	0.0
4-year.....	1.6	1.5	0.4
Region			
Northeast	3.0	3.0	0.3
Southeast	3.7	3.6	0.8
Central.....	5.0	5.0	0.0
West.....	4.1	4.0	0.4
Size of institution			
Less than 3,000	2.5	2.5	0.0
3,000 to 9,999.....	3.7	3.5	0.7
10,000 or more.....	1.7	1.6	0.7
Upward Bound is largest program			
Yes.....	3.4	3.4	0.3
No.....	2.0	2.0	0.4

NOTE: A standard error of 0.0 appears if no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 7a.--Standard errors of the top goal and the primary location of the largest precollegiate programs: 1994

Institutional top goal	Primary location		
	College campus	Elementary or secondary schools	Other locations
Increase completion of high school	3.7	3.6	0.7
Increase probability of attending college	3.9	3.9	0.0
Increase probability of completing college	2.8	2.8	0.0
Enhance college recruitment	0.0	0.0	0.0
Increase general academic skills	2.6	2.5	1.2
Promote particular subject.....	3.1	3.1	0.0

NOTE: A standard error of 0.0 appears if no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 8a.--Standard errors of the percent of the largest precollegiate programs in 1993-94 with program activities in the academic year only, in the summer only, or in both time periods, and standard errors of the percent of students in each type of program, by institutional characteristics: 1994

Institutional characteristic	Percent of programs during			Percent of precollegiate students in programs operating during		
	Academic year only	Summer only	Both	Academic year only	Summer only	Both
All institutions	1.6	2.7	2.5	7.5	1.2	6.9
Control						
Public.....	2.0	2.5	2.3	8.8	1.1	8.2
Private.....	2.5	6.3	6.0	12.7	5.2	11.7
Level						
2-year.....	3.7	4.5	3.7	17.5	2.1	15.8
4-year.....	1.7	3.4	3.5	5.4	1.4	5.5
Region						
Northeast	3.5	4.9	4.8	12.3	3.8	10.7
Southeast	2.1	5.1	5.1	8.7	1.9	8.3
Central.....	2.7	6.2	6.3	10.0	3.2	9.6
West.....	3.2	5.5	5.7	16.3	1.5	15.4
Size of institution						
Less than 3,000	3.2	4.8	4.4	26.1	4.2	22.5
3,000 to 9,999	3.2	4.2	4.3	10.5	2.0	10.8
10,000 or more.....	1.2	1.6	1.8	4.9	1.3	4.9
Upward Bound is largest program						
Yes.....	0.0	0.0	0.0	0.0	0.0	0.0
No.....	2.2	3.7	3.2	8.0	1.4	7.4

NOTE: A standard error of 0.0 appears if no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 9a.--Standard errors of the mean number of total hours spent in program activities during the academic year, during the summer, and during both time periods, and standard errors of the mean number of years a typical precollegiate student continues to participate in the largest precollegiate program, by institutional characteristics: 1994

Institutional characteristic	Total hours during the academic year ¹	Total hours during the summer ²	Total hours combined ³	Number of years a typical student participates
All institutions.....	5.4	5.9	7.3	0.1
Control				
Public.....	6.6	7.7	9.5	0.1
Private.....	10.3	10.0	14.3	0.2
Level				
2-year.....	13.5	10.1	14.4	0.1
4-year.....	5.7	7.7	9.3	0.1
Region				
Northeast.....	9.4	11.5	12.6	0.2
Southeast.....	9.0	9.9	16.0	0.2
Central.....	9.6	19.0	22.1	0.1
West.....	15.4	17.6	19.9	0.2
Size of institution				
Less than 3,000.....	11.1	8.3	11.1	0.1
3,000 to 9,999.....	9.8	14.4	15.9	0.2
10,000 or more.....	5.4	7.7	6.2	0.1
Upward Bound is largest program				
Yes.....	7.5	7.9	9.8	0.0
No.....	7.3	6.3	6.7	0.1

¹Includes only those institutions with programs held during the academic year.

²Includes only those institutions with programs held during the summer.

