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ABSTRACT

This study of 1989 graduates represents the second year that the Detroit (Michigan) Public School system has conducted a follow-up survey of public high school graduates to establish their occupational status at about 16 months after graduation, collect their perceptions of their high school experiences, and record their postsecondary educational experiences. The survey was sent to a sample of 7,395 students; 1,687 (23 percent) returned usable questionnaires. Respondents were more likely than the entire sample to be female and to have passed all three subtests of the High School Proficiency Examination. Of the respondents, 72 percent had been in the college preparatory program, 20 percent had been in vocational and technical programs, and 23 percent had been in a co-op program. Eighty-seven percent awarded an "A," "B," or "C" to the overall quality of their high schools. Ninety-two percent had been employed at some time since graduation, and 63 percent had full-time or part-time jobs in November 1990. Eleven percent had not been enrolled in any postsecondary educational program since graduation. Sixty percent of those enrolled were in a 4-year program, and 80 percent were in a Michigan school. Seventeen tables present information about the graduates. An appendix contains: (1) 21 tables of study data; (2) the survey questionnaire with the distribution of responses for each item; (3) a list of the names of the graduates' employers; and (4) an overview of the history of Detroit school follow-up studies. (SLD)

DETROIT PUBLIC SCHOOLS

FOLLOW-UP STUDY OF 1989 GRADUATES

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DETROIT PUBLIC SCHOOLS

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KEY FINDINGS

The key findings from the follow-up study of 1989 graduates are presented in outline form.

1. Twenty-three percent (23%) of those defined as 1989 graduates and to whom a survey instrument was mailed in two waves responded with a useable questionnaire.

2. Respondents differed statistically significantly from the total sample of graduates in that the respondents were more likely to:

    i. be females, specifically African American females,
    ii. be younger in age,
    iii. score at or above grade level on the Reading and Mathematics subtests of the California Achievement Test, and
    iv. have passed all 3 subtest of the High School Proficiency Examination.

3. They were <u>not</u> any more likely to have been participants in the Free or Reduced-payment Lunch program.

4. Seventy-two percent (72%) had been in the college preparatory program; 20% participated in vocational/technical programs; 29% had been in a co-op program.

5. Eighty-seven percent (87%) awarded an "A," "B" or "C" mark to the overall quality of their respective high schools.

6. Twenty-two percent (22%) picked English; 18%, business education and 17%, mathematics from a list of 16 subjects with a one choice limit as the subject having helped most in their present situation.

7. Twenty-seven percent (27%) picked computer; 15%, business; 14%, mathematics classes as those of which they would have liked to have taken more.

8. Sixty-three percent (63%) averaged between 19 and 30 hours per week of work during their senior year.

9. Percents of those indicating having received the following preparations for the job market were:

    i. career options information, 66%,
    ii. instruction in completing job applications, 60%,
    iii. instruction in interview skills, 55%,

iv. involvement in a Career Day or Job Fair, 49%,
v. instruction in the importance of getting along with others, 48% and
vi. instruction in job preparation skills, 46%.

10. Ninety-eight percent (98%) were single, 13% were parents; 4% were in the military full-time.

11. Ninety-two percent (92%) had been employed at sometime following graduation. and 63% were employed full- or part-time during November, 1990. Jobs categories with largest percents of respondents were cashier 12%; clerk, 12%; sales clerk, 11%; and student assistant, 9%.

12. Sixty-six percent (66%) earned $5.00 or less per hour, 42% were employed in the city of Detroit.

13. Seventy percent (70%) said they received the greatest assistance in getting a job from persons closest to themselves, e.g., relatives.

14. Eleven percent (11%) had not been enrolled in any postsecondary educational program since graduation.

15. Sixty percent (60%) of those enrolled attended a 4-year college or university; 79% were receiving some form of financial aid; 82% were recipients of a Pell Grant, 42% received student loans, 30% were in College Work Study programs.

16. Eighty percent (80%) attended one of 80 Michigan Schools. Twenty percent (20%) attended one of 96 out-of-state schools. Of these, 43 were traditionally black institutions with 75% of the out-of-state students attending these schools.

17. Fifteen percent (15%) attended Wayne State University; 11%, Wayne County Community College; and 9%, Michigan State University.

18. Seven percent (7%) attended Central State University; 7%, Alabama State University; and 6%, Tuskegee University.

FOLLOW-UP STUDY OF 1989 GRADUATES

EXECUTIVE SUMMARY

Purpose and Features of the Program

This study of 1989 graduates represents the second year that the Office of Research, Evaluation and Testing has conducted a follow-up survey of Detroit's public high school graduates. This effort is a continuation of survey activities begun in 1944. Objectives of this study were to establish the occupational status of the graduates during a one month time sample, i.e., November, 1990--approximately 16 months following graduation, to collect the graduates' perceptions in retrospect of their high school experiences, and record their postsecondary educational experiences that would be useful in educational planning; and to fulfill the recommendations of the North Central Association of Secondary Schools and Colleges and of other groups which deem studies of this character to be important.

Methodology

To be considered a member of the 1989 high school graduating class, a student whose record is listed on the data base file had to satisfy four selection criteria that included a graduation code, a grade code range, a year-of-birth range, and enrollment in a high school facility or program. The 7395 students whose records met these criteria became the sample of graduates that were surveyed. A total of 1687 graduates (23%) returned useable questionnaires. The responses therein constitute the basis for the various response frequencies reported in this report.

Multiple sets of address labels were produced. This made it possible to mail, just prior to December 20, 1990, a second set of questionnaires to those graduates who had not responded. The first wave of questionnaires was mailed in mid-November.

In addition to name and address, the address label carried the graduate's student identification (ID) number and his/her school name and school code number. This latter datum allowed for cross tabulations of survey data with schools attended to be generated. The student ID number provided access to a number of demographic student descriptors, allowing for further bivariate analyses.

The removal of the address label by six respondents from their respective questionnaires reduced the number of cases to 1681 where school attended was used in a tabular display. Keypunching errors on fifteen student identification numbers further reduced the number of cases to 1661 for analyses involving student demographic characteristics, e.g., gender.

Findings

The Sample

The caveat expressed in the 1988 graduates follow-up report applies to this study of 1989 graduates, to whit, the reported findings must be understood to reflect the attitudes and experiences of those graduates who responded with useable questionnaires, and secondly, the respondents are not a representative sample of the larger sample of graduates. There is sufficient evidence to warrant this conclusion. The respondents differed statistically significantly from the total sample of graduates on a number of key descriptor variables: they were more likely to be females (71% of the respondents, 60% of the graduates); younger (76% of the respondents, 69% of the graduates were born in 1971); to have scored at or above grade level on two California Achievement Test (CAT) subtests (51% of the respondents, 43% of the graduates on the Reading subtests), (50% of the respondents, 41% of the graduates on the Mathematics subtests); and to have passed all three subtests of the High School Proficiency Examination (77% of the respondents, 70% of the graduates).

Respondents' Descriptions of High School Experiences

Over seventy percent of the respondents said they had been in the college preparatory curriculum. Just under a third had participated in a co-op program, and one in five had availed him/herself of programs offered at one of the vocational/technical centers.

One in five felt that English was the one school subject that had helped them the most in their present situation, with slightly lesser proportions identifying business education or mathematics. When asked what school subject they would have liked to have taken more of, one-fourth chose computer courses, and fewer picked business education (15%) or mathematics (14%).

Two-fifths favored teacher/student discussions as the best teaching method for them. Almost half would have liked their high school to help them more in study habits; one-third selected planning for college or a job. Asked to select one extra-curricular activity that has been most valuable, 18% selected athletics; 15%, career clubs; 10% music. One-third did not participate in extra-curricular activities.

Between approximately half and two-thirds agreed that their high school provided information about career options; taught them how to complete job applications, taught them interviewing skills, and the importance of getting along with others; and involved them in a Career Day or Job Fair. Better than two-fifths said they were provided general job preparation skills and were taught the value of work. What high school did not do was to help to get them a job following graduation. Less than one in ten said their school told them about a job opening, gave information about them to an employer, provided job placement service, and/or sent them for an interview. Approximately two-thirds said their high school did nothing.

School personnel were cited by just under one-fourth as providing the most help in getting into a postsecondary educational program, and one in five indicated one of the following gave the most assistance in obtaining financial aid: guidance department head or high school counselor or high school teacher or coach or high school administrator.

Status at the Time of the Survey

The overwhelming majority of the respondents continued their education beyond high school. Seven out of ten were enrolled full-time or part-time in a postsecondary school. Some had completed short-term programs. Only one in ten did not further his/her education. Of those who did go on to postsecondary schooling, sixty percent did so at a 4-year college or university.

One hundred seventy-six schools, colleges, institutes, training centers, vocational schools, and universities were identified as places where 1282 of the respondents continued their education and/or training. Over half of these facilities were located out-of-state and were attended by one-fifth of the students. Just under half of these out-of-state schools were traditionally black institutions that were attended by three-fourths of the respondents enrolled in out-of-state schools. However, a significant majority, four-fifths of all respondents in postsecondary educational programs attend or attended schools in Michigan. The largest percentage of students attending any one school was 15% at Wayne State University, followed by 11% attending Wayne County Community College and 9% attending Michigan State University. Among out-of-state schools, Central State University in Ohio and Alabama State University each had 7% of the student enrollment. Tuskegee University followed with 6%.

Eighty percent of the students received some form of scholarship or financial aid. The most frequently cited by those in receipt of financial assistance were the Pell Grant (by 80% of the students), student loans (by 42%) and college work study (by 30%).

Over ninety percent of the respondents had held a job at sometime following graduation. During the month of November, 1990, just under two-thirds were employed full- or part-time, but a majority of those not employed in November, 1990, were going to school. Two-fifths of the employed worked in Detroit, and just over one-fourth were working in the tri-county area beyond Detroit. Almost two-thirds were paid no more than $5.00 per hour. Some 70 job groupings were developed to categorize and describe the many jobs reported, with high concentrations of respondents working as cashiers (12%), clerks (11%), sales clerks (9%) and student assistants (9%).

While only two percent reported being married, 13% were parents. The oldest child for one-fifth of the parents was over two years old.

Four percent of the respondents were in the military service full-time.

Examination of Differences in Response Frequencies by Gender

Seventy-three percent of the female respondents as opposed to 68% of the males indicated they had been in the college preparatory curriculum. Males were more likely to have had vocational/technical experiences, females, co-op program participation. Of the ten substantive job preparation activity options presented, twice the proportion of females to males selected "being placed on the job as part of a high school job."

Males were more likely to have worked, on the average, more hours per week during the senior year than females.

Of those who participated in extra-curricular activities, three times or more of the males cited athletics over any other activity, while decreasing percents of females chose career clubs, athletics and music.

There was a larger proportion of parents among the females, 15% in comparison to 7% among males, and females were more likely to have a child that was more than two years old.

Full-time military service claimed more males (8%) than females (2%).

Jobs with female concentration were accounting clerk, cashier, clerk, nurse aide, receptionist, student assistant, and sales clerk. Jobs with male concentration were custodian, cafeteria worker, cook, and stock person. Males received higher wages as measured by hourly rate of pay. There was a slightly higher proportion of females vis-a-vis males employed in Detroit. Females relied slightly more on the co-op coordinator's help in getting a job; males used a friend slightly more often.

Sixty-three percent of the males in contrast to 58% of the females were enrolled in a 4-year college or university, but 14% of the females in comparison to 10% of the males had completed programs lasting less than one year.

Eighty-one percent of the females but only 73% of the males indicated that they had received scholarships or financial aid. Female students were more likely to have been the recipients of Pell grants; males were more likely to have received State of Michigan Competitive Scholarships and athletic scholarships.

Females were more likely to identify postsecondary facilities located in Michigan that they had or were attending. They were more likely to attend a traditionally black institution of higher learning both in terms of the distribution of enrollments in such schools vis-a-vis males and as a proportion of respondents enrolled. Detroit College of Business and Wayne State University had slightly greater female proportions attending. The opposite was true for Wayne County Community College. For out-of-state postsecondary enrollments, females had higher proportions at Central State University, Tuskegee and Wilberforce University. Males reported larger proportions at Alabama State University, Florida A & M University and Prairie View A & M University.

Recommendations

1. The administration at each high school and special program should inform itself and the staff of the findings in this report, both city-wide and : : pertaining to their school's graduates. It is important for the staff to be apprised of the respondents' perceptions of their high school experiences, and their postsecondary school and job experiences. The findings should provide information from which school-specific recommendations and implementation plans could be developed.

2. Efforts to recruit both females and males for the programs offered by the vocational/technical centers and the co-op programs should be continued with attention paid to possible gender bias in program selection.

3. Since the follow-up study of the 1982 graduates, the response rate for these seven surveys has averaged twenty-eight percent. However large this may be as the proportion of graduates responding, evidence suggests the respondents as a group have differed enough from the graduate sample so as to cast doubts on the representativeness of the respondents vis-a-vis the graduates. Thus, the finding in each survey cannot be used to draw inference beyond the respondents per se. In order to make inferences to the entire graduating class with reasonable confidence, it appears that there is a need to modify the methodology now in place.

   Given the usual constraints and limitations that operate when such surveys are undertaken, the following changes are recommended for future surveys. From the list of graduates, a random sample is drawn with replacements. A full length questionnaire is mailed to this sample of graduates. Those failing to respond within a reasonable period of time will be contacted to insure a response with the second mailing. The goal will be to fulfill this sample, using replacements where necessary. The majority of graduates not selected in the probability sample, will receive postcard type instruments that can easily and quickly be completed and returned.

Addendum

In addition to the follow-up study report, a two volume Addendum displaying the response frequencies as separate listings for each school cohort has been published.

FOLLOW-UP STUDY OF 1989 GRADUATES

DESCRIPTION OF THE STUDY

This is the second year that the Office of Research, Evaluation and Testing has undertaken a follow-up survey of graduates from Detroit's public high schools. This effort represents a continuity of high school graduates follow-up studies that began in 1944, and which, until the survey of 1988 graduates, were conducted annually since 1977 by the Office of Guidance. It was during the course of the Office of Guidance's stewardship that the survey instruments used and survey methodologies followed evolved into a standard format and technique.

With the responsibility of fielding an annual survey delegated to the Office of Research, Evaluation and Testing, changes in instrument content were made as a consequence of recommendations made by a committee that was convened for this purpose.[1] In part, the changes reflected a shifting from a guidance orientation. Further modifications were made in the instrument used for this current follow-up survey. The objectives of the present survey continue those stated in the last year's report:[2]

1. To determine the status of graduates [over a year] following graduation;

2. To compile information from former students that will be useful for educational planning;

3. To obtain graduates' perceptions of their high school experiences; and

4. To fulfill the recommendations of the North Central Association of Secondary Schools and Colleges and other groups which deem such studies to be of importance.

This report is divided into four sections: methodology, presentation of findings and analysis, concluding statements and appendix. The appendix contains numerous tables that were not placed in the presentation of findings narrative, a short history of the district's follow-up studies that first appeared in last year's report, and two frequency response tables in the format of the questionnaire used in the follow-up survey. The first of these two tables displays totals for all respondents; the second presents bivariate distributions by gender.

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[1]A listing of the members of this committee is to be found in Linda Leddick and Denny Stavros, "Follow-up Study of 1988 Graduates," Detroit Public Schools, 1990, p. 48.

[2]Ibid, p. 8.

METHODOLOGY

SELECTION OF SAMPLE

The school district does not maintain a separate listing or a computer file of the names and/or student identification numbers for persons who, in 1989, had graduated from high school following the completion of the twelfth grade nor for those who had completed an equivalent grade and graduated from a special program. What is maintained is a collection of computer tapes containing information extracted from the student membership data base at various strategic times during the year. To establish a file of 1989 graduates, the computer tape which stored student membership data from the end of the 1989 school year was used. Students who graduated during that year had been coded "19" in a designated field on their records.

To Insure against selecting records of students who were not members of the 1989 graduating class, each student record had to satisfy all four of the following criteria:

(1) A code "19," (indicating graduation),
(2) A grade code of 12, 11, or a Special Education program code,
(3) Year of birth between 1968 and 1973, and
(4) School attended was a high school building or a high school-level program.

Other data tapes were used to create a record for each graduate which contained the following information:

(1) Student ID number, (2) Student name, (3) Address, (4) Telephone number, (5) Grade Point Average, (6) School or Program Code, (7) Race-Ethnic code, (8) Gender, (9) Scores on the California Achievement Tests for Reading and Mathematics, (10) High School Proficiency Examination results, (11) Grade code, (12) Birth Year, and (13) Free or Reduced-Payment Lunch Program enrollment.

A total of 7395 student records met all four selection criteria, and thus became the sample of graduates that this follow-up study surveyed. Distribution of the graduates by grade is presented in Table 1. The records of 89 percent of the graduates listed their grade placement as 12; while 8 percent had an eleventh grade enrollment. Three percent were Special Education students, the majority in the Learning Disabled program. The distribution of the graduates according to year of birth is displayed in Table 2. Two-thirds of the graduates, born in 1971 and were 18 in the year of their graduation, were while another one-fourth were born in 1970.

TABLE 1

Follow-up Study of 1989 Graduates
Distribution of Graduates and Respondents
by Grade or Special Education Program Code

Grade or Special Education Program Code	Graduates N	Graduates %	Respondents N	Respondents %	Special Education Program Title
11	599	8.1	93	5.6	
12	6585	89.1	1540	92.4	
36	39	0.5	3	0.2	Educable Mentally Impaired
46	5	0.1	1	0.1	Emotionally Impaired
55, 56	145	2.0	23	1.4	Learning Disabled
61, 62	17	0.2	4	0.2	Hearing Impaired
70	2	0.0*	0	0.0	Physically or Otherwise Health Impaired
91	2	0.0*	2	0.1	Visually Impaired
Total	7395	100.0	1666	100.0	

*Less than one-tenth of one percent

TABLE 2

Follow-up Study of 1989 Graduates
Distribution of Graduates and Respondents
by Year of Birth

Year of Birth	Graduates N	Graduates %	Respondents N	Respondents %
1968	44	0.6	3	0.2
1969	354	4.8	52	3.1
1970	1709	23.1	296	17.8
1971	5130	69.4	1267	76.1
1972	152	2.1	46	2.8
1973	6	0.1	2	0.1
Total	7395	100.0	1666	100.0

$X^2=42.40$ df=5 $P<.01$

DISTRIBUTION OF SURVEY INSTRUMENTS

The first wave of questionnaires was mailed to the 7,395 graduates in mid-November, 1990. A second wave of questionnaires was mailed on December 20, 1990 to those graduates who had not responded. Two mailings have been a component of the annual graduate follow-up survey's methodology for a number of years. Conducting the survey in the fall was a departure from the usual procedure of first mailing in June, a year following the graduation of the class being surveyed. The rationnate for the change was based on the assumption that by scheduling the two mailing to coincide with the end-of-the-year holidays, Thanksgiving and Christmas, a higher percent of graduates would respond. This apparently was not the case, for the difference between this year's response rate and last year's was one percentage point: 23 percent vs 24 percent. [Response rate refers to the proportion of the graduates returning questionnaires that could be used for tabulation and analysis.]