³Based on the sum of the total hours during the academic year and the total hours during the summer. If institutions only offered program activities during one part of the year, then that amount is treated as the total for the full year.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 10a.--Standard errors of the percent of precollegiate programs ranking specified qualities among the top three student characteristics for targeting by their precollegiate program, by institutional characteristics: 1994

Institutional characteristic	Low income	First generation	Racial/ethnic minorities	Middle achievers	Low achievers	Specific subject area interest/strength	Urban	High achievers or gifted/talented	All students at specific schools	Rural
		to attend college								
All institutions	2.2	2.5	2.4	2.6	2.0	19	2.0	1.7	1.5	1.5
Control										
Public	2.7	2.5	3.2	3.6	2.4	1.8	1.2	1.6	1.5	1.7
Private	4.4	4.7	3.4	4.2	3.8	4.4	4.7	4.0	2.4	2.6
Level										
2-year	5.4	3.6	5.5	4.6	4.2	3.6	2.1	1.9	2.9	2.5
4-year	2.9	3.3	2.6	2.9	1.8	2.7	2.6	2.5	1.5	1.8
Region										
Northeast	4.8	4.9	4.9	5.0	2.8	4.9	3.2	3.2	1.6	3.3
Southeast	5.5	5.8	3.7	5.1	5.0	5.4	2.5	5.6	2.7	3.4
Central	6.0	5.7	6.7	5.4	3.3	6.2	6.0	1.9	2.1	2.5
West	5.0	5.6	5.6	4.5	4.4	2.7	1.8	0.7	4.6	2.0
Size of institution										
Less than 3,000	4.3	4.7	4.7	4.1	4.0	3.9	4.1	3.6	2.6	2.6
3,000 to 9,999	2.9	3.9	3.5	4.4	3.0	1.6	2.2	2.2	2.8	2.4
10,000 or more	2.2	2.6	1.8	1.7	1.4	1.1	1.9	0.8	1.2	0.5
Upward Bound is largest program										
Yes	1.6	2.5	3.7	3.5	2.9	1.7	1.9	0.4	2.4	3.4
No	2.9	2.5	2.8	3.3	2.4	2.6	2.7	2.5	1.8	1.2

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 11a.--Standard errors of the percent of precollegiate students who are low income and who are female, by institutional characteristics: 1994

Institutional characteristic	Low income	Female
All institutions	3.1	0.7
Control		
Public	3.6	0.8
Private	4.7	1.8
Level		
2-year	8.8	1.3
4-year	2.7	0.8
Region		
Northeast.....	3.5	1.9
Southeast.....	2.4	1.2
Central.....	2.3	1.0
West	5.1	1.1
Size of institution		
Less than 3,000.....	10.9	2.1
3,000 to 9,999	4.5	1.3
10,000 or more	2.7	0.9
Upward Bound is largest program		
Yes	1.3	0.8
No.....	3.3	0.8

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 12a.--Standard errors of the percent of precollegiate students in each racial/ethnic category, by institutional characteristics: 1994

Institutional characteristic	Hispanic	Black, non-Hispanic	White, non-Hispanic	Asian or Pacific Islander	American Indian or Alaskan Native	Race/ ethnicity unknown
All institutions	3.3	3.8	2.1	0.5	0.3	0.3
Control						
Public.....	3.7	4.0	2.5	0.6	0.4	0.4
Private.....	5.5	9.3	5.8	0.9	0.2	0.1
Level						
2-year.....	9.6	8.9	3.0	0.9	0.6	0.3
4-year.....	3.1	3.4	2.4	0.5	0.4	0.5
Region						
Northeast	4.8	9.8	6.2	1.0	0.1	0.3
Southeast	1.4	4.6	4.5	0.3	0.1	0.1
Central.....	1.2	4.2	3.9	1.3	1.7	0.3
West.....	2.0	3.1	5.0	1.2	0.5	0.8
Size of institution						
Less than 3,000	13.4	11.3	3.8	0.8	0.7	(+)
3,000 to 9,999	5.5	6.1	4.0	0.8	0.6	0.2
10,000 or more.....	3.2	2.9	2.5	0.6	0.6	0.8
Upward Bound is largest program						
Yes.....	1.8	3.9	4.1	1.0	0.4	(+)
No.....	3.6	4.1	2.4	0.5	0.4	0.4

(+) Less than 0.05.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 13a.--Standard errors of the percent of institutions indicating each grade level as the one grade level at which precollegiate students usually enter the program, by institutional characteristics: 1994