Questionnaires received on or before April 30, 1991 were processed, and tabulated with the informated they contained providing the basis of this report. The following breakdown accounts for the disposition of the instruments mailed to the 7395 graduates.[3]

[3]Between May 4, 1991 and August 7, 1997, 13 additional envelopes with responses were received, plus 2 envelopes marked "Returned to sender--No forwarding address on file."

Disposition of Questionnaires Mailed to Graduates

Number	(Percent)	Description
1687	(22.81)	Usable questionnaires received
19	(0.25)	Questionnaires returned unanswered, of these:
		13 were returned with no explanation. Presumably these were from persons who were not in the 1989 graduating class.
		2 were returned by 1988 graduates.
		1 was returned by the parent of the graduate who had died.
		1 was returned by a parent who indicated the graduate was "apparently out of the country."
		1 was returned by a former student who had dropped out.
		1 was returned by a parent who indicated the graduate was in another state undergoing drug and alcoholic rehabilitation.
736	(9.95)	Questionnaires were returned to the sender because the graduate had moved and left no forwarding address or the address was incorrect.
4953	(66.97)	Questionnaires were not returned. Presumably the graduates did not wish to participate in the survey.
7395	(99.98)	Total

Of the 1687 usable questionnaires received from the 1989 graduates, 6 had address labels removed. In addition, key-punching errors were committed on 15 student ID numbers. As a consequence, the total number of respondents vary by the type of descriptive data used in analyzing responses:

Total Possible Number of Respondents	For the Type of Data Presented and Analyzed
1687	Frequency Responses of Graduates to Questionnaire Items
1681	Bivariate Distributions of High School or Program by Questionnaire Items
1661	Bivariate Distributions of Gender, Race-Ethnicity, Grade Point Averages, CAT Reading and Mathematics scores, High School Proficiency Examination results and Free or Reduced-Payment Lunch enrollment, respectively, by Questionnaire Items

Throughout the report, the term ***Graduates*** (N=7395) is used to refer to the identified sample of persons who graduated in 1989. The term ***Respondents*** (N=1687, 1681 or 1661) is used to refer to the graduates who returned usable questionnaires.

PRESENTATION AND ANALYSIS OF DATA

COMPARISON OF GRADUATE AND RESPONDENT SAMPLES

Gender

Data comparing graduates and respondents on a number of demographic or descriptor variables are presented in this section. Table 3 displays the gender characteristics of the two samples. While males comprised 41 percent of the graduate sample, they represent only 29 percent of the respondent sample. The over-representation of females in the respondent sample was statistically significant. (See Table 3.) It is of interest to note that in the fall of 1985, when members of the 1989 graduating class first entered high school as ninth grade students, the proportion of female students was slightly greater than the proportion of male students: 51.2 percent in comparison to 48.8 percent. Four years later, the difference had grown to 59.5 percent, females to 40.5 percent males. In addition, the total ninth grade enrollment was 23,891 as compared to the 7395 who graduated four years later in 1989.[4]

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[4]Mr. Ronald Freeman of the Data Processing Department executed a special run to produce gender and racial-ethnic county from 1985 membership data files.

TABLE 3

Follow-up Study of 1989 Graduates
Distribution of Graduates and Respondents by Gender

Gender	Graduates N	Graduates %	Respondents N	Respondents %
Males	2966	40.5	476	28.6
Females	4399	59.5	1190	71.4
Total	7395	100.0	1666	100.0

$X^2=81.54$ df=1 P<.01

Race-Ethnicity

The difference between the two groups in terms of proportions distributed among the standard five racial-ethnic groupings used over the last two or three decades was negligible and of no statistical significance. (See Table 4.) The overwhelming majority in both samples were African Americans. The proportion of all others combined equaled 6.6 percent among graduates and 7.1 percent among respondents.

TABLE 4

Follow-up Study of 1989 Graduates
Distribution of Graduates and Respondents
by Racial-Ethnic Groupings

Racial-Ethnic Groupings	Graduates N	Graduates %	Respondents N	Respondents %
American Indian or Alaskan Native	20	.3	3	.2
Asian or Pacific Islander	38	.5	9	.5
African American	6910	93.4	1548	92.9
Hispanic	102	1.4	15	.9
White	325	4.4	91	5.5
Total	7395	100.0	1666	100.0

$X^2=6.29$ df=4 P=NS

By combining gender and race-ethnicity we find that two-thirds of the respondents were African-American females. The same approximate proportion, as was found in the 1988 sample of respondents.

Grade Placement

Differences between respondents and graduates by grade placement when the cells for all Special Education program codes were collapsed, while statistically significant,[5] were a function of misinformation stored on the Student Membership Data Base. Students not in Special Education programs should have had a grade 12 designation. (See Table 1.)

Year of Birth

Age differences were also found between respondents and graduates. Three-fourths of the respondents were born in 1971 in contrast to just over two-thirds of the graduates. Differences in the distributions of the groups according to year of birth, were statistically significant. (See Table 2.)

CAT Test Results

Differences in the performances of the respondents and graduates on the Reading and Mathematics subtests of the California Achievement Test, administered when the subjects were in the eleventh grade, were statistically significant. On the Reading subtest, 51 percent of the respondents as opposed to 43 percent of the graduates scored at or above average.[6] On the Mathematics subtest, the same disparity between the scores of the two groups obtained: 50 percent of the respondents and only 40 percent of the graduates achieved grade level or above.[7]

High School Proficiency Examination

Respondents also surpassed graduates in performance on the Detroit High School Proficiency Examination. This examination is given each year and also during the summer. Thus a high school student has two opportunities a year to pass the three components that comprise the test. The differences in the distributions for the two groups in the number of test components passed was statistically significantly.[8] Seventy-seven percent of the respondents passed all three components in comparison to seventy percent of the graduates.

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[5] $X^2 = 16.76$ df=2 $P < .01$

[6] See Table A.1 in the Appendix.

[7] See Table A.2 in the Appendix.

[8] See Table A.3 in the Appendix.

Free or Reduced-Payment Lunch Program

The extent of participation in the Free or Reduced-payment Lunch program was similar for both respondent and graduates. Twenty-six percent of the former and twenty-seven percent of the latter participated.[9]

Differences When Gender is Controlled

Differences between respondents and graduates largely persisted even when gender was controlled on the same four descripter variables.

Among **females,** 50 percent of respondents but only 40 percent of the graduates scored at or above grade level on the Reading subtest (X^2=29.30 df=1 P<.01); 49 percent of the respondents but only 39 percent of the graduates scored at or above grade level on the Mathematics subtest (X^2=29.04 df=1 P<.01); 77 percent of the respondents as compared to 70 percent of the graduates passed all 3 components of the Detroit High School Proficiency Examination (X^2=26.75 df=3 P<.01); the 30 percent participation in the Free or Reduced-payment Lunch program among graduates was slightly more but not statistically significantly greater than the 27 percent participation among respondents (X^2=2.31 df=1 P=NS).[10]

Among **males,** 54 percent of respondents in comparison to 47 percent of graduates scored at or above grade level on the Reading subtest (X^2=5.39 df=1 P=.02); 53 percent of the respondents but only 43 percent of the graduates scored at or above grade level on the Mathematics subtest; differences were not statistically significant between the two groups in the distribution of the number of components of the High School Proficiency Examination that were passed, for example 76 percent of respondents and 70 percent of graduates passed all three components (X^2=7.52 df=3 P=NS); Free or Reduced-payment Lunch program participation was essentially the same for both groups, 23 percent, respondent and 24, percent graduates (X^2=0.07 df=1 P=NS).[11]

Summary of Differences Between Respondents and Graduates

Thus far, the analysis of descripter data has established that the respondents differed from the graduates in following characteristics: the respondents were

(1) more likely to be females, specifically African American females,

(2) younger in age,

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[9]See Table A.4 in the Appendix.

[10]See Tables A.5 through A.8 in the Appendix.

[11]See Tables A.9 through A.12 in the Appendix.

(3) even more likely to have been designated as a 12th grade student on the membership data base file,

(4) more likely to score at or above grade level on the Reading and Mathematics subtests of the CAT,

(5) more likely to have passed all three components of the High School Proficiency Examination, and

(6) not any more likely to have been a participant in the Free or Reduced-payment Lunch program.

In addition, by controlling for gender, differences noted above in 4, 5, and 6 applied for both females and males with the exception of High School Proficiency Examination results for males. There was no statistically significant difference between respondents and graduates.

Gender Differences Among Respondents

A further analysis of descripter variables found that among the respondents there were no statistically significant differences between females and males on three of four variables. While higher proportions of males scored at or above grade level on both the Reading and Mathematics subtests of the CAT, 54 percent on the former and 53 percent on the latter tests, the differences were not sufficient enough vis-a-vis the female percents, 50 and 49, respectively, to be statistically significant: ($X^2=1.07$ df=1 P=NS, Reading; $X^2=1.19$ df=1 P=NS, Mathematics).[12]

The third variable where no statistically significant difference was found between the genders was in Free or Reduced-payment Lunch program participation. Twenty-seven percent of the female respondents and 23 percent of the males respondents were participants. ($X^2=2.60$ df=1 P=NS).[13]

There was sufficient enough disparity in the performances on the High School Proficiency Examination to produce a statistically significant chi-square value, $X^2=8.58$ df=3 P=.04: 94 percent of the females passed either three or two of the components in contrast to 90 percent of the males.[14]

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[12]See Tables A.13 and A.14 in the Appendix.

[13]See Table A.16 in the Appendix.

[14]See Table A.15 in the Appendix.

Gender Differences Among Graduates

But in the graduate sample, gender differences on the four descripter variables were all statistically significant: males performed better on the two CAT subtests, females out performed males on the proficiency examination and were more likely to participate in the lunch program.[15]

The proportion of males scoring at or above grade level on the Reading subtest was 47 percent in comparison to 40 percent of the females ($X^2=22.33$ df=1 $P<.01$), and on the Mathematics subtest, 43 percent of the males scores at or above grade level as opposed to 39 percent of the females ($X^2=7.08$ dt=1 $P=.01$). Females performed better on the proficiency examination, 89 percent passed all or two of the components, and 4 percent passed none, while 86 percent of the males passed all or two of the components, and 7 percent passed none. ($X^2=32.91$ df=3 $P<.01$). Thirty percent of the females had received free or reduced-payment lunches in comparison to 24 percent of the males. ($X^2=28.07$ df=1 $P<.01$).

COMPARISON OF GRADUATE AND RESPONDENT SAMPLES BY HIGH SCHOOL AND PROGRAM

Response Rate

Table 5 displays the distribution of the graduates and respondents by high school and program as well as the percent of graduates in each facility that responded. The second and third columns present the number that graduated and the number that responded, and percent of the total each count represents. For example, there were 573 graduates and 233 respondents who were enrolled at Cass Technical High School. The 573 Cass graduates represent 7.7 percent of the total graduate sample; the 233 respondents represent 13.9 percent of the total respondent sample. A comparison of the two percents shows that Cass graduates were over-represented in their proportion of the respondent sample. In addition, the last column presents the percent of the school's or program's graduates who responded. In the case of Cass, the percent was 40.7, second only to Renaissance High School which had the highest proportion of its graduating class responding--44.8 percent. Taken together, Cass and Renaissance graduates comprise 9.9 percent of the graduate sample, but account for 18.3 of the respondent sample.

A total of four schools were over-represented in the respondent sample, Northern and Murray-Wright in addition to Cass and Renaissance, although the differences for the former two were less than one percentage point. Fifteen were under-represented; and of these only, three schools had a percentage point difference greater than one percentage point: Cody, Mumford, and Pershing. Five schools retained the same proportion in each sample distribution.

None of the twenty-two schools or special program achieved a response rate that was close to those of Renaissance and Cass. The next highest rate was achieved by Northern students, 27.4 percent. There were eleven schools whose response rates were between 20 and 26 percent. The lowest response rate was 17.4 percent among Pershing graduates.

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[15]See Tables A.17 through A.20 in the Appendix.

TABLE 5

Follow-up Study of 1989 Graduates
Percents of Graduates and Respondents Accounted for
by Each of the District's High Schools and Program

High Schools and Special Programs	Graduates N	Graduates %	Respondents N	Respondents %	Percent of the Graduates Responding
Cass	573	7.7	233	13.9	40.7
Central	284	3.8	56	3.3	19.7
Chadsey	218	2.9	48	2.9	22.0
Cody	415	5.7	73	4.3	17.5
Cooley	505	6.8	105	6.2	20.8
Davis	32	0.4	6	0.4	18.8
Denby	332	4.5	63	3.7	19.0
Finney	265	3.6	52	3.1	19.6
Ford	459	6.3	100	5.9	21.3
Kettering	292	3.9	60	3.6	20.5
King	385	5.2	80	4.8	20.8
Mackenzie	328	4.4	58	3.5	17.7
Mumford	543	7.4	106	6.3	19.4
Murray-Wright	380	5.1	100	5.9	26.3
Northern	124	1.7	34	2.0	27.4
Northwestern	267	3.6	61	3.6	22.8
Osborn	384	5.2	76	4.5	19.8
Pershing	379	5.1	66	3.9	17.4
Redford	444	6.0	98	5.8	22.1
Renaissance	165	2.2	74	4.4	44.8
Southeastern	165	2.2	34	2.0	20.6
Southwestern	223	3.0	50	3.0	22.4
Western	179	2.4	40	2.4	22.3
Ed for Pregnant Girls*	36	0.5	7	0.4	19.4
Wingert	2	**	1	0.1	50.0
Total	7395	100.0	1681	100.0	22.7

*The three separate facilities that provide an educational program for pregnant girls are grouped together and are considered as a single program for the purposes of this report. The three facilities are Continuing Education for Girls, Booth Memorial and Teenage Parent Education Center.

**Less than 1 tenth of one percent

Gender Differences in Response Rate

Table 6 displays the number of graduates and respondents and the percent responding for each school grouped separately by gender. In all twenty-two schools, where both genders were enrolled, females had higher percents responding than did males. For the total sample, 27.1 percent of the females and 15.9 percent of the males responded. This represents a 70.4 percent higher response rate for females. The response rate for females ranged from 53.8 percent at Renaissance to 19.7 percent at Pershing.[16] Male's response rate ranged from 34.7 percent at Cass to 9.6 percent at Denby. In six schools the disparity in response rate between females and males was over 100 percent. These six schools were Cody, Denby, King, Mackenzie, Southeastern, and Western.

Performance on the California Achievement Test

Performances of both graduate and respondent samples on the Reading and Mathematics subtests of the California Achievement Test, Form E. Level 20 are presented by school in Table 7 as percents at or above average and percents below average. While the purpose for including this table is to call attention to variations among schools as well as to the overall difference on each subtest between the two samples, which was discussed above, and will be summarized here, it should be noted that there was a wide disparity in performances among schools in each sample. For example, over 90 percent of the graduates from Renaissance and Cass scored at or above average on the reading subtests, while less than a third did at Cooley, Kettering, Pershing and the Continuing Education for Pregnant Girls centers. Performances on the Mathematics subtests produced an even larger number of schools with a third or less of the graduates scoring at or above grade level: Cooley, Denby, Finney, Kettering, Mackenzie, Mumford, Northwestern, Pershing, Western, and the Continuing Education for Pregnant Girls centers. In summary, the percents of respondents achieving at or above grade level in 19 schools, on the Reading subtest, were higher than the graduate percents, and in 18 schools, on the Mathematics subtest, the same was also true. Furthermore, in 8 schools, for each subtest, the difference in percentage points between respondents and graduates was even larger than the difference between the totals for the two groups.

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[16]The response rate of 19.4 percent of graduates from the centers providing programs for pregnant girls was not included since the centers are not co-educational.

TABLE 6

Follow-up Study of 1989 Graduates
Numbers of Graduates, Respondents and Percents
Responding per School by Gender

High Schools and Special Programs	Females			Males			School Total
	Number of		Percent Responding	Number of		Percent Responding	Percent Responding
	Graduates	Respondents		Graduates	Respondents		
Cass	397	171	43.1%	176	61	34.7%	40.7%
Central	155	32	20.6	129	22	17.1	19.7
Chadsey	117	32	27.4	101	15	14.9	22.0
Cody	244	54	22.1	174	19	10 9	17.5
Cooley	300	75	25.0	205	30	14.6	20.8
Davis	0	0	0	32	6	18.8	18.8
Denby	217	52	24.0	115	11	9.6	19.0
Finney	134	34	25.4	131	18	13.7	19.6
Ford	274	70	25.5	195	29	14.9	21.3
Kettering	185	46	24.9	107	14	13.1	20.5
King	213	56	26.3	172	21	12.2	20.8
Mackenzie	193	42	21.8	135	14	10.4	17.7
Mumford	328	73	22.3	218	32	14.7	19.4
Murray-Wright	230	66	28.7	150	34	22.7	26.3
Northern	62	21	33.9	62	12	19.4	27.4
Northwestern	172	44	25.6	95	17	17.9	22.8
Osborn	224	54	24.1	160	20	12.5	19.8
Pershing	213	42	19.7	166	24	14.5	17.4
Redford	289	74	25.6	155	23	14.8	22.1
Renaissance	104	56	53.8	61	18	29.5	44.8
Southeastern	89	24	27.0	76	10	13.2	20.6
Southwestern	117	32	27.4	106	18	17.0	22.4
Western	104	32	30.8	75	8	10.7	22.3
Ed for Pregnant Girls	36	7	19.4	0	0	0	10.4
Wingert	2	1	50.0	0	0	0	50.0
Total	4399	1190	27.1	2996	476	15.9	22.7

TABLE 7

Follow-up Study of 1989 Graduates
Percents of Graduates and Respondents Scoring at or Above Grade Level on the California Achievement Tests, Form E, Level 20 by High School and Special Program

High Schools and Special Programs	CAT Reading Scores Percent at or Above Grade Level		CAT Mathematics Scores Percent at or Above Grade Level	
	Graduates	Respondents	Graduates	Respondents
Cass	93.3	94.1	95.6	94.9
Central	33.1	41.7	43.6	41.7
Chadsey	35.1	45.2	48.0	50.0
Cody	39.3	44.4	43.7	53.3
Cooley	27.8	30.9	32.5	40.9
Davis	68.8	83.3	46.9	83.3
Denby	34.6	31.5	30.5	33.3
Finney	34.7	40.0	30.5	29.3
Ford	45.2	58.1	41.7	52.9
Kettering	25.4	25.0	26.0	32.5
King	42.9	41.0	33.9	34.4
Mackenzie	36.4	45.7	31.3	47.8
Mumford	49.5	47.5	26.2	39.5
Murray-Wright	39.6	50.0	33.5	36.5
Northern	49.5	41.1	36.5	31.0
Northwestern	35.8	42.9	32.1	45.0
Osborn	40.6	44.8	39.5	51.7
Pershing	28.6	32.6	29.4	30.4
Redford	43.6	50.6	40.2	44.2
Renaissance	96.6	96.7	99.2	100.0
Southeastern	36.6	46.7	39.0	60.0
Southwestern	43.7	41.4	38.8	42.9
Western	35.6	40.0	26.3	20.0
Ed for Pregnant Girls	14.3	25.0	14.3	0.0
Total*	42.7	51.2	40.5	50.2
	(N=5097)	(N=1247)	(N=5057)	(N=1240)

*Data for one student at Wingert are in included in the totals.