Institutional characteristic	Elementary school	Middle/junior high school	Freshman or sophomore year in senior high school	Junior or senior year in senior high school	High school graduate
All institutions.....	1.9	1.9	1.8	2.8	1.9
Control					
Public.....	1.3	2.2	1.9	1.9	2.2
Private.....	4.4	3.0	5.0	7.1	3.6
Level					
2-year.....	2.0	4.2	3.0	4.4	3.3
4-year.....	2.5	2.0	2.8	2.6	2.0
Region					
Northeast.....	1.3	3.2	4.3	5.4	4.1
Southeast.....	1.8	4.1	5.1	5.4	2.0
Central.....	6.0	4.3	6.2	3.3	0.5
West.....	4.1	4.2	4.8	3.2	4.0
Size					
Less than 3,000.....	4.0	3.4	3.5	6.0	3.5
3,000 to 9,999.....	2.2	3.0	2.7	2.5	3.0
10,000 or more.....	0.9	1.5	1.8	1.3	1.1
Upward Bound is largest program					
Yes.....	0.0	1.4	1.5	0.5	0.0
No.....	2.7	2.6	2.5	4.0	2.7

NOTE: A standard error of 0.0 appears if no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 14a.--Standard errors of the percent of precollegiate students at each grade level, by institutional characteristics: 1994

Institutional characteristic	Elementary school students	Middle/junior high school students	Freshman or sophomore students in senior high school	Junior or senior students in senior high school	High school graduates
All institutions	1.7	1.7	1.2	1.8	0.7
Control					
Public.....	1.8	1.9	1.2	1.8	0.8
Private.....	4.3	4.4	3.7	5.5	1.6
Level					
2-year.....	3.3	1.9	2.3	3.4	1.2
4-year.....	1.9	2.5	1.3	2.0	0.8
Region					
Northeast	4.2	4.3	1.9	6.8	3.2
Southeast	1.2	3.0	2.1	2.7	0.9
Central.....	1.1	4.5	2.5	3.5	0.8
West.....	3.6	3.0	2.5	3.3	0.7
Size					
Less than 3,000	5.2	2.1	4.0	2.8	1.5
3,000 to 9,999	3.9	2.9	2.3	3.9	1.5
10,000 or more.....	0.2	3.2	1.4	2.7	0.9
Upward Bound is largest program					
Yes.....	0.0	0.5	1.2	1.3	0.3
No.....	1.9	1.9	1.3	2.0	0.9

NOTE: A standard error of 0.0 means that every program in the sample reported that 0 percent of its precollegiate students were in the indicated category.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 15a.--Standard errors of the percent of institutions indicating an approach to providing services was the single most frequently used approach, by type of approach and institutional characteristics: 1994

Institutional characteristic	Tutoring	Mentoring	Classroom sessions	Testing/assessment	Workshops and small group meetings	Field trips
All institutions.....	2.5	1.3	3.0	0.6	1.9	0.5
Control						
Public.....	2.1	1.1	2.5	0.9	2.0	0.7
Private.....	5.1	2.7	6.2	0.6	3.9	0.0
Level						
2-year.....	2.4	1.4	5.6	1.2	3.7	1.3
4-year.....	3.0	1.8	3.0	0.6	2.5	0.2
Region						
Northeast.....	3.8	3.2	5.1	0.3	3.6	0.3
Southeast.....	3.6	0.9	4.7	1.2	4.4	0.0
Central.....	6.0	2.0	6.4	1.6	4.4	0.4
West.....	2.7	3.2	4.1	1.1	3.1	2.1
Size						
Less than 3,000.....	5.1	2.3	6.4	0.0	4.0	1.0
3,000 to 9,999.....	3.1	2.4	3.5	1.5	2.7	0.0
10,000 or more.....	1.7	0.8	2.0	1.4	1.7	0.5
Upward Bound is largest program						
Yes.....	4.3	0.0	5.4	1.1	3.5	0.0
No.....	2.8	1.8	3.7	0.6	2.3	0.7

NOTE: A standard error of 0.0 appears if no institution in the sample gave the indicated response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 16a.--Standard errors of the percent of institutions ranking selected services among the three most important in their precollegiate program, by institutional characteristics: 1994

Institutional characteristic	Social	Remedia- tion	Accelerated	College-	Special	Other	Information			Cultural		
	skills development		courses, below college level	level courses	prepar- atory courses	supple- mental courses	ACT/ SAT training	about admissions/ financial aid	Career counseling	Personal counseling	activities and field trips	Information for parents
All institutions.....	2.5	2.3	2.1	2.0	3.5	2.2	1.4	2.2	2.3	2.1	2.2	1.7
Control												
Public.....	2.9	3.0	2.5	1.8	2.3	2.3	2.0	2.5	2.8	1.8	2.1	2.1
Private.....	4.4	5.6	3.5	4.6	7.4	6.0	2.1	3.8	3.7	4.8	4.6	2.7
Level												
2-year.....	4.4	4.0	3.7	3.3	5.7	3.3	2.4	4.9	3.7	3.1	3.1	3.1
4-year.....	3.5	3.3	2.4	2.9	3.7	3.4	1.7	2.4	2.5	2.4	3.0	1.7
Region												
Northeast.....	5.4	4.7	3.0	3.8	4.8	4.6	2.0	2.8	4.8	7.1	2.9	2.7
Southeast.....	5.1	3.9	5.3	5.4	5.5	4.8	3.1	5.1	5.3	3.8	5.6	2.4
Central.....	6.2	5.9	3.4	2.1	5.9	6.1	2.3	5.5	5.3	3.4	6.1	3.3
West.....	5.4	3.7	2.8	4.7	4.3	4.7	3.8	4.3	4.4	3.8	3.8	2.9
Size of institution												
Less than 3,000.....	4.3	4.6	3.8	4.1	7.7	4.4	1.8	3.8	3.5	4.4	4.3	2.3
3,000 to 9,999.....	4.8	3.3	3.6	2.5	3.1	3.1	3.8	3.1	4.9	2.3	3.4	3.6
10,000 or more.....	2.2	2.2	1.6	1.3	2.1	1.9	2.0	3.1	2.7	1.4	1.7	1.7
Upward Bound is largest program												
Yes.....	4.0	4.3	4.5	2.2	4.3	4.4	4.1	5.5	3.7	3.7	3.2	1.5
No.....	2.9	3.3	1.8	2.8	3.9	2.7	1.3	2.4	3.3	2.9	2.9	2.0

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 17a.--Standard errors of the percent of institutions at which the largest precollegiate program provides one or more financial benefits, by institutional characteristics: 1994

Institutional characteristic	Any financial benefits*	Stipends paid for participation	Financial benefits offered for successful performance
All institutions.....	2.5	3.0	2.4
Control			
Public.....	3.0	3.3	2.9
Private.....	3.8	5.4	5.1
Level			
2-year.....	6.1	6.6	4.4
4-year.....	3.0	3.3	3.3
Region			
Northeast.....	4.8	6.2	6.1
Southeast.....	6.2	5.9	4.8
Central.....	6.0	6.0	4.8
West.....	4.7	4.9	4.3
Size of institution			
Less than 3,000.....	5.2	5.5	4.7
3,000 to 9,999.....	4.3	5.5	3.2
10,000 or more.....	1.3	1.9	2.4
Upward Bound is largest program			
Yes.....	0.6	0.7	4.4
No.....	3.3	3.4	3.0

*Includes institutions that pay stipends for participation in the program, offer financial benefits for successful performance, or both.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 18a.--Standard errors of the percent of institutions providing specific financial benefits among those that offer benefits for successful performance, by institutional characteristics: 1994

Institutional characteristic	Financial benefits offered*					
	Full tuition guarantee at any college	Full tuition guarantee at your institution	Last dollars needed for tuition after receipt of other financial aid	College courses for credit free or at reduced prices	Pay for grades received at the precollegiate level	Other financial benefit
All institutions	2.0	3.2	2.9	5.2	2.5	4.9
Control						
Public.....	1.2	3.5	2.9	6.4	3.6	5.0
Private.....	5.2	8.3	6.6	7.7	2.5	10.7
Level						
2-year.....	2.8	6.0	4.5	8.3	5.0	8.0
4-year.....	2.5	4.2	4.1	5.0	2.9	5.9
Region						
Northeast	0.0	5.5	9.1	8.8	1.0	14.1
Southeast	5.6	7.3	7.0	9.0	7.0	10.0
Central	5.5	6.5	1.1	7.4	5.0	6.9
West.....	3.1	4.1	4.4	8.2	3.7	7.7
Size of institution						
Less than 3,000	4.7	6.9	6.3	10.4	4.6	11.2
3,000 to 9,999.....	2.2	4.6	4.6	8.1	4.9	6.9
10,000 or more.....	1.0	2.5	2.4	3.5	2.6	2.2
Upward Bound is largest program						
Yes.....	3.3	3.3	3.3	6.6	5.2	6.7
No.....	2.5	5.7	5.4	4.8	1.9	5.8

*Percentages are based on the 33 percent of precollegiate programs that offered financial benefits for successful performance.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 20.--Estimates and standard errors for figure 2, primary goals of precollegiate programs: 1994