TABLE 8

Follow-up Study of 1989 Graduates
Socio-Economic Indicators: Percents of Graduates and Respondents Receiving Either Free or Reduced-Payment Lunch by High School and Special Program

High Schools and Special Programs	Percent Receiving Free or Reduced-Payment Lunch	
	Graduates	Respondents
Cass	15.2	10.8
Central	35.2	38.9
Chadsey	28.9	27.7
Cody	21.5	13.7
Cooley	25.7	28.6
Davis	6.3	0.0
Denby	32.8	31.7
Finney	41.5	38.5
Ford	11.9	9.1
Kettering	46.9	50.0
King	31.2	31.2
Mackenzie	35.1	33.9
Mumford	16.7	18.1
Murray-Wright	36.6	38.0
Northern	43.5	48.5
Northwestern	33.0	31.1
Osborn	24.0	23.0
Pershing	31.7	36.4
Redford	15.8	15.5
Renaissance	10.8	10.8
Southeastern	43.6	58.8
Southwestern	34.1	42.0
Western	33.5	30.0
Ed for Pregnant Girls	63.9	85.7
Total*	27.3	26.2
	(N=7395)	(N=1666)

*Data for one student at Wingert are not included in the totals.

Free or Reduced-payment Lunch Program

Table 8 provides an index of socio-economic differentiation among the schools as well as verifying, at the school level, the lack of statistically significant difference between the graduate and respondent samples in the percentage having participated in the Free or Reduced-payment Lunch program.

The range in the percents of lunch program participants among the graduate sample was from lows of 6.3 percent at Davis and 10.8 percent at Renaissance to highs of 63.9 percent at the Continuing Education for Pregnant Girls centers and 46.9 percent at Keltering. Among the respondents, at the low end were Davis with no reported participants and 9.1 percent at Ford, and, at the upper end, 85.7 percent at the Continuing Education for Pregnant Girls centers and 58.8 percent at Southeastern.

There was, however, no pattern of differences among the schools in so far as the one sample having consistently higher percents participating in the lunch program. There were two schools where equal percents for the graduates and respondents were enrolled in the lunch program. Twelve schools showed higher percents of the graduate sample enrolled. Ten schools had the opposite: the percent of respondents was greater than the percent of graduates.

QUESTIONNAIRE RESPONSES

The questions the 1989 graduates were asked to answer may be grouped into three categories: (1) High School Experiences, (2) Employment Since High School and (3) Education Since High School. Additional postsecondary school demographic questions were asked among the school-related questions and the responses to these are presented below along with those in this first category. The complete display of response frequencies for each question asked is presented in the Appendix in the section entitled **The Distribution of Responses of the 1989 Graduated Survey, Total Sample,** with the pages in this section marked city/page number for quick assessibility.

HIGH SCHOOL EXPERIENCES

Curriculum and Program Participation

Of the 1515 respondents answering the first of five questions dealing with curriculum and program participation, 72 percent indicated that they were in the college preparatory curriculum during their high school tenure. Twenty percent (of 1292 answering) said they had participated in vocational/technical center programs, and close to one-third (29% of 1298 responding) acknowledged Co-op program participation. A small proportion indicated participation in Special

Education program (5% of 1203) answering)[17] and an even smaller percent said they had participated in the program for bilingual students (2% of 1183 answering.)

Vocational/Technical Program Participation

In response to the question asking the respondents to circle the name of the vocational/technical center they had attended, 32% of 248 answering circled Crockett, 30%, Randolph; 26%, Golightly; and 14%, Breithaupt.

Hours Worked as Seniors

Sixty-three percent of the two-thirds answering said they worked an average of 19 and 30 hours per week during their last year in high school. Nineteen percent said they averaged between 31 and 40 hours a week. The combined percent working over 18 hours per week in this year's graduating class was much greater than last year's. Eighty-three percent as compared to last year's 54 percent. This difference may be a function of the wording of the question. On last year's survey instrument, the respondents were asked to choose from ranges of hours worked, with one option of not having worked at all, plus the period of time covered was not confined to their last year in school.

Preparation for Job Market

In response to the question of what their respective high schools did to prepare them for the job market, over sixty percent said their school provided information about career options (66%) and that they were taught how to complete job applications (60%). Over half said they were taught interview skills (55%). Between 40 and 50 percent selected "involved me in a Career or Job Fair" (49%), "taught me the importance of getting along with others" (48%), "provided general job preparation skills" (46%), and "taught me the value of work" (44%). One-fifth said they were placed on a job as part of a high school course. Fewer yet said they were trained for a specific job (16%); they were helped to find after-school work which was part of a class (14%). Nine percent said their school did nothing. Ninety-seven percent of the respondents answered this question.

Help to Secure a Job After Graduation

Approximately two-thirds (65%) of those responding indicated that their respective high schools did "nothing" to help them secure a job following graduation. One-fifth (21%) said they were involved in a job fair. Less than one-tenth said they had received assistance of an instrumental sort: were told of a job opening (9%), employers were given information about

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[17]There were 33 respondents with a Special Education Program code at the time of their graduation. Twenty-eight of the students answered the question that asked if they had participated in this program. Of these, 26 acknowledged that they had participated. The total number of respondents who answered 'Yes' was 61.

them (7%), were provided job placement service (7%), or were sent for an interview (6%). Ninety-five percent of the respondents answered this question.

Extra-Curricular Activity

In response to the question of which one extra-curricular activity had been the most valuable, one-third (35%) said that they had not participated, but 18% singled out athletics, 15% chose career clubs, such as Future Teacher, DECA, etc., and 10% selected music. Less than one-tenth chose academic clubs (8%), Junior Achievement (7%), student council (5%), and dramatics, debate (4%). Ninety-six percent of the respondents answered this question.

Areas Where More Help was Needed

Asked to select one area they would have liked their respective high schools to have helped them more, they divided their selections largely to two of the six choices offered to them. Almost half (45%) circled "study habits" and exactly one-third chose "planning for college or a job." The balance of the responses were distributed among the four remaining choices: "thinking skills" (8%), "practical living skills" (6%), "interpersonal skills" (5%), and "selecting high school courses" (3%). Ninety-four percent of the respondents answered this question.

Favored Teaching Methods

From a list of eleven teaching methods, teacher/student discussions was chosen by 42% of the respondents as the one they felt worked best for them while in high school. Independent study (12%) and teacher lectures (12%) received the next highest proportion of responses. Just under one-tenth selected use of computers (9%) and students/student discussions. The remaining six methods received negligible responses: work in labs (6%) work on projects (5%), tutoring (2%), field trips (2%), teaching machines (1%), and the use of video-films (1%). Ninety-four percent of the respondents answered this question.

School Subjects Helped in Present Status

The respondents were presented with a list of school subjects in alphabetical order and asked to (1) select the one which helped them most in their present situation and (2) to pick the one subject in which they would have liked to have taken more classes. Respondents felt they received the most help from English (22%), business education (18%), and mathematics (17%). Fewer still selected Vocational/Technical School courses (9%), computer courses (7%), co-op (7%), and science (6%). For the remaining nine subjects none received over three percent of the responses. These were career guidance (3%), physical education/athletics (3%), JROTC (2%), home economics (2%), music (2%), social studies (2%), art (1%), foreign languages (1%), industrial arts (1%). Ninety-one percent of the respondents answered this question.

School Subjects Would Have Liked More Classes

Over one-fourth (27%) of the respondents picked computer courses as the one subject they would have liked to have taken more classes. The two other most frequently selected courses were business education (15%) and mathematics (14%). Subjects chosen by between 10 and 4 percent of the respondents were Vocational/Technical School courses (7%), science (6%), English (6%), foreign languages (5%) and career guidance (4%). None of the following eight subjects received over three percent of the responses: music (3%), art (3%), home economics (3%), co-op (2%), social science (2%), physical education/athletics (1%), JROTC (1%), and industrial arts (1%). Ninety-six percent of the respondents answered this question.

Grading the High Schools or Six Characteristics

In the same manner that students are graded on the quality of their work with a mark of A through E, the respondents were asked to grade their respective high schools on six characteristics by awarding a mark of A through E. The characteristic that received highest mark, based on the combined percents awarding an "A" or "B" mark was instruction provided by the respondents' teachers. Sixty percent awarded an "A" or "B" mark. For this same characteristic only 2% awarded an "E."

The characteristic received the second highest combined "A" and "B" percents (52%) was interest show the respondent by the high school staff. Six-percent selected an "E".

Services provided by the respondents' high school counselors was marked "A" or "B" by 49% of the respondents. Ten percent awarded an "E."

Forty-seven percent of the respondents felt the over-all quality of their respective high schools was equal to an "A" or "B." Four percent awarded an "E."

Forty percent thought that the preparation they received from their high school courses vis-a-vis what they were doing now was worth an "A" or "B." Nine percent awarded an "E."

One-third (32%) considered the administration of their respective schools provided by the school principal, assistant principal and other administrators worthy of an "A" or "B." Twelve percent awarded an "E."

Ninety-six percent to 99% of respondents answered the above six questions relating to school characteristics.

Marital and Parental Statuses

Ninety-eight percent of the respondents were single. Two percent were married. Two hundred and six or 13% of those responding said they had children. Asked the age of the oldest child, 21% of the 213 responding to this question indicated the child was older than two years, 33% said the oldest was one to two years old, and for 46%, the oldest child was less than a year old.

Military Service Status

Four percent said they were currently in the military service full-time, and 2% indicated they were in a part-time National Guard program. Ninety-five percent were not in a military program. Less than 1% did not answer this question.

EMPLOYMENT SINCE HIGH SCHOOL

Since graduating from high school, 92% said that they had been employed at some time. Eight percent said they had not been employed since graduation. Ninety-four percent of the respondents answered this question.

Employment During November, 1990

In order to establish an accurate picture of the respondents' employment for a narrow period of time, it was decided to limit the focus of the employment questions to November, 1990. Exactly one-fourth of the respondents said that they were employed full-time during the month of November, 1990. Three-fourth of those who were not were evenly divided between being employed part-time (38%) and not being employed (37%). Ninety-two percent of the respondents answered this question.

Jobs Held in November, 1990

The respondents were asked to provide a job title, to briefly describe what they did on the job, and to list the company or organization that employed them. As anticipated, job description information was invaluable in the task of establishing a usable job title. Also the name of the company or organization the respondent worked for provided yet another aid in determining more precisely the nature of the respondent's job. Tabular displays of all jobs provided by the respondents are presented for both the total respondent sample and gender breakdown in the Appendix. No attempt was made to code and quantify company or organization names. However, a listing of most of the names given by respondents is included in the Appendix.

A total of seventy job groupings was created. The method used in grouping the various jobs was not unlike creating categories for coding responses to open-ended questions. Jobs that required the performance of common tasks were linked together or jobs that were performed in like businesses or organizations were combined in the same job grouping. Because a large number of the respondents were employed by the postsecondary school they attended, a job grouping for student assistant was created. Obviously with such a large number of job groupings additional collapsing could easily be accomplished. Yet our purpose was to provide a detailed picture of the variety of jobs that the 1989 graduate had some seventeen month following

graduation.[18] Job descriptions/titles for those who were full-time military personnel were not included in this grouping of jobs. The single listing of cannoneer was for a respondent who had left the service. The jobs of 815 respondents are listed in the job groupings. The number of respondents per job grouping ranged from one, e.g., one heating and cooling specialist, one interior design assistant, one rag cutter, to as many as 99 cashiers. The job groupings with largest percents of respondents were cashier (12%), clerk (11%), sales clerk (9%) and student assistant (9%).

Occupational Areas

An additional perspective as to the nature of the jobs held by the respondents in November, 1990 may be gained from the inspection of the vast array of jobs listed in the Appendix under the section of Employer Names. These were grouped into the following categories:

1. Banks, Mortgage Companies and Credit Unions
2. Colleges and Universities
3. Federal, State and Municipal Government Agencies
4. Hospital and Health Care
5. Information Processors
6. Insurance
7. Manufacturing
8. Personal Service
9. Protective Service
10. Quick Service Food: Fast Food Restaurant, Donut Shops, Yogurt Shops, etc.
11. Recreation and Hospitality
12. Retail
13. Restaurants
14. Utilities
15. Miscellaneous

Hourly Rates of Pay

One-third earned $4.25 per hour or less. Another third (32%) earned between $4.26 and $5.00 per hour. Ten percent claimed they were paid over $7.00 per hour. Fifty-three percent of the respondents answered this question.

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[18]I am indebted to Mr. Raymond Kaczmarski, Office of Vocational-Technical Education, who provided both assistance and information in grouping the mass of job titles and names of companies, and to Dr. James Evans, Office of Guidance, who was most helpful in the early stages dealing with this task.

Locations of Jobs

Two-fifths (42%) of the respondents were employed in the city of Detroit. Over one-fourth (28%) were employed in the tri-county area exclusive of Detroit, and the remaining third were employed either elsewhere in Michigan (21%) or out-of-state (9%). Fifty-eight percent of the respondents answered this question.

Sources Used to Get Jobs

Asked to name the one source who provided the greatest assistance in getting the job they held in November, 1990, seventy percent of those responding selected from the categories presented persons closest to themselves: myself (37%), parent or other relative (19%), and friend (14%). Six percent named their co-op coordinator, and 4 percent identified the Vocational/Technical school placement office staff. Besides a 9 percent segment indicating others as sources of assistance, no more than three percent named their employer, i.e., the employing institutions as for example the college in which they were employed, (3%), media such as TV, newspapers, radio, etc. (3%), high school counselor (2%), member of a church group or of another organization to which the respondent belonged (1%), and the guidance department head (1%). Fifty-nine percent of the respondents answered this question.

Reasons for Lack of Employment

Those not employed in November, 1990 were asked why they were not. They were provided fourteen choices and directed to circle all that applied. The most frequently selected reason for not working was that the respondent was going to school. Exactly two-thirds circled this choice. The next most frequently cited reasons for not working were "looked but couldn't find work" (22%), "quit the job I had" (15%), "transportation problems" (13%), and "was receiving ADC or welfare aid" (10%). The remaining reasons received the following proportioning of responses: "laid off from the job I had" (6%), "pregnant" (6%), "health and family reasons" (5%), "lacked schooling or necessary training" (5%), "had never been employed" (4%), "lacked child care" (4%), "had given up looking for work" (3%), "fired from the job I had" (2%). Five percent circled "other" reasons. Thirty-six percent of the respondents answered this question, and 38 percent of those answering cited two or more reasons for not being employed during the month of November (1990).

EDUCATION SINCE HIGH SCHOOL

Types of Enrollments

Approximately nine out of ten respondents (89%) continued their education following their graduation from high school. Fifty-eight per cent said that they were enrolled full-time in an educational program. Another 14 percent claimed to be enrolled part-time in an educational program. Seventeen percent indicated that they were not currently enrolled in an educational program. Ninety percent of the respondents answered this question.

Reasons for Not Being Enrolled

Those not currently enrolled in an educational program were asked to indicate the one reason they were not from a selection of 13 reasons presented. Six percent indicated that they had already completed a postsecondary school program. The three most frequently chosen reasons were "lack of money" (21%), "decided to wait" (13%) and "have applied, waiting for acceptance" (11%). The next three in order of response frequency were "began in a school or training program but dropped out" (10%), "pregnant or a full-time homemaker" (9%), and "lack of time due to employment" (8%). The percent choosing the remaining five reasons for currently not being enrolled in an educational program, besides 4 percent who circled "other" were (6%) "looking for a school to meet my needs," (5%) "personal choice," (3%) "not interested," (2%) "applied but not accepted," and (2%) "in military service." Twenty-two percent of the respondents answered this question.

Types of Educational Programs

To the question of what kind of educational program the respondents were currently enrolled or had been enrolled, 60 percent indicated a 4-year college or university. Thirteen percent each circled a 2-year college vocational-technical or business program and a course of study or program that lasted less than one year, respectively. Twelve percent said their program was in a 2-year liberal arts college. Three percent claimed a 1-year college vocational-technical or business program. One percent chose "Other." Eighty-two percent of the respondents answered this question.

Person Who Provided the Most Help to Get into Program

In response to the question of who, among all the people helping the respondent get into his/her post-high school educational program, was most helpful, 38 percent identified "parent or other relative." Twenty-six percent said no one but themselves. Not quite one-fourth selected one of the four high school persons listed: high school counselor (13%), high school teacher (5%), high school guidance department head (3%), and Vocational/Technical Center staff (2%). College placement office staff or admissions official was chosen by 6 percent. The percents of respondents selecting from among the remaining four response choices were 4 percent (friend), 2 percent (other), 1 percent (member of a college department), and 1 percent (member of a church or other organization). Seventy-eight percent of the respondents answered this question.

Financial Aid and Person Who Assisted the Most in Obtaining It

Seventy-nine percent of the 81 percent of the respondents who answered said that they had received scholarship or financial aid to attend a school or program since graduating from high school. Asked who assisted them the most in obtaining financial aid, approximately one-third (32%) singled out "college financial aid representative." One-fourth (26%) cited "parent or other relative" as most helpful. Thirteen percent identified "no one but myself." High school counselor (10%) and guidance department head (5%) received the next highest response frequency. Three percent or less chose "member of a college department" (3%), "other" (3%), "high school teacher or coach" (3%), "friend" (3%), "high school administrator" (1%), "member

of a church or other group," and "military recruiter" (less than 1 %). Sixty-one percent of the respondents answered this question.

Types of Financial Aid

In answer to the question of what types of financial aid they have received, four out of five (82%) circled Pell Grant. Thirty percent indicated they participated in the college work study program, and 42 percent had taken out a student loan. Seventeen percent were recipients of college/school scholarships. The same percent (17%) had received State of Michigan Tuition Grants, and just under one in ten (9%) had won State of Michigan Competitive Scholarships. Three percent claimed athletic scholarships. One percent received assistance through Veteran Benefits. Thirteen percent circled other sources of financial aid. A combined total of 2 percent claimed they had won a National Merit Scholarship and/or a National Achievement Scholarship. One-third (34%) circled one choice, 28 percent circled two choices, 22 circled three choices, and 16 percent circled four or more types of financial aid. Sixty-four percent of the respondents answered this question.