Goal of precollegiate program	Ranked first		Ranked second		Ranked third	
	Estimate	Standard error	Estimate	Standard error	Estimate	Standard error
College attendance.....	28.3	2.3	28.0	2.0	21.6	2.1
General academic skill	19.9	2.2	25.5	2.1	21.9	2.5
High school completion.....	26.4	2.5	20.1	2.3	17.7	2.1
College completion.....	12.5	1.8	14.3	2.0	18.7	2.2
Subject area strength	9.7	1.9	6.3	1.8	7.5	1.3
College recruitment.....	0.5	0.4	1.9	0.7	6.5	1.2

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 21.--Estimates and standard errors for figure 3, mean number of hours spent in program activities by precollegiate students: 1994

Largest program operates during	Mean number of hours	
	Estimate	Standard error
Part-year programs		
Academic year only	85.5	19.6
Summer only	166.5	11.4
Full-year programs		
Academic year portion.....	117.1	5.2
Summer portion	205.9	7.5
Total.....	323.0	9.2

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 22.--Estimates and standard errors for figure 4, most important student characteristics for targeting: 1994

Student characteristic	Ranked first		Ranked second		Ranked third	
	Estimate	Standard error	Estimate	Standard error	Estimate	Standard error
Low income	41.0	2.4	18.8	2.1	10.2	1.9
First generation	10.5	1.7	31.2	2.4	7.6	1.1
Racial/ethnic minorities.....	13.5	1.8	10.9	1.5	15.7	1.7
Middle achievers.....	4.3	0.9	8.9	1.6	14.9	2.1
Low achievers.....	7.5	1.3	7.9	1.2	6.4	1.1
Subject area strength	6.5	1.8	3.5	0.9	5.8	1.9
Urban	3.5	1.6	5.0	1.1	2.7	0.7
High achiever/gifted	1.6	0.8	3.6	1.5	3.0	1.1
Specific schools	1.7	0.7	1.7	0.6	3.4	0.9
Rural	0.7	0.5	1.4	0.6	3.6	1.2
Female students	2.8	1.0	0.9	0.5	1.5	0.6
Dropouts	--	--	1.7	0.6	1.5	0.7
Non-English speaking	1.1	0.3	0.7	0.3	2.1	0.5
Disabilities	0.9	0.6	0.1	0.1	3.0	1.4
Male students.....	--	--	0.1	0.1	0.8	0.3

-- No programs gave this response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 23.--Estimates and standard errors for figure 6, precollegiate program goals and the year in which students usually start: 1994

Top goal	Year students usually enter program			
	Before high school		Freshman/sophomore	
	Estimate	Standard error	Estimate	Standard error
High school completion	52.2	4.3	34.2	4.5
College attendance	21.8	3.4	62.6	4.0
General academic skills	25.4	7.7	36.3	5.3
College completion	3.4	1.1	50.2	7.5

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 24.--Estimates and standard errors for figure 7, grade ranges served by precollegiate programs: 1994

Earliest grade level served	Largest grade level served				
	Elementary school	Middle/junior high school	Freshmen or sophomore year in senior high school	Junior or senior year in senior high school	High school graduates
	Estimate				
Elementary.....	0.4	2.5	1.2	4.8	0.9
Middle/junior high.....	--	3.8	3.2	14.3	3.9
Freshman/sophomore.....	--	--	1.8	36.2	5.0
Junior/senior	--	--	--	7.8	2.5
High school graduate.....	--	--	--	--	11.7
	Standard error				
Elementary.....	0.2	1.6	0.5	1.2	0.3
Middle/junior high.....	--	1.0	0.9	1.6	0.8
Freshman/sophomore.....	--	--	0.6	2.2	1.1
Junior/senior	--	--	--	2.6	0.8
High school graduate.....	--	--	--	--	1.8

--No programs gave this response.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 25.--Estimates and standard errors for figure 8, most frequently used approaches for providing services in largest precollegiate programs: 1994

Approach	Ranked first		Ranked second		Ranked third	
	Estimate	Standard error	Estimate	Standard error	Estimate	Standard error
Classroom sessions.....	46.8	3.0	21.7	2.3	9.6	1.5
Tutoring	19.6	2.5	22.4	1.7	18.1	1.9
Workshops/small groups.....	20.2	1.9	21.8	1.5	17.6	2.9
Mentoring.....	5.9	1.3	11.4	2.2	16.2	1.9
Testing/assessment.....	2.4	0.6	11.4	1.8	16.0	2.1
Field trips	0.8	0.5	5.8	1.6	17.8	2.4

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 26.--Estimates and standard errors for figure 9, percent of largest precollegiate programs rating selected services as very important: 1994

Service	Largest precollegiate programs selected	
	Estimate	Standard error
Social skills development	77.4	1.8
Career counseling	68.7	2.8
Supplemental courses	65.6	2.4
Information about college	63.9	2.6
Personal counseling	57.3	2.7
Cultural activities	55.1	2.5
Information for parents	55.3	2.3
Preparatory courses	54.2	2.5
Remediation	42.6	2.5
ACT/SAT training	40.0	1.7
Accelerated courses	28.4	2.3
College level courses	22.6	2.0

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Table 27.--Estimates and standard errors for figure 10, percent of largest precollegiate programs ranking selected services as among the three most important: 1994

Service	Ranked first		Ranked second		Ranked third	
	Estimate	Standard error	Estimate	Standard error	Estimate	Standard error
Social skills development.....	12.2	1.6	14.0	2.6	17.0	1.8
Information about college.....	8.2	1.2	15.0	1.5	12.3	1.3
Supplemental courses.....	18.0	1.6	10.4	1.7	4.4	1.1
Career counseling.....	4.1	1.1	16.0	2.2	12.4	1.6
Preparatory courses.....	10.2	1.4	10.9	1.9	7.8	2.3
Remediation.....	19.4	2.5	6.3	1.4	3.2	0.9
Accelerated courses.....	11.1	1.6	3.5	1.3	2.7	0.8
Cultural activities.....	0.3	0.1	4.3	1.1	13.2	2.3
Personal counseling.....	2.1	0.6	4.8	1.2	8.0	1.5
College-level courses.....	6.4	1.7	4.9	1.2	1.0	0.3
Information for parents.....	0.6	0.5	1.5	0.5	9.0	1.5
ACT/SAT training.....	1.0	0.3	4.5	0.8	5.9	1.2

SOURCE: U.S. Department of Education, National Center for Education Statistics, Postsecondary Education Quick Information System, Survey on Precollegiate Programs for Disadvantaged Students at Higher Education Institutions, 1994.

Appendix B

Survey Questionnaire

U.S. DEPARTMENT OF EDUCATION
NATIONAL CENTER FOR EDUCATION STATISTICS
WASHINGTON, D.C. 20208-5651

PRECOLLEGIATE PROGRAMS FOR DISADVANTAGED STUDENTS
AT HIGHER EDUCATION INSTITUTIONS
POSTSECONDARY EDUCATION QUICK INFORMATION SYSTEM

FORM APPROVED
O.M.B. No.: 1850-0701
EXPIRATION DATE: 06/95

This survey is authorized by law (20 U.S.C.1221e-1). While participation in this survey is **voluntary**, your cooperation is critical to make the results of this survey **comprehensive, accurate, and timely**.

DEFINITIONS FOR THIS SURVEY:

Precollegiate programs are defined as **programs** at higher education institutions that are designed to increase the access of educationally or economically disadvantaged elementary and secondary students to higher **education**. These programs may or may not include college-level **instruction**, but they are intended to prepare and motivate students for **college**.

Examples of precollegiate programs **are:**

- Summer programs that help disadvantaged students with the transition to **college**;
- Programs that bring disadvantaged students to campus to learn the **academic, social**, and study skills **necessary** for **college**;
- Programs to enhance the self esteem and motivation of disadvantaged **students**; and
- Programs with **local** schools to provide tutoring for disadvantaged **students**, or enrichment courses to increase their skills in special areas such as mathematics and **science**.

Do not include

- Sports **camp**s, unless they are designed to increase the access of disadvantaged students to higher **education**;
- Articulated **high school programs, such as tech-prep or 2+2 programs with high schools**;
- Programs allowing high **school** students to enroll in college **courses, unless** the programs are designed to increase **college-going** rates among disadvantaged **students**; or
- Short one-time events such as sending institutional representatives to a high school's "**college day**" or bringing students to campus for "**college weekends**."

Note: All information from this survey will be kept strictly confidential, and will be published in aggregated form only. Unless specified otherwise, questions refer to the 1993-94 academic year (including summer 1994).

AFFIX LABEL HERE

IF ABOVE INSTITUTION INFORMATION IS **INCORRECT**, PLEASE UPDATE DIRECTLY ON **LABEL**.