National Merit Scholarships and National Achievement Scholarships

According to lists published by the National Merit Scholarship Corporation in 1988, the Detroit Public Schools' 1989 graduating class had 2 students who were semifinalists in the Merit Scholarship Competition,[19] and 27 students who were semifinalists in the National Scholarship Program for Outstanding Negro Students.[20] None of the 14 students who indicated recipiency of a National Merit Scholarship were listed as semifinalists. Of the 10 who claimed that they had been awarded a National Achievement Scholarship, 3 were listed as semifinalists. Three who circled National Merit Scholarship were listed as semifinalists for the National Achievement Scholarship. One respondent who was listed as a semifinalist for both scholarships, circled National Achievement Scholarship.

The disparity between the information derived from official sources and that derived from the respondents, regarding the number who indicated they were recipients of either a National Merit Scholarship or a National Achievement Scholarship may be due all or in part to data entry errors--of which we have evidence cited above attesting to the loss of data for various types of analysis because student ID numbers were incorrectly entered or due to carelessness by the respondents in circling response choices, or due to their reporting of false information. Which of these were factors and to what extent they contributed to the inaccurate data displayed above is not known at this writing. This however, should alert the reader that an error factor of unknown proportions is present and it should be kept in mind while reading this reports findings.

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[19]Semifinalists in the Merit Scholarship Competition of 1989, National Merit Scholarship Corporation, Evanston, 1988.

[20]Semifinalists in the 1989 National Scholarship Program for Outstanding Negro Students, National Merit Scholarship Corporation, Evanston, 1988.

Fortunately there are remedies available to help limit the size of the error factor. Another group of data entry persons will be used in the future. Continued redesigning of the instrument can help to curb careless responding. Reporting false information can not be controlled per se, but wholesale or partial disregard for the veracity in response can be detected through close inspection of the response patterns on the returned survey instruments. In the former case, the instrument can be excluded out of hand, in the latter case, specific sets of response can be deleted.

TABLE 9

Follow-up Study of 1989 Graduates
Location of Postsecondary Schools
Respondents Said They Had or Were Attending
by Number and Percent

Location	Postsecondary Schools	
	Number	Percent
Michigan	80	45.5
Out-of-State	96	54.5
Total	176	100.0

TABLE 10

Follow-up Study of 1989 Graduates
Number and Percent of Respondents Attending
Postsecondary School by School Location

Location	Students Attending Postsecondary Schools	
	Number	Percent
Michigan	1022	79.7
Out-of-State	260	20.3
Total	1282	100.0

Postsecondary Schools and Their Location

A total of 1282 respondents identified 176 postsecondary schools that they were attending or had attended since graduating high school. Seventy-six percent of the respondents either circled one of the schools listed on the last page of the questionnaire or provided the name and location of the school they attended if it was not listed. One hundred and seventy-six schools were identified. Just over half (55%) of the schools have an out-of-state location. But exactly four-fifths attended schools located in Michigan. (See Tables 9 and 10.) Of the 96 out-of-state schools attended, 43 (45%) are traditionally black institutions with 195 respondents attending these traditionally black institutions. This represents 75 percent of the out-of-state student enrollment. (See Tables 11 and 12). The 43 traditionally black institutions attended are located in 17 states plus the District of Columbia. When all out-of-state schools are accounted for, the total number of states increases to 30, including the District of Columbia. A complete listing of schools attended together with the number and percent of respondents attending each school, grouped by Michigan schools or out-of-state schools, is presented in the Appendix.

TABLE 11

Follow-up Study of 1989 Graduates
Number and Percent of Traditionally Black Institutions
and Non-Traditionally Black Institutions, Located Out-of-State,
Respondents Said They Had or Were Attending

Type of School	Postsecondary Schools Number	Percent
Traditionally Black	43	44.8
Non-Traditionally Black	53	55.2
Total	96	100.0

TABLE 12

Follow-up Study of 1989 Graduates
Number and Percent of Respondents Attending Out-of State
Postsecondary Schools That Are Traditionally Black Institutions
or are Non-Traditionally-Black Institutions

Type of School	Students Attending Postsecondary Schools	
	Number	Percent
Traditionally Black	194	74.6
Non-Traditionally Black	66	25.4
Total	260	100.0

Michigan Schools

Table 13 lists the fifteen Michigan postsecondary schools where 2 percent or more of the respondents were enrolled or where they had been enrolled. Wayne State University ranked first with 15 percent. Following Wayne State University, in descending order of percent attending or had attended, were Wayne County Community College (11%), Michigan State University (9%), Detroit College of Business (6%) and Henry Ford Community College (5%). The percents attending the other major public four-year universities were Central Michigan (1%), Eastern Michigan (3%), Oakland University (3%), University of Michigan, Ann Arbor (4%), and Western Michigan University (4%).

TABLE 13

Follow-up Study of 1989 Graduates
Michigan Postsecondary Schools
with Two Percent or More of the Respondents
Attending in-State Schools
by Rank, Number and Percent Attending

Rank	Name of School	Respondents Attending	
		Number	Percent
1	Wayne State University	151	14.8
2	Wayne County Community College	108	10.6
3	Michigan State University	95	9.3
4	Detroit College of Business	65	6.4
5	Henry Ford Community College	55	5.4
6	Western Michigan University	45	4.4
7	University of Michigan (Ann Arbor)	39	3.8
8	Eastern Michigan University	33	3.2
9	Oakland Community College	32	3.1
10	Oakland University	26	2.5
11	University of Detroit	25	2.4
12	National Education Center	25	2.4
13	Michigan Institute of Technology (Detroit Area)	25	2.4
14	Ferris State University	24	2.3
15	Lewis College of Business	24	2.3

Out-of-State Schools

Out-of-state postsecondary schools that two or more percent of the respondents were attending or had attended are displayed in Table 14. All thirteen of the schools listed are traditionally black institutions. The out-of-state school with the highest proportion of respondents was Central State University in Ohio with 7 percent. Schools where 4 percent or more of the respondents were attending or had attended Alabama State University (7%), Tuskegee University (6%), Hampton University (5%), Florida A & M University (4%), Alabama A & M University (4%), Wilberforce University (4%) and Tennessee State University (4%).[21]

[21]For a complete listing of all traditionally black institutions the respondents indicated they had or were attending and the number attending each see Table A.21 in the Appendix.

TABLE 14

Follow-up Study of 1989 Graduates
Out-of-State Postsecondary Schools
with Two Percent or More of the Respondents
Attending Out-of-State Schools
by Rank, Number and Percent Attending

Rank	Name of School	Respondents Attending	
		Number	Percent
1	Central State University (OH)	18	6.9
2	Alabama State University	17	6.5
3	Tuskegee University (AL)	15	5.8
4	Hampton University (VA)	12	4.6
5	Florida Agricultural and Mechanical University	11	4.2
6	Alabama Agricultural and Mechanical University	10	3.8
7	Wilberforce University (OH)	10	3.5
8	Tennessee State University	9	2.7
9	Howard University (DC)	7	2.3
10	Grambling State University (LA)	6	2.3
11	Kentucky State University	6	2.3
12	Knoxville College (TN)	6	2.3
13	Prairie View Agricultural and Mechanical University	6	2.3

Schools by State Location

Table 15 presents the distribution of the out-of-state schools attended by the states in which they are located. The state with the greatest number of schools attended was Georgia with 13 schools. Ohio is next with eleven schools attended. The list includes 29 of the 50 states and all sections of the nation are represented: from Vermont to Florida, Iowa and Oklahoma, Wisconsin to California.

TABLE 15

Follow-up Study of 1989 Graduates
States Postsecondary Schools are Located
by Number and Percent of School Attended

State	Schools Attended Number	Percent	State	Schools Attended Number	Percent
Alabama	6	6.3	Louisiana	4	4.2
Arizona	2	2.1	Maryland	2	2.1
Arkansas	2	2.1	Mississippi	4	4.2
California	3	3.1	Missouri	2	2.1
Colorado	1	1.0	New York	2	2.1
Connecticut	1	1.0	North Carolina	3	3.1
District of Columbia	1	1.0	Ohio	11	11.5
Delaware	2	2.1	Oklahoma	2	2.1
Florida	5	5.2	Pennsylvania	3	3.1
Georgia	13	13.5	South Carolina	2	2.1
Illinois	3	3.1	Texas	3	3.1
Indiana	3	3.1	Tennessee	5	5.2
Iowa	1	1.0	Vermont	2	2.1
Kansas	3	3.1	Virginia	3	3.1
Kentucky	1	1.0	Wisconsin	1	1.0
			Total	(N=96)	99.8

States by Proportion of Students Attending

The number and percent of respondents who had or were currently attending an out-of-state postsecondary school is displayed in Table 16 by the state in which the school is located. Alabama had the highest number of students 45 or 17 percent. Close behind in count was Ohio with 40 students (15%). Georgia ranked third with 9 percent, followed by Tennessee with 8 percent of the students. the remaining states that had at minimum three percent of the student were Florida (7%), Virginia (5%), Louisiana (5%), and Mississippi, Texas, Indiana, and the District of Columbia all with 3 percent each. Nineteen states claimed less than 3 percent of the students.

TABLE 16

Follow-up Study of 1989 Graduates
States Postsecondary Schools are Located
by Number and Percent of Respondent Attending

State	Schools Attended Number	Percent	State	Schools Attended Number	Percent
Alabama	45	17.3	Louisiana	13	5.0
Arizona	3	1.2	Maryland	2	0.8
Arkansas	3	1.2	Mississippi	8	3.1
California	3	1.2	Missouri	5	1.9
Colorado	1	0.4	New York	2	0.8
Connecticut	1	0.4	North Carolina	5	1.9
District of Columbia	7	2.7	Ohio	40	15.4
Delaware	3	1.2	Oklahoma	2	0.8
Florida	17	6.5	Pennsylvania	4	1.5
Georgia	24	9.2	South Carolina	2	0.8
Illinois	5	1.9	Texas	8	3.1
Indiana	7	2.7	Tennessee	21	8.1
Iowa	3	1.2	Vermont	2	0.8
Kansas	3	1.2	Virginia	14	5.4
Kentucky	6	2.3	Wisconsin	1	0.4
			Total	(N=260)	100.4

SUMMARY OF FINDING FOR THE TOTAL RESPONDENT SAMPLE

RESPONDENTS' DESCRIPTIONS OF THEIR HIGH SCHOOL EXPERIENCES

Over seventy percent of the respondents said they were in the college preparatory curriculum while in high school. Less than one-third had been involved in a co-op program, and one in five had participated at some point in his/her high school career in a program at a vocational/technical center. The question of how many hours had they worked during their last year in high school, two-thirds responded, and of these, four in five had worked, on an average, more than eighteen hours per week.

The percents of respondents grading the following six school characteristics "B" or better, in rank order, were 60%, instruction provided by their high school teachers' 52%, interest shown the respondent by the high school staff; 49%, services provided by their counselors; 47%, the over-all quality of the high school attended; 40%, preparation received in high school for their present statuses; and 32%, the high school's administration provided by the school's administrative staff. Virtually all the respondents answered this question.

One in five felt that English was the one school subject that had helped them the most in their present situation. Slightly less of a proportion identified business education or mathematics, respectively. When asked what school subject they would have liked to have taken more classes, one-fourth chose computer courses. Somewhat fewer picked business education (15%) or mathematics (14%). The respondents were presented a list of 16 subjects from which to select.

In answer to queries pertaining to instruction, two-fifths favored teacher/student discussions as the best teaching method for them; almost half would have liked their high school to help them more in study habits; one-third selected planning for college or a job. Asked to select one extra-curricular activity that has been most valuable, 18% selected athletics; 15%, career clubs; 10%, music. One-third did not participate in extra-curricular activities.

Between approximately half and two-thirds agreed that their high school provided information about career options; taught them how to complete job applications, interviewing skills, and the importance of getting along with others; and involve them in a Career Day or Job Fair. Better than two-fifths said they were provided general job preparation skills and were taught the value of work. What high school did not do was to help to get them a job following graduation. Less than one in ten said their school told them about a job opening, gave information about them to an employer, provided job placement service, and/or sent them for an interview. Approximately two-thirds said their high school did nothing.

The assistance the respondents acknowledged receiving from high school to get into their postsecondary educational programs and to obtain financial aid was of less importance or secondary to that received from other sources. One in five indicated one of the following gave the most assistance in obtaining financial aid: guidance department head or high school counselor or high school teacher or coach or high school administrator. School personnel were cited by just under one-fourth as providing the most help in getting into a postsecondary program.

STATUS AT THE TIME OF THE SURVEY: STUDY, WORK AND OTHER

The overwhelming majority of the respondents continued their education beyond high school. Seven out of ten were enrolled full-time or part-time in a postsecondary school. Some had completed short-term programs. Only one in ten did not further his/her education. Of those who did go on to postsecondary schooling, sixty percent did so at a four-year college or university.

One hundred and seventy-six schools, colleges, institutes, training centers, vocational schools, and universities were identified as places where 1282 of the respondents continued their education and/or training. Over half of these facilities were located out-of-state and were attended by one-fifth of the students. Just under half of these out-of-state schools were traditionally black institutions that were attended by three-fourths of the respondents enrolled in out-of-state schools. However, significant majority, four-fifths of all respondents in postsecondary programs attend or attended schools in Michigan. The largest percentage of

students attending any one school was 15% at Wayne State University, followed by 11% attending Wayne County Community College and 9% attending Michigan State University. Among out-of-state schools, Central State University in Ohio and Alabama State University each had 7% of the student enrollment. Tuskegee University followed with 6%.

Eighty percent of the students received some form of scholarship or financial aid. The most frequently cited by those in receipt of financial assistance were the Pell Grant (by 80% of the students), student loans (by 42%) and college work study (by 30%).

Over ninety percent of the respondents had held a job at sometime following graduation from high school. During the month of November, 1990, just under two-thirds were employed full- or part-time, but a majority of those not employed in November, 1990, were going to school. Two-fifths of the employed worked in Detroit, and just over one-fourth were working in the tri-county area beyond Detroit. Almost two-thirds were paid no more than $5.00 per hour. Some 70 job groupings were developed to categorize and describe the many jobs reported, with high concentrations of respondents working as cashiers (12%), clerks (11%), sales clerks (9%) and student assistants (9%).

While only two percent reported being married, 13% were parents. The oldest child for one-fifth of the parents was over two years old.

Four percent of the respondents were in the military service full-time.

EXAMINATION OF DIFFERENCES IN RESPONSE FREQUENCIES BY GENDER

Drawing on the response frequencies for female and male respondents that are displayed in the appendix and in the same format as used for the entire sample of respondents, i.e., statement of question as it appears on the survey instrument, followed by frequencies, the discussion below will enumerate differences infrequencies between the genders that are greater than a few percentage points.

HIGH SCHOOL EXPERIENCES

Curriculum and Program Participation

The curriculum profile of the genders are sufficiently different to require comment. Females are somewhat more likely to be in the college preparatory program (73% females, 68% males) and certainly in the co-op program (33% females, 18% males) than are males. Males on the other hand had nearly twice the proportion experiencing vocational/technical center program instruction (29% males, 16% females) and were more likely to have had special education (9% males 3% females) as well as bilingual program participation (4% males, 2% females). The disproportionate special education enrollments are a function of a

much greater concentrate of males in the Learning Disabled program, not withstanding the small number of subjects involved: 0.5% among females, 3.6% among males.

Vocational/Technical Program Participation

Widely differing proportions attending two of the vocational/technical centers is reflective of the programs offered. At the Breithaupt Center, with a concentration on auto mechanics, meat cutting and food service, the proportion of male respondents to female respondents was 27% to 5%. The Crockett Center specializing in nursing and cosmetology had attracted a higher proportion of females (43%) to males (15%). Both sets of percents are based on the number in each gender group who indicated participation in a vocational/technical center: 142 females, 100 males.

Preparation for Job Market

Twice the proportion of female respondents indicated their high school placed them on a job as part of a high school course as one way to help prepare for the job market (24% females, 13% males). This, however, may be a consequence of a greater proportion of females participating in co-op programs. Also 51% of the females as compared to 44% of the males circled involvement in a Career Day or Job Fair. A greater proportion of males (70%) than females (64%) said they were provided information about career options.

Hours Worked as Seniors

Males were more likely to have worked, on the average, more hours per week during the last year in high schools than females. Twenty-four percent of the males compared to 19% of the females averaged over 30 hours per week. Conversely, 19% of the female and 14% of the males said they averaged 18 hours or less per week.

School Subjects Helped in Present Status and Would Have Liked More Classes

The favoring of co-op experience among females and vocational/technical school courses among males manifests itself in picking subjects that they felt have helped them. Eight percent of the females and 2% of the males pick the former (co-op), while 13% of the males and 7 percent of the females pick the latter classes. In terms of wishing to have had more, the same low percent of females (2%) mirrors the male proportion (2%) concerning the co-op program. Regarding vocational/technical courses, there was a decrease in proportion in both gender groups, but the males maintained higher proportions (10% males, 5% females).

Be that as it may, the subjects identified by the females as most important for helping in their present situation were English (23%) business education (19%) and mathematics (16%). For males, there was a difference in priorities: mathematics (20%), English (18%) and business education (14%).

Subjects they would have wanted more classes were the same for both groups: computer classes (29% females, 21% males); business education (15% females, 16% males) and mathematics (13% females, 17% males).

Favored Teaching Methods

Differences in the proportions of females and males choosing each of the eleven teaching methods were at best slight. Two-fifths in both groups selected teacher/student discussions.

Areas Where More Help was Needed

Like-mindedness characterized female and male responses to the question of how school could have helped more, close to half in each group selected study habits and approximately a third in each group circled "planning for college or a job."

Grading the High Schools on Six Characteristics

The rankings of the six school characteristics according to the grades assigned them by the females and males varied slightly. Using the combined percents of "A" and "B" awards, the female ranking was the same as that for the total group. The males reversed the third and fourth ranking characteristics. By converting letter grades to numeric values, e.g., "A"=1, and computing mean scores, the resulting rankings remain essentially the same: school characteristics ranking first, second, fifth and sixth remain and are the same for both genders. The school characteristics that ranked third and fourth using the combined "A" and "B" percents switched positions in each gender's ranking when mean scores were computed and ranked.

Differences in the grades awarded by females and males to each school characteristic were not statistically significant. (See Table 17.)

Marital, Parental and Military Statuses

Two percent of the females and one percent of the males reported being married, but twice as many females as males were parents: 15% to 7%. Females were also more likely to have an oldest child that was older than two years: 23% to 10%.

The proportion of males in the military service full-time, 8%, far exceeded the proportion of females, 2%.