Name of Person Completing This **Form**: _____ Telephone **Number**: _____

Title/position: _____

PLEASE KEEP A COPY OF THIS SURVEY FOR YOUR RECORDS

RETURN COMPLETED FORM TO:

WESTAT, INC.
1650 Research Boulevard
Rockville, Maryland 20850
ATTN: Lewis, 923772

IF YOU HAVE ANY **QUESTIONS**, CALL

Laurie Lewis at Westat
800-937-8281, Ext. 8284 or 301-251-8284
9:00 a.m. - 5:00 p.m., Eastern time zone

Public reporting burden for this collection of information is estimated to average **30** minutes per **response**, including the time for reviewing **instructions**, searching **existing data sources**, gathering and maintaining the data **needed**, and completing and reviewing the collection of **information**. Send comments regarding **this** burden estimate or any other aspect of this collection of **information**, including suggestions for reducing this **burden**, to the **U.S.** Department of **Education**, Information Management and Compliance **Division, Washington, D.C. 20202-4651**; and to the Office of Management and **Budget**, Paperwork Reduction Project 1850-0701, Washington, D.C. 20503.

1. Does your institution currently **run**, either alone or in conjunction with other **institutions**, any **precollegiate programs for disadvantaged students (as defined on the front of this questionnaire)?**

Yes.....1 No..... 2 (Stop. Complete respondent section on front cover and return questionnaire.)

We are interested in information about the largest precollegiate program for disadvantaged students at your **institution**. For purposes of this **questionnaire**, the largest program is defined as the program that receives the largest percentage of the total funding for precollegiate programs for disadvantaged students.

3. What is the name of your largest precollegiate **program**? _____

3. Please give your best estimate about how your institution's **largest (in terms of funding) precollegiate program** for disadvantaged students compared with all of your precollegiate programs for disadvantaged students in 1993-94.

a. Percentage of **all precollegiate students served**: _____ %

b. Percentage of total funding for precollegiate **programs**: _____ %

Please have the remainder of this questionnaire completed by the person who is most knowledgeable about your institution's largest precollegiate program (i.e., the program indicated in question 2).

4. **How many precollegiate students were served by your institution through this program during the period of September 1993 through August 1994? Count each student only once, even if that student was enrolled in more than one term.**

Number of precollegiate students (**unduplicated**)..... _____

5. What is the distribution by grade level of the precollegiate students served by your institution through this **program**? *The total must sum to 100 percent. If students participate ONLY in the summer, use the grade level completed just before participating in the summer program, except high school graduates should be reported separately. If the program accepts students who dropped out of school, base your answer on the grade level (or competency) that they must have achieved to be admitted into the program.*

- a. Elementary school students..... _____ %
- b. **Middle/junior** high school students _____ %
- c. Freshman and sophomore students in senior high school _____ %
- d. Junior and senior students in senior high school..... _____ %
- e. **High school graduate** _____ %

TOTAL 100%

6. At what grade level do precollegiate students **usually enter this program**. **Circle the one answer that best applies.** *If students participate ONLY in the summer, use the grade level completed just before participating in the summer program, except high school graduates should be reported separately.*

- Elementary school..... 1
- Middle/junior** high school..... 2
- Freshman or sophomore year in senior high school..... 3
- Junior or **senior** year in senior high school 4
- High school **graduate**..... 5

7. **Rank** the following **in the order in** which they are goals of this precollegiate **program**, with "1" indicating the most important **goal** of the **program**, "2" indicating the second most important goal, etc.. *Write in "NA" if that item is not a goal of this program.*

- a. Increase retention in or completion of high school..... _____
 - b. Increase the likelihood of attending college..... _____
 - c. Increase the likelihood of completing college..... _____
 - d. Enhance college recruitment for this institution _____
 - e. Increase general academic skills development _____
 - f. Promote interest/strength in particular subject area _____
- (specify subject area _____)
- Other (specify _____)

8. Rank **all** of the following approaches in the order in which they are used most frequently in providing services through this precollegiate **program**, with "1" indicating the most frequently used approach, "2" indicating the second most frequently used approach, etc. Write in "NA" if this program never uses a particular approach.
- a. Tutoring
 - b. **Mentoring**
 - c. Classroom sessions
 - d. **Testing/assessment**
 - e. Workshops and small group meetings
 - f. Field trips
 - g. Other (specify _____)

9. In Column A, please rate how important each of the following services are in this precollegiate program. Circle "1" for not at all important if the program does not offer that service.

In Column B, rank up to 3 services that are most important in this precollegiate program, with "1" indicating the most important, "2" indicating the second most important, and "3" indicating the third most important.