TABLE 17

Follow-up Study of 1989 Graduates
The Grading by Respondents of Their Respective High Schools
on Six School Characteristics
Mean Scores* and t-Test Values by Gender

School Characteristics	Gender	N	Score x	Score S.D.	F Value	2-Tail Prob.	t Value	Degrees of Freedom	2-Tail Prob.
Preparation Received from Courses Taken	F	1177	2.78	1.11					
	M	463	2.83	1.05	1.14	NS	0.91	1638	NS
Interest Shown Me by Staff	F	1179	2.58	1.09					
	M	465	2.51	1.07	1.04	NS	1.25	1642	NS
Instruction by High School Teachers	F	1178	2.37	0.93					
	M	465	2.33	0.91	1.04	NS	0.65	1641	NS
High School Counselor Services	F	1152	2.65	1.27					
	M	458	2.56	1.20	1.11	NS	1.30	1608	NS
High School Administrators' Administration	F	1145	3.04	1.12					
	M	455	2.96	1.12	1.00	NS	1.17	1598	NS
High School's Overall Quality	F	1145	2.62	0.95					
	M	455	2.56	0.98	1.07	NS	1.22	1598	NS

*The following conversions were used: "A"=1, "B"=2, "C"=3, "D"=4, "E"=5

EMPLOYMENT SINCE HIGH SCHOOL

Jobs Held in November, 1990

Over 90 percent in both gender groups had worked at some point since graduating high school. Employment status during November, 1990 was equally the same in both groups. Just over one-third in each group was employed. There were variations in the kinds of jobs held by each gender group. Female concentrations vis-a-vis male concentrations were found to exist in the following job grouping: accounting clerk (4%/1%); cashier (15%/3%); clerk (14%/4%); nurse aide (4%/1%); receptionist (3%/0%); student assistant (10%/6%); and sales clerk (11%/4%).

Male concentraions vis-a-vis female concentrations occurred in the following job groupings: custodian (1%/8%); cafeteria worker (2%/9%); cook (1%/6%); and stock person (1%/6%).

Hourly Rates of Pay

Males reported higher hourly pay rates. Twenty-five percent of the males reporting their income stated that their hourly rate was over $5.00 per hour. Only 15 percent of the females earned as much.

Locations of Jobs

There was a slightly higher proportion of females who were employed in Detroit vis-a-vis males: 42% to 38%.

Sources Used to Get Jobs

The profiles of sources used to get jobs for the two groups were similar save that males were more likely to identify a friend 18% to 13% among females and that the co-op coordinator was cited by more females (6%) than males (3%).

Reasons for Lack of Employment

Greater variation in response patterns emerged from the proportions choosing reasons for not being employed in November, 1990. A high percentage in both groups circled "going to school" but more so among males 75% than females 63% proportionately more females apparently had more difficulties with their work experiences with 17% as compared to 7% of the males having quit the job they had, as well as not finding work: 23% females as compared to 18% males. Family responsibilities were cited by higher proportions of females: 5% of the females and none of the males indicated they had lacked child care; 13% of the females and 2% of the males said they received ADC or welfare aid; and 6% of the females and 3% of the males chose health and family reasons per se. Eight percent of the females who answered this question said that they had been pregnant.

EDUCATION SINCE HIGH SCHOOL

Types of Enrollments

Roughly equal percents of females and males were enrolled full-time or part-time in an educational program, 71% females to 73% males. There was a slightly higher proportion of females who were "not now" attending school 18% to 14% of the males. This perhaps may be due to more females having completed shorter term programs. (See the discussion below.) There was a slightly greater proportion of males with no history of postsecondary school enrollment, 13% to 10% among females.

Reasons for not Being Enrolled

For those respondents, 23% of the females and 21% of the males, who were not enrolled at the time of the survey in an educational program and who answered the question of citing one reason for not being enrolled, 16% of the males in contrast to 5% of the females said that they lacked the time due to employment. Nineteen percent of the females had either begun a postsecondary school program but dropped out or had completed the program. Only 7 percent of the males had done one or the other. Six percent of the males in contrast to 2 percent of the females indicated a lack of interest in further schooling. Finally, 13 percent of the females reported being pregnant or a full-time homemaker.

Types of Educational Programs

The two types of educational programs where there were some minor enrollment differences in proportions between genders were in program that lasted less than one year, 14% females compared to 10% males, and in the 4-year college or university, 63% males in contrast to 58% females.

Financial Aid

Eighty-one percent of the females in comparison to 73% of the males responded "yes" to the question of did they receive scholarship or financial aid to continue their postsecondary education or training.

Person who Assisted the Most in Obtaining Financial Aid

The response profiles for the two gender groups were similar-one or two percentage point difference in responses per item, save that 6% of the males in contrast to 2% of the females indicated "high school teacher or coach" helped them the most in obtaining financial aid.

Types of Financial Aid

Female students were more often the recipients of Pell Grants (84% to 75%) and student loans (44% to 39%), while male students had higher proportions as recipients of State of Michigan Competitive Scholarships (12% to 8%) and athletic scholarships (7% to 2%).

Person who Provided the Most Help to Get into Program

Percents of female and male respondents choosing among response options were similar except that a somewhat larger percent of females (27% in comparison to 21% of the males) indicated that "no one but myself" was the most helpful.

Postsecondary Schools

Seventy-nine percent of the female respondents in contrast to 70 percent of the male respondents identified a postsecondary educational or training facility that they had or were currently attending. Eighty-two percent of the facilities identified by females were located in Michigan; whereas 74 percent identified by the males were in state. Of the 43 traditionally black institutions attended by the respondent sample, 86% of them found one or more female student in comparison to 58% among males attending traditionally black institutions. The majority of the students who had or were attending these schools of higher learning were females, 68 percent.

Michigan Schools

Michigan schools were disproportionately higher percent of the female sample vis-a-vis the male sample had or were attending were Detroit College of Business (8% to 3%) and Wayne State University (16% to 9%). There was only one school where the percent of the male sample was as large as three percentage points greater than the percent of the female sample and that was Wayne County Community College. Where both genders attended the same facility, the proportion in each gender group was roughly the same. Of the eighty Michigan schools identified, the female sample attended 68, the male sample attended 52. But then again, there were many more females than males in this sample: 768 males, 244 females.

Out-of-State Schools

With more out-of-state schools, 96, and fewer of the respondent sample attend them, 168 females and 87 males, the numbers and percents attending these schools in each gender group would perforce be small. Schools where the proportion of females attending was three or more percentage points greater than the proportion of males were Central State University (8% to 5%), Tuskegee (6% to 3%), and Wilberforce University (6% to 0%). The opposite was found at Alabama State University (9% to 5%), Florida A & M University (7% to 3%), and Prairie View A & M University (5% to 1 %).

SUMMARY OF DIFFERENCES BY GENDER

HIGH SCHOOL EXPERIENCES

Two-thirds or more were in the college preparatory curriculum with closer to three-fourths among females. Males were more likely to have had vocational/technical experiences, females, co-op program participation. The small proportions having had either special education

or bilingual program enrollment were more often male than female. Of the ten substantive job preparation activity options presented, on seven, 40% or greater in both genders acknowledged help. But with "being placed on the job as part of a high school job," twice the proportion of females to males agreed.

On only two of the choices offered to the question of what high school did to help the respondent get a job following graduation, did a substation of both gender groups respond. Two-thirds of the females indicated "nothing," six-tenths of the males did so. One-fourth of the males chose Career Day or Job Fair involvement; as well as did one-fifth of the females.

Males were more likely to have worked, on the average, more hours per week during the senior year than females.

Subjects chosen as most important for helping respondents in their present situation, by any appreciable percentage among both gender groups in varying percents, were English, business education and mathematics.

Subjects chosen that they would have wanted more classes were computer classes, business education and mathematics, again by both genders and in appreciable percents.

Two-fifths of females and males felt teacher/student discussions as a teaching method worked best for them.

One-third in both groups did not participate in an extra-curricular activity. But for those that did, three times or more of the males cited athletics as they did for any other activity. Decreasing percents of females chose career clubs, athletics and music.

Better than two-fifths, in each group, chose study habits and another one-third, in each group, chose planning for college or a job as the one area they would have liked their respective high schools to have helped them more.

The ratings of the two groups of six school characteristics were rather similar in the mean scores for each characteristic and the rankings of the six characteristics based either on mean of the rating scores or combined percents of "A" and "B" rating were largely the same.

While marital status for both females and males was essentially the same, there was a proportion of parents among the females and they were more likely to have a child that was more than two years old.

Full-time military service claimed more males than females.

EMPLOYMENT SINCE HIGH SCHOOL

The overwhelming majority had worked at some time since graduation. Over one-third were employed in November, 1990. Jobs with female concentration were accounting clerk, cashier, clerk, nurse aide, receptionist, student assistant, and sales clerk. Jobs with male concentration were custodian, cafeteria worker, cook, and stock person. Males received higher wages as measured by hourly rate of pay. There was a slightly higher proportion of females vis-a-vis males employed in Detroit. Females relied slightly more on the co-op coordinator's help in getting a job, males used a friend slightly more often. Otherwise, their profiles matched.

The majority answered that they were going to school as the reason for their lack of employment in November, 1990--males more so than females. Among the others, females indicated that they had experienced more difficulties on the job, had family responsibilities, were recipients of ADC or welfare assistance, in addition to being pregnant as reasons for being unemployed. While also cited by females, not being able to find work and transportation problem were two major reasons circled by males.

EDUCATION SINCE HIGH SCHOOL

Seven out of ten of both genders were enrolled either full- or part-time in an educational program. A slightly higher proportion of males had not been enrolled in any postsecondary educational program, and almost three times the proportion of males to females said they were not enrolled in school because they lacked the time due to employment--albeit the proportions were small. A slightly higher proportion of females said they were not enrolled in a postsecondary school program at the time they completed the survey, and among those not then enrolled, one-fifth of the females indicated that they had either begun a program and had dropped out or had completed one. Less than one-tenth of the males had done so. Over one-tenth of the females not enrolled cited pregnancy or full-time housekeeping as reasons.

Slightly higher proportions of males than females were enrolled in a 4-year college or university, roughly six out of ten, but slightly greater proportion of females had completed programs lasting less than one year, just over ten percent.

Four-fifths of the females and just under three-fourths of the males indicated that they had received scholarship or financial aid. Female students were more likely to have been the recipients of Pell grants; males were more likely to have received State of Michigan Competitive Scholarships and athletic scholarships. For both groups the three main assistance programs were the Pell Grant, Student Loans, and College Work Study.

Females were more likely to identify postsecondary facilities located in Michigan that they had or were attending. They were more likely to attend a traditionally black institution of higher learning both in terms of the distribution of enrollments in such schools vis-a-vis males and as a proportion of respondents enrolled.

The proportions of each gender group attending Michigan schools were approximately the same save for Detroit College of Business and Wayne State University that had slightly greater female proportions, and the opposite obtained at Wayne County Community College. For out-of-state postsecondary enrollments, females had higher proportions at Central State University, Tuskegee and Wilberforce University. Males reported larger proportions at Alabama State University, Florida A & M University and Prairie View A & M University.

CONCLUSIONS

THE SAMPLE

The caveat expressed in the 1988 graduates follow-up report applies to this study of 1989 graduates, to whit, the reported findings must be understood to reflect the attitudes and experiences of those graduates who responded with useable questionnaires, and secondly, the respondents are not a representative sample of the larger sample of graduates. There is sufficient evidence to warrant this conclusion. The respondents differed statistically significantly from the total sample of graduates on a number of key descriptor variables: they were more likely to be females (71% of the respondents. 60% of the graduates); younger (76% of the respondents, 69% of the graduates were born in 1971); to have scored at or above grade level on two California Achievement Tests (CAT) subtests (51% of the respondents, 43% of the graduates on the Reading subtests), (50% of the respondents, 41% of the graduates on the Mathematics subtests); and to have passed all three subtests of the High School Proficiency Examination (77% of the respondents, 70% of the graduates).

RESPONDENTS' DESCRIPTIONS OF HIGH SCHOOL EXPERIENCES

Over seventy percent of the respondents said they had been in the college preparatory curriculum. Just under a third had participated in a co-op program, and one in five had availed him/herself of programs offered at one of the vocational/technical centers.

One in five felt that English was the one school subject that had helped them the most in their present situation, with slightly lesser proportions identifying business education or mathematics. When asked what school subject they would have liked to have taken more of, one-fourth chose computer courses, and fewer picked business education (15%) or mathematics (14%).

Two-fifths favored teacher/student discussions as the best teaching method for them. Almost half would have liked their high school to help them more in study habits; one-third selected planning for college or a job. Asked to select one extra-curricular activity that has been most valuable, 18% selected athletics; 15%, career clubs; 10% music. One-third did not participate in extra-curricular activities.

Between approximately half and two-thirds agreed that their high school provided information about career options; taught them how to complete job applications, taught them interviewing skills, and the importance of getting along with others; and involved them in a

Career Day or Job Fair. Better than two-fifths said they were provided general job preparation skills and were taught the value of work. What high school did not do was to help to get them a job following graduation. Less than one in ten said their school told them about a job opening, gave information about them to an employer, provided job placement service, and/or sent them for an interview. Approximately two-thirds said their high school did nothing.

School personnel were cited by just under one-fourth as providing the most help in getting into a postsecondary educational program, and one in five indicated one of the following gave the most assistance in obtaining financial aid: guidance department head or high school counselor or high school teacher or coach or high school administrator.

STATUS AT THE TIME OF THE SURVEY

The overwhelming majority of the respondents continued their education beyond high school. Seven out of ten were enrolled full-time or part-time in a postsecondary school. Some had completed short-term programs. Only one in ten did not further his/her education. Of those who did go on to postsecondary schooling, sixty percent did so at a 4-year college or university.

One hundred seventy-six schools, colleges, institutes, training centers, vocational schools, and universities were identified as places where 1282 of the respondents continued their education and/or training. Over half of these facilities were located out-of-state and were attended by one-fifth of the students. Just under half of these out-of-state schools were traditionally black institutions that were attended by three-fourths of the respondents enrolled in out-of-state schools. However, a significant majority, four-fifths of all respondents in postsecondary educational programs attend or attended schools in Michigan. The largest percentage of students attending any one school was 15% at Wayne State University, followed by 11% attending Wayne County Community College and 9% attending Michigan State University. Among out-of-state schools, Central State University in Ohio and Alabama State University each had 7% of the student enrollment. Tuskegee University followed with 6%.

Eighty percent of the students received some form of scholarship or financial aid. The most frequently cited by those in receipt of financial assistance were the Pell Grant (by 80% of the students), student loans (by 42%) and college work study (by 30%).

Over ninety percent of the respondents had held a job at sometime following graduation. During the month of November, 1990, just under two-thirds were employed full- or part-time, but a majority of those not employed in November, 1990, were going to school. Two-fifths of the employed worked in Detroit, and just over one-fourth were working in the tri-county area beyond Detroit. Almost two-thirds were paid no more than $5.00 per hour. Some 70 job groupings were developed to categorize and describe the many jobs reported, with high concentrations of respondents working as cashiers (12%), clerks (11%), sales clerks (9%) and student assistants (9%).

While only two percent reported being married, 13% were parents. The oldest child for one-fifth of the parents was over two years old.

Four percent of the respondents were in the military service full-time.

EXAMINATION OF DIFFERENCES IN RESPONSE FREQUENCIES BY GENDER

Seventy-three percent of the female respondents as opposed to 68% of the males indicated they had been in the college preparatory curriculum. Males were more likely to have had vocational/technical experiences, females, co-op program participation. Of the ten substantive job preparation activity options presented, twice the proportion of females to males selected "being placed on the job as part of a high school job."

Males were more likely to have worked, on the average, more hours per week during the senior year than females.

Of those who participated in extra-curricular activities, three times or more of the males cited athletics over any other activity, while decreasing percents of females chose career clubs, athletics and music.

There was a larger proportion of parents among the females 15% in comparison to 7% among males, and females were more likely to have a child that was more than two years old.

Full-time military service claimed more males (8%) than females (2%).

Jobs with female concentration were accounting clerk, cashier, clerk, nurse aide, receptionist, student assistant, and sales clerk. Jobs with male concentration were custodian, cafeteria worker, cook, and stock person. Males received higher wages as measured by hourly rate of pay. There was a slightly higher proportion of females vis-a-vis males employed in Detroit. Females relied slightly more on the co-op coordinator's help in getting a job; males used a friend slightly more often.

Sixty-three percent of the males in contrast to 58% of the females were enrolled in a 4-year college or university, but 14% of the females in comparison to 10% of the males had completed programs lasting less than one year.

Eighty-one percent of the females but only 73% of the males indicated that they had received scholarships or financial aid. Female students were more likely to have been the recipients of Pell grants; males were more likely to have received State of Michigan Competitive Scholarships and athletic scholarships.

Females were more likely to identify postsecondary facilities located in Michigan that they had or were attending. They were more likely to attend a traditionally black institution of higher learning both in terms of the distribution of enrollments in such schools vis-a-vis males and as a proportion of respondents enrolled. Detroit College of Business and Wayne State University had slightly greater female proportions attending. The opposite obtained at Wayne County Community College. For out-of-state postsecondary enrollments, females had higher proportions at Central State University, Tuskegee and Wilberforce University.

Males reported larger proportions at Alabama State University, Florida A & M University and Prairie View A & M University.

RECOMMENDATIONS

1. The administration at each high school and special program facility should inform itself and the staff of the findings in this report, both city-wide and those pertaining to their school's graduates. It is important for the staff to be apprised of the respondents' perceptions of their high school experiences, and their postsecondary school and job experiences. The findings should provide information from which school-specific recommendations and implementation plans could be developed.

2. Efforts to recruit both females and males for the programs offered by the vocational/technical centers and the co-op programs should be continued with attention paid to possible gender bias in program selection.

3. Since the follow-up study of the 1982 graduates, the response rate for these seven surveys has average twenty-eight percent. However large this may be as the proportion of graduates responding, evidence suggests the respondents as a group have differed enough from the graduate sample so as to cast doubts on the representativeness of the respondents vis-a-vis the graduates. Thus, the finding in each survey cannot be used to draw inference beyond the respondents per se. In order to make inference to the entire graduating class with reasonable confidence, it appears that there is need to modify the methodology now in place.

   Given the usual constraints and limitations that operate when such surveys are undertaken, the following changes are recommended for future surveys. From the list of graduates, a random sample is drawn with replacements. A full length questionnaire is mailed to this sample of graduates. Those failing to respond within a reasonable period of time will be contacted to insure a response with the second mailing. The goal will be to fulfill this sample, using replacements where necessary. The majority of graduates not selected in the probability sample, will receive postcard type instruments that can easily and quickly be completed and returned.

ADDENDUM

In addition to the follow-up study report, a two volume Addendum displaying the response frequencies as separate listings for each school cohort has been published.

APPENDIX

TABLES A.1 THROUGH A.21

TABLE A.1

Follow-up Study of 1989 Graduates
Percents of Graduates and Respondents
Scoring Below or At or Above Grade Level
on the California Achievement Test,
Reading, Form E, Level 20

	Below Grade Level	At or Above Grade Level	(Number)
Graduates	57.3	42.7	(5097)
Respondents	48.8	51.2	(1247)
	(3528)	(2816)	(6344)

$X^2=29.20$ df=1 $P<.01$

TABLE A.2

Follow-up Study of 1989 Graduates
Percents of Graduates and Respondents
Scoring Below or At or Above Grade Level
on the California Achievement Test,
Mathematics, Form E, Level 20

	Below Grade Level	At or Above Grade Level	(Number)
Graduates	59.5	40.5	(5057)
Respondents	49.8	50.2	(1240)
	(3625)	(2872)	(6297)

$X^2=38.15$ df=1 $P<.01$

TABLE A.3

Follow-up Study of 1989 Graduates
Percents of Graduates and Respondents
by the Number of Content Areas Mastery was Attained
on the High School Proficiency Examination

	Number of Content Areas Mastery was Attained				
	All Three	Two	One	None	(Number)
Graduates	70.1	17.8	6.8	5.3	(7332)
Respondents	76.8	15.5	4.1	3.6	(1662)
	(6414)	(1563)	(566)	(451)	(8994)

$X^2=36.74$ df=3 P<.01

TABLE A.4

Follow-up Study of 1989 Graduates
Percents of Graduates and Respondents
Enrolled or Not Enrolled in the Free or
Reduced-Payment Lunch Program

	Enrolled	Not Enrolled	(Number)
Graduates	27.3	72.7	(7395)
Respondents	26.2	73.8	(1666)
	(2458)	(6603)	(9061)

$X^2$0.89 df=1 P=NS

TABLE A.5

Follow-up Study of 1989 Graduates
Percents of Female Graduates and Female Respondents
Scoring Below or At or Above Grade Level
on the California Achievement Test,
Reading, Form E, Level 20

Female	Below Grade Level	At or Above Grade Level	(Number)
Graduates	59.9	40.1	(3109)
Respondents	49.7	50.3	(899)
	(2310)	(1698)	(4008)

$X^2=29.30$ df=1 $P<.01$

TABLE A.6

Follow-up Study of 1989 Graduates
Percents of Female Graduates and Female Respondents
Scoring Below or At or Above Grade Level
on the California Achievement Test,
Mathematics, Form E, Level 20

Female	Below Grade Level	At or Above Grade Level	(Number)
Graduates	61.0	39.0	(3087)
Respondents	50.8	49.2	(888)
	(2333)	(1642)	(3975)

$X^2=29.04$ df=1 $P<.01$

TABLE A.7

Follow-up Study of 1989 Graduates
Percents of Female Graduates and Female Respondents
by the Number of Content Areas Mastery was Attained
on the High School Proficiency Examination

Female	Number of Content Areas Mastery was Attained: All Three	Two	One	None	(Number)
Graduates	70.4	19.0	6.2	4.4	(4376)
Respondents	77.4	16.1	3.6	2.6	(1189)
	(4000)	(1023)	(316)	(226)	(5565)

$X^2=26.75$ df=3 P<.01

TABLE A.8

Follow-up Study of 1989 Graduates
Percents of Female Graduates and Female Respondents
Enrolled or Not Enrolled in the Free or
Reduced-Payment Lunch Program

Female	Enrolled	Not Enrolled	(Number)
Graduates	29.6	70.4	(4399)
Respondents	27.3	72.7	(1190)
	(1628)	(3961)	(5589)

$X^2=2.31$ df=1 P=NS

TABLE A.9

Follow-up Study of 1989 Graduates
Percents of Male Graduates and Male Respondents
Scoring Below or At or Above Grade Level
on the California Achievement Test,
Reading, Form E, Level 20

Male	Below Grade Level	At or Above Grade Level	(Number)
Graduates	53.2	46.8	(1988)
Respondents	46.3	53.7	(348)
	(1218)	(1118)	(2336)

$X^2=5.39$ df=1 $P<.02$

TABLE A.10

Follow-up Study of 1989 Graduates
Percents of Male Graduates and Male Respondents
Scoring Below or At or Above Grade Level
on the California Achievement Test,
Mathematics, Form E, Level 20

Male	Below Grade Level	At or Above Grade Level	(Number)
Graduates	57.2	42.8	(1970)
Respondents	47.2	52.8	(352)
	(1292)	(1030)	(2322)

$X^2=11.69$ df=1 $P<.01$

TABLE A.11

Follow-up Study of 1989 Graduates
Percents of Male Graduates and Male Respondents
by the Number of Content Areas Mastery was Attained
on the High School Proficiency Examination

Male	Number of Content Areas Mastery was Attained: All Three	Two	One	None	(Number)
Graduates	69.6	16.0	7.6	6.8	(2956)
Respondents	75.5	14.0	5.3	5.3	(473)
	(2414)	(540)	(250)	(225)	(3429)

$X^2=7.52$ df=3 P=NS

TABLE A.12

Follow-up Study of 1989 Graduates
Percents of Male Graduates and Male Respondents
Enrolled or Not Enrolled in the Free or
Reduced-Payment Lunch Program

Male	Enrolled	Not Enrolled	(Number)
Graduates	24.0	76.0	(2996)
Respondents	23.3	76.7	(476)
	(830)	(2642)	(3472)

$X^2=0.07$ df=1 P=NS

TABLE A.13

Follow-up Study of 1989 Graduates
Percents of Female Respondents and Male Respondents
Scoring Below or At or Above Grade Level
on the California Achievement Test,
Reading, Form E, Level 20

Respondents	Below Grade Level	At or Above Grade Level	(Number)
Female	49.7	50.3	(899)
Male	46.3	53.7	(348)
	(608)	(639)	(1247)

$X^2 = 1.07$ df=1 $P < .01$

TABLE A.14

Follow-up Study of 1989 Graduates
Percents of Female Respondents and Male Respondents
Scoring Below or At or Above Grade Level
on the California Achievement Test,
Mathematics, Form E, Level 20

Respondents	Below Grade Level	At or Above Grade Level	(Number)
Female	50.8	49.2	(888)
Male	47.2	52.8	(352)
	(617)	(623)	(1240)

$X^2 = 1.19$ df=1 $P < .01$

TABLE A.15

Follow-up Study of 1989 Graduates
Percents of Female Respondents and Male Respondents
by the Number of Content Areas Mastery was Attained
on the High School Proficiency Examination

Respondents	Number of Content Areas Mastery was Attained: All Three	Two	One	None	(Number)
Female	77.4	16.1	3.6	2.6	(1187)
Male	75.5	14.0	5.3	5.3	(475)
	(1277)	(257)	(68)	(60)	(1662)

$X^2=8.58$ df=3 P=.04

TABLE A.16

Follow-up Study of 1989 Graduates
Percents of Female Respondents and Male Respondents
Enrolled or Not Enrolled in the Free or
Reduced-Payment Lunch Program

Respondents	Enrolled	Not Enrolled	(Number)
Female	27.3	72.7	(1190)
Male	23.3	76.7	(476)
	(436)	(1230)	(1666)

$X^2=2.60$ df=1 P=NS

TABLE A.17

Follow-up Study of 1989 Graduates
Percents of Female Graduates and Male Graduates
Scoring Below or At or Above Grade Level
on the California Achievement Test,
Reading, Form E, Level 20

Graduates	Below Grade Level	At or Above Grade Level	(Number)
Female	59.9	40.1	(3109)
Male	53.2	46.8	(1988)
	(2920)	(2177)	(5097)

$X^2=22.33$ df=1 $P<.01$

TABLE A.18

Follow-up Study of 1989 Graduates
Percents of Female Graduates and Male Graduates
Scoring Below or At or Above Grade Level
on the California Achievement Test,
Mathematics, Form E, Level 20

Graduates	Below Grade Level	At or Above Grade Level	(Number)
Female	61.0	39.2	(3087)
Male	57.2	42.8	(1970)
	(3008)	(2049)	(5097)

$X^2=7.08$ df=1 $P=.01$

TABLE A.19

Follow-up Study of 1989 Graduates
Percents of Female Graduates and Male Graduates
by the Number of Content Areas Mastery was Attained
on the High School Proficiency Examination

Graduates	Number of Content Areas Mastery was Attained: All Three	Two	One	None	(Number)
Female	70.4	19.0	6.2	4.4	(4376)
Male	69.6	16.0	7.6	6.8	(2956)
	(5137)	(1306)	(496)	(391)	(1662)

$X^2=32.91$ df=3 P=.01

TABLE A.20

Follow-up Study of 1989 Graduates
Percents of Female Graduates and Male Graduates
Enrolled or Not Enrolled in the Free or
Reduced-Payment Lunch Program

Graduates	Enrolled	Not Enrolled	(Number)
Female	29.6	70.4	(4399)
Male	24.0	76.0	(2996)
	(2022)	(5373)	(7395)

$X^2=28.07$ df=1 P<.01

TABLE A.21

Follow-up Study of 1989 Graduates
Number and Percent of Respondents
Attending Traditionally Black Institutions

Name of School	Respondents Attending (Number)	Percent
Alabama A & M University	10	5.2
Alabama State University	17	8.8
Allen University (SC)	1	0.5
Bethune-Cookman College (FL)	2	1.0
Central State University (OH)	18	9.3
Cheyney University of Pennsylvania	1	0.5
Clark College (GA)	5	2.6
Delaware State College	2	1.0
Fisk University (TN)	2	1.0
Florida A & M University	11	5.7
Florida Memorial College	2	1.0
Fort Valley State College (GA)	1	0.5
Grambling State University (LA)	6	3.1
Hampton University (VA)	12	6.2
Howard University (DC)	7	3.6
Jackson State University (MS)	5	2.6
Johnson-C. Smith University (NC)	2	1.0
Kentucky State University	6	3.1
Knoxville College (TN)	6	3.1
Lane College (TN)	3	1.5
Langston University (OK)	1	0.5

TABLE A.21 (Cont'd)

Name of School	Respondents Attending (Number)	Percent
Lincoln University (MO)	4	2.1
Mary Holmes College (MS)	1	0.5
Morehouse College (GA)	5	2.6
Morris Brown College (GA)	2	1.0
Morris College (SC)	1	0.5
North Carolina A & T State University	2	1.0
Paine College (GA)	1	0.5
Prairie View A & M University (TX)	6	3.1
Rust College (MS)	1	0.5
Savannah State College (GA)	1	0.5
Southern University A & M College (LA)	5	2.6
Spelman College (GA)	3	1.5
Saint Augustine's College (NC)	1	0.5
Saint Paul's College (VA)	1	0.5
Stillman College (AL)	1	0.5
Tennessee State University	9	4.6
Texas College	1	0.5
Texas Southern University	1	0.5
Tuskegee University (AL)	15	7.7
University of Arkansas a Pine Bluff	2	1.0
Wilberforce University (OH)	10	5.0
Xavier University of Louisiana	1	0.5
	(N=194)	99.7

THE DISTRIBUTION OF RESPONSES OF THE 1989 GRADUATES SURVEYED

TOTAL SAMPLE

(N=1687)

While you were in high school, were you in a —
(Questions 1-5)

		Percent Choosing	(N)*
1.	College preparatory curriculum?	71.6	(1515)
2.	Vocational/Technical Center?	19.9	(1292)
3.	Co-op program?	29.0	(1298)
4.	Special education program?	5.1	(1203)
5.	Program for bilingual students?	2.3	(1183)

If you attended a Vocational/Technical Center, CIRCLE ALL THAT YOU ATTENDED.
(Question 6)

		Percent Choosing
1.	Breithaupt	13.7
2.	Crockett	31.5
3.	Golightly	26.2
4.	Randolph	30.2

(N=248)

*Total number responding.

What did your high school do to help you prepare for the job market? Answer this item even if you are not currently employed. **CIRCLE ALL THAT APPLY.**

(Question 7)

		Percent Choosing
1.	Taught me how to complete job applications	60.3
2.	Taught me interview skills	54.7
3.	Placed me on a job as part of a high school course	20.9
4.	Trained me for a specific job	15.5
5.	Provided information about career options	65.7
6.	Provided general job preparation skills	45.7
7.	Taught me the value of work	44.1
8.	Helped me find after-school work which was part of a high school class	13.9
9.	Taught me the importance of getting along with others	47.5
10.	Involved me in a Career Day or Job Fair	48.7
11.	Nothing	9.3
12.	Other	5.9

(N=1641)

What did your high school do to help you to get a job after graduation? Answer this item even if you are not currently employed. **CIRCLE ALL THAT APPLY.**

(Question 8)

		Percent Choosing
1.	Told me about a job opening	8.7
2.	Sent me for an interview	5.4
3.	Provided job placement service	6.7
4.	Involved me in a Career Day or Job Fair	21.3
5.	Gave information about me to an employer	7.0
6.	Nothing	64.8
7.	Other	5.7

(N=1589)

TOTAL SAMPLE/61

If you worked during your last year in high school, enter the average number of hours you worked per week _____.

(Question 9)

Average Hours Worked	Percent Choosing
1. 10 hours or less	4.5
2. 11 to 18 hours	12.5
3. 19 to 30 hours	62.8
4. 31 to 40 hours	19.1
5. Over 40 hours	1.1

(N=1125)

From the following list of school subjects, **WHICH ONE** has helped you the most in your present situation?

(Question 10 -- see below)

From the same list, **PICK THE ONE SUBJECT** in which you would have liked to have taken more classes.

(Question 11)

	Percent Choosing Quest. 10	Quest. 11
1. Art	1.2	3.0
2. Business	17.5	15.2
3. Career Guidance	2.6	3.5
4. Computer Courses	6.9	26.8
5. Co-op	6.7	2.2
6. English	21.7	6.1
7. Foreign Languages	0.9	5.4
8. Home Economics	2.2	2.9
9. Industrial Arts	0.6	0.6
10. JROTC	2.3	0.9
11. Mathematics	17.0	13.8
12. Music	2.0	3.3
13. Physical Education/Athletics	2.5	0.9
14. Science	5.5	6.4
15. Social Studies	1.9	2.2
16. Voc/Tech School Courses	8.6	6.7
	(N=1532)	(N=1620)

From the following list of teaching methods, **WHICH ONE** worked best for you while you were in high school?

(Question 12)

		Percent Choosing
1.	Field trips	1.7
2.	Independent study	12.5
3.	Student/Student discussions	8.1
4.	Teacher lectures	12.3
5.	Teaching machines	1.0
6.	Teacher discussions	42.4
7.	Tutoring	2.2
8.	Use of computers	9.0
9.	Use of video/films	0.6
10.	Work in labs	5.5
11.	Work on projects	4.7

(N=1583)

Which **ONE** extra-curricular activity has been the most valuable for you?

(Question 13)

		Percent Choosing
1.	Academic clubs such as science clubs	7.7
2.	Athletics	17.7
3.	Dramatics, debate	4.1
4.	Music	10.0
5.	Junior Achievement	6.5
6.	Student Council	4.7
7.	Career Clubs such as Future Teachers, DECA, etc.	14.9
8.	Did not participate	35.0

(N=1622)

In which **ONE area** would you have liked your high school to help you more?

(Question 14)

		Percent Choosing
1.	Thinking skills	7.6
2.	Study habits	45.2
3.	Interpersonal skills	4.6
4.	Practical living skills	5.8
5.	Selecting high school courses	3.3
6.	Planning for college or a job	33.4

(N=1577)

TOTAL SAMPLE/63

Students are often given the grades A, B, C, D or E to describe the quality of their work. Use this A, B, C, D or E grading scale to answer Items 15-20. **CIRCLE YOUR CHOICE.**

THINKING BACK OVER YOUR HIGH SCHOOL YEARS, WHAT GRADE WOULD YOU GIVE TO THE—

(Questions 15 to 20)

	Percent Choosing				
	A	B	C	D	E
15. Preparation you received from your high school courses for what you are doing now?	11.8	28.4	36.9	14.3	8.6 (N=1660)
16. Interest shown in you by the high school staff?	16.3	35.3	30.7	11.5	6.2 (N=1664)
17. Instruction provided by your high school teachers?	17.0	42.6	30.7	7.6	2.2 (N=1663)
18. Services provided by your high school counselors?	22.9	26.0	27.4	13.9	9.9 (N=1630)
19. Administration of the school provided by the principal, assistant principal, and other administrators?	9.1	23.2	36.3	19.7	11.7 (N=1620)
20. Overall quality of your high school?	11.5	35.2	39.0	10.5	3.9 (N=1620)

What is your marital status?

(Question 21)

	Percent Choosing
1. Single	97.8
2. Married	2.2

(N=1633)

TOTAL SAMPLE/64

Do you have any children?

(Question 22)

	Percent Choosing
1. Yes	12.7
2. No	87.3

(N=1633)

If you have children, how old is your oldest?

(Question 23)

	Percent Choosing
1. Less than one year	46.0
2. One to two years	33.3
3. Older than two years	20.7

(N=213)

Which one of the following statements best describes you now?

(Question 24)

	Percent Choosing
1. I am in the military service FULL-TIME.	3.8
2. I am in a PART-TIME National Guard program.	1.6
3. I am not in a military program.	94.7

(N=1675)

Have you been employed at any time since graduating from high school?

(Question 25)

	Percent Choosing
1. Yes	91.7
2. No	8.3

(N=1586)

TOTAL SAMPLE/65

Which one of the following statements is the best description of your status DURING THE MONTH OF NOVEMBER, 1990? CIRCLE ONLY ONE.

(Question 26)

	Percent Choosing
1. I was employed FULL-TIME.	25.1
2. I was employed PART-TIME.	37.1
3. I was NOT EMPLOYED.	37.3

(N=1566)

If you WERE EMPLOYED FULL-TIME OR PART-TIME in NOVEMBER, 1990, answer Items 27-32.

What was your job title? _____

(Question 27)

Briefly describe what you did on the job. _____

(Question 28)

List the name of the company or organization. _____

(Question 29)

Code	Job Groupings[22]	Respondents Reporting Jobs Number	Percent
1.	**ACCOUNTING CLERK**,[23] Bookkeeper, Processing Teller, Inventory Control Person, Auditor, Accounts Payable Clerk, Accounts Receivable Clerk, Accountant	26	3.2
3.	**AUTO MECHANIC**	2	0.2
4.	**AIDE**, Home Health Aide, Lunch Room Aide, Health Care Worker	9	1.4
5.	Assembler, Auto Assembler, Bench Assembler, **FACTORY WORKER**, Production Operator, Press Operator, "Work with big machines"	17	2.1
6.	**ASSISTANT MANAGER**, Office Assistant Manager, Jewelry Store Assistant Manager	13	1.6

[22]Responses to Questions 27-29 were used to establish job titles, to create job groupings and to assign jobs to groupings.

[23]The job title displayed in upper case bold letters typifies the kinds of jobs included within the job grouping.