Services	A. Circle one on each line			B. Rank up to 3 services
	Not at all important	Somewhat important	Very important	
a. Remediation	1	2	3	_____
b. Academically accelerated courses below the college level	1	2	3	_____
c. College-level courses	1	2	3	_____
d. Special preparatory courses (e.g., problem solving)	1	2	3	_____
e. Other supplemental courses (academic enrichment)	1	2	3	_____
f. ACT/SAT training	1	2	3	_____
g. Information about college admissions and/or financial aid	1	2	3	_____
h. Career counseling and Formation	1	2	3	_____
i. Personal counseling	1	2	3	_____
j. Social skills development/confidence building	1	2	3	_____
k. Cultural activities and field trips	1	2	3	_____
l. Information for parents	1	2	3	_____
m. Other (specify _____)	1	2	3	_____

10. Some programs may target certain student characteristics. Rank up to 3 characteristics that are specifically targeted by this program, with "1" indicating the characteristic most important for targeting by this program, "2" indicating the second most important, and "3" indicating the third most important. Rank only those characteristics that are specifically targeted, not characteristics that may incidentally happen to describe some students.

Rank up to 3

- a. Low income
- b. Low achievers
- c. Middle achievers
- d. High achievers or gifted/talented
- e. Racial/ethnic minorities
- f. Non-English speaking, or English as a second language
- g. Rural
- h. Urban
- i. First generation to attend college
- j. Students with disabilities
- k. Specific subject area interest/strength (e.g., math, science)
- l. Female students
- m. Male students
- n. All students at specific schools
- o. Students who dropped out of school
- p. Other (specify _____)

- 11a. About what proportion of precollegiate students served by your institution through this program in 1993-94 were:

- a. Low income?
- b. Female?

11b. About what proportion of precollegiate students served by your institution through this program in 1993-94 were:

- a. **Hispanic?**..... %
 - b. **Black, non-Hispanic?**..... %
 - c. **White, non-Hispanic?** %
 - s. **Asian or Pacific Islander?**..... %
 - e. **American Indian or Alaskan Native?** %
 - f. **Race/ethnicity unknown?**..... %
- TOTAL 100%

12. Does this program pay stipends to precollegiate students for participation in this program? Yes 1 No.....

13a. Are there any financial benefits offered to precollegiate students for successful performance in this program?

Yes 1 No 2 (Skip to question 14)

13b. Which financial benefits are offered to students for successful performance in this program? Circle one on each line.

- | | Yes | No |
|---|-----|----|
| a. Full tuition guarantee at any college | 1 | 2 |
| b. Full tuition guarantee at your institution | 1 | 2 |
| c. Last dollars needed for college tuition after receipt of other financial aid..... | 1 | 2 |
| d. College-level courses offered for credit free of charge or at reduced prices | 1 | 2 |
| e. Pay for grades received at the precollegiate level | 1 | 2 |
| f. Other financial benefit (<i>specify</i> _____)..... | 1 | 2 |

14. What was the primary source of funding for this precollegiate program in 1993-94? Circle the one answer that best appl.

- Tuition..... 1
- Institutional funding**..... 2
- Federal government..... 3
- State/local** government..... 4
- Private/individuals** (include corporate/foundation funding)..... 5
- Other sources..... 6

15a. How many of your institution's faculty and staff worked with this program in 1993-94? Only count faculty and staff with specific program responsibilities, and not people who might happen to serve precollegiate students in the normal course of their duties. _____ faculty and staff

15b. How many of your institution's students worked with this program (e.g., as tutors) in 1993-94? _____ students

If your precollegiate program serves different kinds of students in different locations or for different amounts of time answer the following questions for the typical precollegiate student (i.e., the type of student that constitutes the majority participants in your program).

16. What is the primary location in which this program is held? Circle the one answer that best applies.

- College campus..... 1
- Elementary or secondary schools..... 2
- Students' homes**..... 3
- Other community locations..... 4

17. Approximately how many total hours does a typical precollegiate student spend in program activities during the academic year and during the summer? Approximately how many hours per week does a student spend in this program during a typical school week or summer week when the program is "in session"? For "residential" programs, only count hours when students are in organized activities, classes, tutoring sessions, etc. If the program is not held during the academic year, write "NA" in Column A. If the program is not held during the summer, write "NA" in Column B.

A. Academic year B. Summer

- a. Total hours in program activities..... _____
- b. Hours per typical week in program activities..... _____