TOTAL SAMPLE/66

Code	Job Groupings	Respondents Reporting Jobs Number	Percent
8.	**AUDIO-VISUAL TECHNICIAN**, Video Duplicator, Cable Installer	4	0.5
9.	**SUPERMARKET BAGGER**, Bagger-Stocker	2	0.2
10.	Building Maintenance Worker, **CUSTODIAN**, Porter, Janitor, Laundry Aide, Cleaner, Room Attendant, Facilities Attendant	26	3.2
11.	**BUTCHER ASSISTANT**, Meat Cutter	2	0.2
12.	**CAB DRIVER**, Truck Driver	2	0.2
13.	**CAFETERIA WORKER**, Busboy, Cash-Bar Attendant, Dishwasher, Food Service Worker, Baker Helper, Pre-Cook Worker, Donut Finisher	28	3.4
14.	**CARPENTER**, Roofer	2	0.2
15.	**CASHIER**, Cashier-Stocker, Cashier-Cook, Cashier-Salad Maker, Cashier-Sales, Lottery Cashier, Cashier-Hostess	99	12.1
16.	**CATERER**	1	0.1
17.	**CHILD CARE ASSISTANT**	1	0.1
18.	**CLERK**, Clerical Aide, Clerical Assistant, Clerk Typist, Desk Clerk, Records Clerk, Insurance Clerk, Microfilm Clerk, Tax File Clerk, Office Aide, Shipping Clerk, Claims Processor, Renewal Processor, Utility Clerk	91	11.2
19.	**COACH**, Assistant Coach	2	0.2
20.	**COMMUNITY WORKER**	1	0.1
21.	**CONSTRUCTION WORKER**, Laborer, Road Maintenance Assistant	7	0.9
22.	**COOK**, Chef, Cook-Shift Manager	18	2.2
23.	**CO-OP**, [GM; Ford MC], Trainee	3	0.4

TOTAL SAMPLE/67

Code	Job Groupings	Respondents Reporting Jobs Number	Percent
24.	**COSMETOLOGIST**, Ma[illegible]rist, "Clip and bathe dogs and cats"	4	0.5
25.	**COUNSELOR**, Youth Counselor	2	0.2
26.	Customer Representative, Sales Representative, **CUSTOMER SERVICE**	10	1.2
27.	Day Care Worker, **BABY SITTER**, Foster Care Worker	8	1.0
28.	**DENTAL ASSISTANT**, Dental Assistant Trainee	3	0.4
29.	**DIETARY AIDE**, Dietary Aide Assistant	7	0.9
31.	**ELECTRICAL CONTRACTOR**	1	0.1
33.	**ELECTRICIAN**	2	0.2
34.	Equipment Service Person, **REPAIRMAN**	2	0.2
35.	**FAST FOOD WORKER**, Crew Member, Crew Person, Slicer Operator, Trainer Unit. Crew Trainer	15	1.8
36.	**FORK LIFT DRIVER**, High-Low Driver	2	0.2
37.	Glass Cutter, **GLAZER**	2	0.2
38.	**HEATING AND COOLING SPECIALIST**	1	0.1
39.	**COMPUTER AIDE**, Computer Lab Assistant, Computer Operator, Data Input Operator, CRT Operator, Data Processor-Programmer, Terminal Operator. Key-punch Operator	22	2.7
40.	**INTERIOR DESIGN ASSISTANT**	1	0.1
41.	**LAB TECHNICIAN** [Medical]	3	0.4
43.	**LAYOUT MAN**	1	0.1
44.	**LETTER CARRIER**, Mail Carrier, Post Office Distribution Clerk [U.S. Mail]	5	0.6
45.	Librarian, **LIBRARIAN ASSISTANT**, Library Clerk	6	0.7

TOTAL SAMPLE/68

Code	Job Groupings	Respondents Reporting Jobs Number	Percent
46.	**LIFEGUARD**, Pool Guard	6	0.7
47.	**MACHINE OPERATOR**, Machinist, Press Operator	4	0.5
48.	Mail Clerk, **MAILROOM CLERK**, Mail Sorter, Mail Coordinator, Mail and Receiving Clerk, Sorter [UPS]	12	1.5
49.	**MANAGER**, Manager-in-Training, Warehouse Manager, Weight Room Manager, Office Manager, Service Desk Manager	13	1.6
50.	**METER MAID**	1	0.1
51.	**MUSIC ARRANGER**	1	0.1
52.	**NURSE AIDE**, Nurse Assistant, Nurse Trainee, Nurse Technician, Emergency Room Technician, Medical Assistant, Therapist	27	3.3
53.	Packer, **PACKAGES**, Box Packer	11	1.3
54.	**PHARMACY TECHNICIAN**	2	0.2
55.	**PHOTOGRAPHER**, Studio Photographer	2	0.2
56.	**RECEPTIONIST**, Auto Center Greeter, Desk Receptionist, Medical Receptionist	21	2.6
57.	**RECREATION AIDE**, Facilities Attendant, Public Service Attendant	5	0.6
58.	Resident Advisor, Minority Aide-Live-In, Student Mentor, Student Advisor, Reservationist, **STUDENT ASSISTANT**, Dorm Guard, Research Assistant, Old Exam File Clerk, Faculty Assistant, Department Aide	71	8.7
59.	**SALES CLERK**, Sales and Marketing Clerk, Retail Clerk, Counter Clerk, Floor Clerk, Floor Girl, Concessionist, Sales Representative, Sales Person, Sales Fashion Consultant, Sales-Cashier	72	8.8

TOTAL SAMPLE/69

Code	Job Groupings	Respondents Reporting Jobs Number	Percent
60.	**SECRETARY**, Secretarial Assistant, Executive Secretary, Legal Secretary, Assistant Secretary, Credit Counseling Secretary	23	2.8
61.	**STOCK PERSON**, Stock Boy, Midnight Stock Person, Transfer Loader, Textbook Worker	18	2.2
62.	**SUPERVISOR** Crew, Shift Supervisor, Plan Supervisor	3	0.4
63.	**SURVEYOR**	1	0.1
64.	**SWITCHBOARD OPERATOR**, Telephone Operator	3	0.4
65.	**TEACHER ASSISTANT**, Teacher Aide, Pre-School Teacher, Reading Tutor, Math Tutor, Student Teacher Helper	17	2.1
66.	**TELEMARKETER**, Telecommunicator-Sales, Caller, Interviewer, Phone Worker-Solicitor, Urban Marketer, Census Enumerator	19	2.3
67.	**TICKET CHECKER**, Ticket Taker, Usher	4	0.5
68.	**TYPESETTER**	1	0.1
69.	**WAITER**, Waitress, Apprentice Waiter, Food Server, Hostess	10	1.2
70.	**WORKSHOP FACILITATOR**	1	0.1
71.	**VALET** [Parks cars]	1	0.1
72.	**SECURITY**, Security Guard, Security Officer, Night Security, Store Detective	10	1.2
73.	**PLUMBER APPRENTICE**	1	0.1
74.	**RAG CUTTER**	1	0.1
75.	**CANNONEER** [U.S. Army]	1	0.1
		(N=815)	100.0

TOTAL SAMPLE/70

How much did you earn? What was your hourly rate of pay?
(Question 30)

Average Hourly Rate of Pay	Percent Choosing
1. Less than $3.80	2.0
2. $3.80 to $4.25	30.8
3. $4.26 to $5.00	31.7
4. $5.01 to $6.00	17.5
5. $6.01 to $7.00	8.0
6. $7.01 to $8.00	4.7
7. Over $8.00	5.4

(N=890)

Where did you work in November, 1990? **CIRCLE ONLY ONE.**
(Question 31)

	Percent Choosing
1. In Detroit	41.4
2. Not in Detroit but in Wayne, Oakland or Macomb County	27.8
3. Elsewhere in Michigan	21.4
4. Not in Michigan	9.4

(N=976)

Who gave you the greatest assistance in getting the job? **CIRCLE ONLY ONE.**
(Question 32)

	Percent Choosing
1. High school counselor	1.5
2. Guidance department head	0.6
3. High school teacher	1.4
4. Co-op coordinator	5.5
5. Friend	14.0
6. Parent or other relative	19.4
7. Vocational/Technical school placement office staff	4.4
8. Regular high school placement office staff	0.5
9. Member of church group or other organization to which you belong	1.0
10. Employer	3.2
11. Media such as TV, newspapers, radio, etc.	2.7
12. No one but myself	36.9
13. Other	8.8

(N=999)

TOTAL SAMPLE/71

If you were **NOT EMPLOYED** in November, 1990, which of the following reasons describe why you were not. If you **WERE EMPLOYED**, skip to Item 34. **CIRCLE ALL THAT APPLY.**

(Question 33)

		Percent Choosing
1.	Had never been employed	3.6
2.	Laid off from the job I had	6.4
3.	Quit the job I had	14.5
4.	Fired from the job I had	2.1
5.	Going to school	65.8
6.	Received ADC or welfare aid	10.4
7.	Pregnant	6.1
8.	Lacked child care	3.5
9.	Health or family reasons	5.4
10.	Looked but couldn't find work	21.7
11.	Had given up looking for work	3.3
12.	Lacked schooling or necessary training	5.1
13.	Transportation problems	13.3
14.	Other	5.3

(N=608)

Which one of the following statements best describes you now? **CIRCLE ONLY ONE.**

(Question 34)

		Percent Choosing
1.	I am ENROLLED FULL-TIME in an educational program.	57.6
2.	I am ENROLLED PART-TIME in an educational program.	14.0
3.	I am NOT NOW enrolled in an educational program.	17.1
4.	I have not been enrolled in any educational program since graduating from high school.	11.3

(N=1511)

TOTAL SAMPLE/72

If you are **NOT CURRENTLY ENROLLED** in a post high school educational program, what is the main reason? If you are continuing your education, or you have completed the program you were in, **SKIP** this item. **CIRCLE ONLY ONE.**

(Question 35)

		Percent Choosing
1.	Began in a school or training program, but dropped out	9.5
2.	Have completed a post-high school program	6.4
3.	Personal choice	5.3
4.	Not interested	2.7
5.	Applied but not accepted	1.9
6.	Decided to wait	13.3
7.	Have applied, waiting for acceptance	10.6
8.	Lack of money	21.0
9.	Lack of time due to employment	8.2
10.	Pregnant or a full-time homemaker	9.0
11.	In military service	1.9
12.	Looking for a school to meet my needs	6.1
13.	Other	4.2

(N=377)

IF YOU ARE NOW OR WERE PREVIOUSLY ENROLLED IN AN EDUCATION PROGRAM, PLEASE COMPLETE THE ADDITIONAL SURVEY ITEMS. If you have NOT attended a school since high school graduation, skip to Item 44.

What type of program were you, or are you now, enrolled in? **CIRCLE ONLY ONE.**

(Question 36)

		Percent Choosing
1.	A course of study or program that lasted less than one year	12.5
2.	1-year college vocational-technical or business program	2.7
3.	2-year college vocational-technical or business program	12.7
4.	2-year college liberal arts program	11.9
5.	4-year college or university	59.5
6.	Other	0.7

(N=1378)

Enter the cumulative grade point average you have earned at the school you now attend. If you completed a program or course of study, enter your final GPA.

(Question 37)

Responses to this question were not recorded into a data file, and thus could not be tabulated for presentation in this report. This does not preclude the recording and analysis of these responses at some future date.

TOTAL SAMPLE/73

What types of remedial classes did you take in your post-high school educational program? **CIRCLE ALL THAT APPLY.**

(Question 38)

Responses to this question were not tabulated. There was a tendency by far too great a proportion of respondents to list their current class titles in addition to or instead of circling the remedial classes provided.

Have you received scholarship or financial aid to attend a school or program since graduating from high school?

(Question 39)

	Percent Choosing
1. Yes	79.2
2. No	20.8

(N=1362)

If you answered "yes" to Number 39, who assisted you the most in obtaining your financial aid? If you answered "no" to Number 39, skip this item. **CIRCLE ONLY ONE.**

(Question 40)

	Percent Choosing
1. College financial aid representative	32.1
2. Member of a college department such as athletics, music, science, etc.	3.2
3. Parent or other relative	26.4
4. Friend	2.7
5. Guidance department head	4.8
6. High school counselor	10.3
7. High school teacher or coach	2.6
8. High school administrator	1.1
9. Member of a church group or other social organization	1.0
10. Military recruiter	0.3
11. No one but myself	13.0
12. Other	2.5

(N=1029)

If you answered "yes" to Number 39, what types of financial aid have you received? **CIRCLE ALL THAT APPLY.**

(Question 41)

		Percent Choosing
1.	Pell Grant	81.7
2.	State of Michigan Competitive Scholarship	9.1
3.	State of Michigan Tuition Grant	17.4
4.	National Merit Scholarship	1.3
5.	National Achievement Scholarship	0.9
6.	Athletic Scholarship	3.0
7.	College/School Scholarship	17.4
8.	Private-Institutional Scholarship	9.8
9.	Veteran Benefits	0.8
10.	Student loans	42.4
11.	College Work Study (CWS)	30.0
12.	Others	13.3

(N=1084)

Of all the people who helped you get into your post-high school educational program, who would you say gave you the **MOST** help? **CIRCLE ONLY ONE.**

(Question 42)

		Percent Choosing
1.	High school counselor	12.8
2.	High school guidance department head	3.0
3.	Parent or other relative	37.7
4.	Friend	3.8
5.	College placement office staff or admissions official	5.9
6.	Member of a church or other organization to which you belong	0.5
7.	Vocational/Technical Center staff	1.5
8.	High school teacher	5.3
9.	Member of a college department such as athletic, music, science, etc.	1.3
10.	No one but myself	25.9
11.	Other	2.3

(N=1315)

Look on the last page of this survey. Find the name of the school you are attending or attended. **CIRCLE THE NUMBER OF YOUR SCHOOL.**

If your school is not listed, enter the name in the space provided.
(Question 43)

Respondents Who Had Attended or Were Attending Schools Located in Michigan

School Code	Name of School	Number	Percent
9128	Academy of Health Careers, Inc.	1	.1
1000	Academy of Court Reporting	1	.1
1001	Adrian College	1	.1
1005	Adult Career Training,*[24]	19	1.9
9101	Adult Education, Detroit Public Schools*	11	1.1
9102	Adult Education, Other School Districts*	5	.5
1007	Albion College	1	.1
9106	American Career Academy	2	.2
1018	Aquinas College	4	.4
1030	Cambridge Business*	1	.1
1035	Center for Creative Studies	4	.4
1106	Central Michigan University	8	.8
9107	Concorde Career Institute	1	.1
1020	Control Data Institute	3	.3
9108	CYTCIP Computer Skills Training Center	2	.2
1040	Detroit Business Institute	7	.7
1181	Detroit College of Business	65	6.4
1045	Detroit Institute of Commerce	2	.2
9110	Detroit Job Corps Center*	2	.2
1050	DeVry Institute of Technology	1	.1
1055	Dorsey Business School, Inc.	2	.2
1201	Eastern Michigan University	33	3.2
1222	Ferris State University	24	2.3
9109	Focus:Hope Machinist Training Ins.	5	.5
1246	GMI Engineering & Management Institute	3	.3
9129	Goodwill Industries*	1	.1
9113	Grand Rapids Job Corps*	1	.1
1254	Grand Rapids Junior College	1	.1
1258	Grand Valley State University	7	.7
1293	Henry Ford Community College	55	5.4
3177	Henry Ford Hospital	1	.1
1294	Highland Park Community College	6	1.6

[24]An (*) is used to denote Michigan schools and training centers not listed in Michigan State Board of Education, Michigan Department of Education, 1989-90 Michigan Postsecondary Admissions and Financial Assistance Handbook, October, 1989.

TOTAL SAMPLE/76

School Code	Name of School	Number	Percent
1070	IBA State College of Beauty*	1	.1
1075	ITT Technical Institute	4	.4
1952	Jordan College	5	.5
1378	Kalamazoo Valley Community College	1	.1
1376	Kendall College of Art and Design	1	.1
9114	Krainz Woods Academy of Medical Laboratories	1	.2
1414	Lansing Community College	1	.1
1399	Lawrence Technological University	7	.7
1080	Lawton School	7	.7
1425	Lewis College of Business	24	2.3
1521	Macomb Community College	14	1.4
1437	Madonna College	2	.2
9116	Marketwise*	1	.1
1452	Marygrove College	7	.7
1460	Mercy College of Detroit	8	.8
1085	Michigan Career Institute	1	.1
1095	Michigan Computer Institute	9	.9
1097	Michigan Institute of Technology	5	.5
1465	Michigan State University	95	9.3
1464	Michigan Technological University	4	.4
9115	Middleton Real Estate Training, Inc.	1	.1
2000	National Education Center	25	2.4
2005	National Technical Institute	4	.4
1560	Northern Michigan University	1	.1
1568	Northwood Institute	8	.8
1607	Oakland Community College	32	3.1
1497	Oakland University	26	2.5
1595	Olivet College	2	.2
9121	Payne-Pulliam School of Trade and Commerce	2	.2
9122	PK Technologies*	1	.1
9120	Pontiac Business Institute	1	.1
2020	PSI Institute of Michigan	1	.1
2025	Ross Business Institute and Ross Medical Education Center	18	1.8
1766	Saginaw Valley State University	1	.1
2030	Sawyer School of Business	3	.3
1764	Schoolcraft College	6	.6
2035	SER, Metro-Detroit, Jobs for Progress	4	.4
1719	Siena Heights College	3	.3
9123	Specs Howard School of Broadcasting	4	.4
2050	Technical Careers Institute of Michigan	5	.5
1835	University of Detroit	25	2.4
1839	University of Michigan (Ann Arbor)	39	3.8
1861	University of Michigan (Dearborn)	14	1.4
2055	Virginia Farrell Beauty School	3	.3

TOTAL SAMPLE/77

School Code	Name of School	Number	Percent
1935	Washtenaw Community College	1	.1
1937	Wayne County Community College	108	10.6
1898	Wayne State University	151	14.8
1902	Western Michigan University	45	4.4
		(N=1022)	100.0

Respondents Who Had Attended or Were Attending Out-of-State Schools

School Code	Name of School	Number	Percent
1003	Alabama A & M University*[25]	10	3.8
1006	Alabama State University*	17	6.5
5006	Allen University (SC)*	1	.4
9908	American College of Applied Art (GA)**[26]	1	.4
9901	Apex Academy of Hair Design (IN)**	1	.4
9902	Bessemer State Technical (AL)**	1	.4
5061	Bethune-Cookman College (FL)*	2	.8
1069	Bowling Green State University (OH)	1	.4
2074	Carnegie-Mellon University (PA)	1	.4
1107	Central State University (OH)*	18	6.9
2648	Cheyney University of Pennsylvania (PA)*	1	.4
1984	Cincinnati Technical College (OH)	1	.4
5110	Clark College (GA)*	5	1.9
5145	Clayton State College (GA)	1	.4
9903	Cleveland Job Center (OH)**	1	.4
1134	College of Wooster (OH)	1	.4
4075	Colorado State University	1	.4
2098	Cornell University (NY)	1	.4
5711	DeKalb College (GA)	1	.4
5153	Delaware State College (DE)*	2	.8
1605	DeVry Institute of Technology (OH)	4	1.5
5187	Emory University (GA)	1	.4

[25]An (*) is used to denote a traditionally black institution of higher learning. Source: U.S. Department of Education, National Center of Educational Statistics, "The Traditionally Black Institutions of Higher Education: Their Development and Status, 1860 to 1982," March, 1985, pp. 1025.

[26]A (**) is used to indicate that the school is not listed in Educational Testing Service, College Entrance Examination Board, Registration Bulletin, 1989-90, "College and Scholarship Program codes" 1989, pp. 24-34. Each out-state school's 4-digit code, save those designated with (**), was derived from this, the ETS, source. This also applies to all Michigan academic colleges and universities previously listed.

TOTAL SAMPLE/78

School Code	Name of School	Number	Percent
4457	Fashion Institute of Design and Merchandising (CA)	1	.4
1224	Fisk University (TN)	2	.8
5215	Florida A & M University*	11	4.2
5217	Florida Memorial College*	2	.8
5219	Florida State University	1	.4
5220	Fort Valley State College (GA)*	1	.4
5230	Frederick Community College (MD)	1	.4
9904	Gateway Community College (AZ)**	1	.4
5248	Georgia Institute of Technology	1	.4
5251	Georgia State University	1	.4
6250	Grambling State University (LA)*	6	2.3
5292	Hampton University (VA)*	12	4.6
6276	Highland Community College (KS)	1	.4
5297	Howard University (DC)*	7	2.7
6306	Iowa State University	3	1.2
1341	Jackson State University (MS)*	5	1.9
1736	Jacksonville State University (AL)	1	.4
5333	Johnson C. Smith University (NC)*	2	.8
1346	Joliet Junior College (IL)	1	.4
1367	Kent State University (OH)	1	.4
1368	Kentucky State University*	6	2.3
1373	Knoxville College (TN)*	6	2.3
1395	Lane College (TN)*	3	1.2
6361	Langston University (OK)*	1	.4
6366	Lincoln University (MO)*	4	1.5
6373	Louisiana State University	1	.4
1450	Mary Holmes College (MS)*	1	.4
1459	Memphis State University (TN)	1	.4
5415	Morehouse College (GA)*	5	1.9
5417	Morris Brown College (GA)*	2	.8
5418	Morris College (SC)*	1	.1
5003	North Carolina A & T State University*	2	
5517	Northern Virginia Community College	1	.4
1561	Northland College (WI)	1	.4
3669	Norwich University (VT)	1	.4
1587	Oberlin College (OH)	1	.4
6552	Oral Roberts University (OK)	1	.4
5530	Paine College (GA)*	1	.4
9907	Phoenix Institute of Technology (AZ)**	2	.8
6580	Prairie View A & M University (TX)*	6	2.3
1638	Purdue University (IN)	5	1.9
1669	Rust College (MS)*	1	.4
4679	San Bernardino Valley College (CA)	1	.4
5609	Savannah State College (GA)*	1	.4

TOTAL SAMPLE 479

School Code	Name of School	Number	Percent
6663	Southern University A & M College (LA)*	5	1.9
5628	Spelmar College (GA)*	3	1.2
5596	Saint Augustine's College (NC)*	1	.4
5604	Saint Paul's College (VA)*	1	.4
1739	Stillman College (AL)*	1	.4
1803	Tennessee State University*	9	3.5
6821	Texas College*	1	.4
6824	Texas Southern University*	1	.4
1813	Tuskegee University (AL)*	15	5.8
2924	United States Military Academy (NY)	1	.4
5809	United States Naval Academy (MD)	1	.4
6368	University of Arkansas at Little Rock	1	.4
6004	University of Arkansas at Pine Bluff*	2	.8
1832	University of Chicago (IL)	2	.8
1834	University of Dayton (OH)	1	.4
5811	University of Delaware (DE)	1	.4
5812	University of Florida	1	.4
1851	University of Illinois at Chicago	2	.8
6871	University of Kansas	1	.4
1840	University of Mississippi	1	.4
6875	University of Missouri	1	.4
1841	University of Notre Dame (IN)	1	.4
2986	University of Pennsylvania	2	.8
4849	University of San Diego (CA)	1	.4
3920	University of Vermont	1	.4
1847	Urbana University (OH)	1	.4
6884	Wichita State University (KS)	1	.4
1906	Wilberforce University	10	3.8
		(N=260)	100.0

TOTAL SAMPLE/80

THE DISTRIBUTION OF RESPONSES OF THE 1989 GRADUATES SURVEYED
TOTAL SAMPLE BY GENDER

(N=1666)

While you were in high school, were you in a ---
(Questions 1-5)

		Percent Choosing Female	Male
1. College preparatory curriculum?	(N)*	73.1 (1077)	68.2 (421)
2. Vocational/Technical Center program?	(N)	15.9 (893)	28.9 (380)
3. Co-op program?	(N)	33.2 (930)	18.2 (352)
4. Vocational/Technical Center program?	(N)	3.4 (841)	9.2 (347)
5. Program for bilingual students?	(N)	1.6 (832)	4.2 (336)

If you attended a Vocational/Technical Center, **CIRCLE ALL THAT YOU ATTENDED.**
(Question 6)

		Percent Choosing Female	Male
1. Breithaupt		4.9	27.0
2. Crockett		43.0	15.0
3. Golightly		26.1	27.0
4. Randolph		28.2	32.0
	(N)	(142)	(100)

*Total number responding.

What did your high school do to help you prepare for the job market? Answer this item even if you are not currently employed. **CIRCLE ALL THAT APPLY.**

(Question 7)

		Percent Choosing Female	Male
1.	Taught me how to complete job applications	60.9	58.8
2.	Taught me interview skills	54.8	54.2
3.	Placed me on a job as part of a high school course	24.1	12.8
4.	Trained me for a specific job	15.6	15.2
5.	Provided information about career options	63.9	69.8
6.	Provided general job preparation skills	46.2	45.3
7.	Taught me the value of work	43.2	46.0
8.	Helped me find after-school work which was part of a high school class	14.4	13.0
9.	Taught me the importance of getting along with others	47.4	47.7
10.	Involved me in a Career Day or Job Fair	50.7	44.3
11.	Nothing	9.4	8.9
12.	Other	5.9	5.6
	(N)	(1161)	(461)

What did your high school do to help you to get a job after graduation? Answer this item even if you are not currently employed. **CIRCLE ALL THAT APPLY.**

(Question 8)

		Percent Choosing Female	Male
1.	Told me about a job opening	7.8	11.1
2.	Sent me for an interview	4.8	6.8
3.	Provided job placement service	6.2	8.1
4.	Involved me in a Career Day or Job Fair	19.9	25.1
5.	Gave information about me to an employer	6.2	9.0
6.	Nothing	65.9	61.4
7.	Other	5.6	6.3
	(N)	(1128)	(443)

If you worked during your last year in high school, enter the average number of hours you worked per week _____.

(Question 9)

Average Hours Worked	Percent Choosing Female	Male
1. 10 hours or less	4.6	4.5
2. 11 to 18 hours	14.0	9.0
3. 19 to 30 hours	62.8	62.6
4. 31 to 40 hours	17.5	22.9
5. Over 40 hours	1.1	1.0
(N)	(1128)	(443)

From the following list of school subjects, **WHICH ONE** has helped you the most in your present situation?

(Question 10 -- see below)

From the same list, **PICK THE ONE SUBJECT** in which you would have liked to have taken more classes.

(Question 11)

	Percent Choosing Quest. 10 F	Quest. 10 M	Quest. 11 F	Quest. 11 M
1. Art	1.0	1.6	2.4	4.4
2. Business	19.1	13.7	15.0	16.0
3. Career Guidance	2.8	2.1	3.8	2.9
4. Computer Courses	6.5	7.9	28.9	21.1
5. Co-op	8.4	2.1	2.2	2.2
6. English	23.2	18.3	6.5	5.5
7. Foreign Languages	0.9	0.9	5.6	5.3
8. Home Economics	2.2	2.3	3.0	2.9
9. Industrial Arts	0.4	1.2	0.6	0.4
10. JROTC	1.4	4.4	0.7	1.5
11. Mathematics	16.1	19.5	12.7	16.7
12. Music	1.7	3.0	3.5	3.1
13. Physical Education/Athletics	1.3	5.6	0.8	1.1
14. Science	6.3	2.8	6.6	5.7
15. Social Studies	2.0	1.6	2.4	1.3
16. Voc/Tech School Courses	6.7	13.0	5.4	9.9
(N)	(1082)	(431)	(1145)	(455)

From the following list of teaching methods, **WHICH ONE** worked best for you while you were in high school?

(Question 12)

		Percent Choosing Female	Male
1.	Field trips	1.5	2.3
2.	Independent study	13.3	10.7
3.	Student/Student discussions	8.5	6.8
4.	Teacher lectures	12.3	12.6
5.	Teaching machines	1.1	0.9
6.	Teacher discussions	42.0	42.5
7.	Tutoring	1.8	3.4
8.	Use of computers	9.4	8.0
9.	Use of video/films	0.7	0.2
10.	Work in labs	5.0	6.6
11.	Work on projects	4.4	5.9
	(N)	(1125)	(438)

Which **ONE** extra-curricular activity has been the most valuable for you?

(Question 13)

		Percent Choosing Female	Male
1.	Academic clubs such as science clubs	8.2	6.6
2.	Athletics	13.0	27.2
3.	Dramatics, debate	4.3	3.8
4.	Music	10.4	8.8
5.	Junior Achievement	7.0	4.9
6.	Student Council	4.6	4.9
7.	Career Clubs such as Future Teachers, DECA, etc.	17.5	8.2
8.	Did not participate	35.0	35.2
	(N)	(1151)	(452)

In which **ONE** area would you have liked your high school to help you more?

(Question 14)

		Percent Choosing Female	Male
1.	Thinking skills	7.3	8.5
2.	Study habits	45.8	43.7
3.	Interpersonal skills	4.8	4.1
4.	Practical living skills	5.8	5.9
5.	Selecting high school courses	2.4	5.5
6.	Planning for college or a job	33.8	32.3
	(N)	(1120)	(437)

Students are often given the grades A, B, C, D or E to describe the quality of their work. Use this A, B, C, D or E grading scale to answer Items 15-20. CIRCLE YOUR CHOICE.

THINKING BACK OVER YOUR HIGH SCHOOL YEARS, WHAT GRADE WOULD YOU GIVE TO THE—

(Questions 15 to 20)

			Percent Choosing				
			A	B	C	D	E
15.	Preparation you received from your high school courses for what you are doing now?	F	12.7	28.7	35.0	15.0	8.6
		M	9.5	27.2	42.1	12.7	8.4
		(N)	F (1177)		M (463)		
16.	Interest shown in you by the high school staff?	F	15.7	35.4	30.7	11.5	6.7
		M	17.8	35.1	30.8	11.2	5.2
		(N)	F (1179)		M (465)		
17.	Instruction provided by your high school teachers?	F	17.1	41.3	31.6	7.6	2.3
		M	16.8	44.7	28.8	7.7	1.9
		(N)	F (1178)		M (465)		
18.	Services provided by your high school counselors?	F	22.8	25.3	26.8	14.6	10.5
		M	22.7	27.7	29.0	12.2	8.3
		(N)	F (1152)		M (468)		
19.	Administration of the school provided by the principal, assistant principal, and other administrators?	F	8.9	22.3	36.9	19.9	12.0
		M	9.5	25.5	34.9	19.3	10.8
		(N)	F (1145)		M (455)		
20.	Overall quality of your high school?	F	11.1	33.9	40.3	11.0	3.7
		M	12.3	38.2	35.4	9.5	4.6
		(N)	F (1145)		M (455)		

What is your marital status?

(Question 21)

		Percent Choosing	
		Female	Male
1.	Single	97.4	98.7
2.	Married	2.6	1.3
	(N)	(1152)	(461)

Do you have any children?

(Question 22)

		Percent Choosing Female	Male
1. Yes		14.8	7.2
2. No		85.2	92.8
	(N)	(1148)	(457)

If you have children, how old is your oldest?

(Question 23)

		Percent Choosing Female	Male
1. Less than one year		46.1	45.2
2. One to two years		30.9	45.2
3. Older than two years		23.0	9.7
	(N)	(178)	(31)

Which one of the following statements best describes you now?

(Question 24)

		Percent Choosing Female	Male
1. I am in the military service FULL-TIME.		2.0	8.0
2. I am in a PART-TIME National Guard program.		1.4	2.1
3. I am not in a military program.		96.6	89.9
	(N)	(1181)	(474)

Have you been employed at any time since graduating from high school?

(Question 25)

		Percent Choosing Female	Male
1. Yes		91.8	91.0
2. No		8.2	9.0
	(N)	(1135)	(432)

Which one of the following statements is the best description of your status DURING THE MONTH OF NOVEMBER, 1990? CIRCLE ONLY ONE.

(Question 26)

		Percent Choosing Female	Male
1.	I was employed FULL-TIME.	24.5	26.4
2.	I was employed PART-TIME.	38.7	35.2
3.	I was NOT EMPLOYED.	36.8	38.3
	(N)	(1118)	(420)

If you WERE EMPLOYED FULL-TIME OR PART-TIME in NOVEMBER, 1990, answer Items 27-32.

What was your job title? _____

(Question 27)

Briefly describe what you did on the job. _____

(Question 28)

List the name of the company or organization. _____

(Question 29)

Code	Job Groupings[27]	Percents of Respondents Reporting Jobs Female	Male
1.	**ACCOUNTING CLERK**,[28] Bookkeeper, Processing Teller, Inventory Control Person, Auditor, Accounts Payable Clerk, Accounts Receivable Clerk, Accountant	4.0	3.2
3.	**AUTO MECHANIC**	0.0	0.9
4.	**AIDE**, Home Health Aide, Lunch Room Aide, Health Care Worker	1.0	1.4
5.	Assembler, Auto Assembler, Bench Assembler, **FACTORY WORKER**, Production Operator, Press Operator, "Work with big machines"	1.5	3.8

[27]Responses to Questions 27-29 were used to establish job titles, to create job groupings and to assign jobs to groupings.

[28]The job title displayed in upper case bold letters typifies the kinds of jobs included within the job grouping.

Code	Job Groupings	Percents of Respondents Reporting Jobs Female	Male
6.	**ASSISTANT MANAGER**, Office Assistant Manager, Jewelry Store Assistant Manager	1.3	2.4
8.	**AUDIO-VISUAL TECHNICIAN**, Video Duplicator, Cable Installer	0.0	1.9
9.	**SUPERMARKET BAGGER**, Bagger-Stocker	0.0	0.9
10.	Building Maintenance Worker, **CUSTODIAN**, Porter, Janitor, Laundry Aide, Cleaner, Room Attendant, Facilities Attendant	1.3	8.0
11.	**BUTCHER ASSISTANT**, Meat Cutter	0.0	0.9
12.	**CAB DRIVER**, Truck Driver	0.0	0.9
13.	**CAFETERIA WORKER**, Busboy, Cash-Bar Attendant, Dishwasher, Food Service Worker, Baker Helper, Pre-Cook Worker, Donut Finisher	1.7	8.5
14.	**CARPENTER**, Roofer	0.0	0.9
15.	**CASHIER**, Cashier-Stocker, Cashier-Cook, Cashier-Salad Maker, Cashier-Sales, Lottery Cashier, Cashier-Hostess	15.2	3.3
16.	**CATERER**	0.2	0.0
17.	**CHILD CARE ASSISTANT**	0.2	0.0
18.	**CLERK**, Clerical Aide, Clerical Assistant, Clerk Typist, Desk Clerk, Records Clerk, Insurance Clerk, Microfilm Clerk, Tax File Clerk, Office Aide, Shipping Clerk, Claims Processor, Renewal Processor, Utility Clerk	13.7	4.2
19.	**COACH**, Assistant Coach	0.2	0.5
20.	**COMMUNITY WORKER**	0.2	0.0
21.	**CONSTRUCTION WORKER**, Laborer, Road Maintenance Assistant	0.3	2.4
22.	**COOK**, Chef, Cook-Shift Manager	0.8	6.1

Code	Job Groupings	Percents of Respondents Reporting Jobs Female	Male
23.	**CO-OP**, [GM; Ford MC], Trainee	0.2	0.9
24.	**COSMETOLOGIST**, Manicurist, "Clip and bathe dogs and cats"	0.7	0.0
25.	**COUNSELOR**, Youth Counselor	0.0	0.9
26.	Customer Representative, Sales Representative, **CUSTOMER SERVICE**	1.3	0.9
27.	Day Care Worker, **BABY SITTER**, Foster Care Worker	1.3	0.0
28.	**DENTAL ASSISTANT**, Dental Assistant Trainee	0.5	0.0
29.	**DIETARY AIDE**, Dietary Aide Assistant	0.8	0.9
31.	**ELECTRICAL CONTRACTOR**	0.0	0.5
33.	**ELECTRICIAN**	0.0	0.9
34.	Equipment Service Person, **REPAIRMAN**	0.0	0.9
35.	**FAST FOOD WORKER**, Crew Member, Crew Person, Slicer Operator, Trainer Unit, Crew Trainer	1.3	3.3
36.	**FORK LIFT DRIVER**, High-Low Driver	0.2	0.5
37.	Glass Cutter, **GLAZER**	0.0	0.9
38.	**HEATING AND COOLING SPECIALIST**	0.0	0.5
39.	**COMPUTER AIDE**, Computer Lab Assistant, Computer Operator, Data Input Operator, CRT Operator, Data Processor-Programmer, Terminal Operator, Key-punch Operator	2.9	2.4
40.	**INTERIOR DESIGN ASSISTANT**	0.2	0.0
41.	**LAB TECHNICIAN** [Medical]	0.2	0.9
43.	**LAYOUT MAN**	0.0	0.5
44.	**LETTER CARRIER**, Mail Carrier, Post Office Distribution Clerk [U.S. Mail]	0.5	0.9

Code	Job Groupings	Percents of Respondents Reporting Jobs Female	Male
45.	Librarian, **LIBRARIAN ASSISTANT**, Library Clerk	0.7	0.9
46.	**LIFEGUARD**, Pool Guard	0.8	0.5
47.	**MACHINE OPERATOR**, Machinist, Press Operator	0.3	0.5
48.	Mail Clerk, **MAILROOM CLERK**, Mail Sorter, Mail Coordinator, Mail and Receiving Clerk, Sorter [UPS]	1.3	1.4
49.	**MANAGER**, Manager-in-Training, Warehouse Manager, Weight Room Manager, Office Manager, Service Desk Manager	2.0	0.5
50.	**METER MAID**	0.2	0.0
51.	**MUSIC ARRANGER**	0.0	0.5
52.	**NURSE AIDE**, Nurse Assistant, Nurse Trainee, Nurse Technician, Emergency Room Technician, Medical Assistant, Therapist	4.2	0.9
53.	Packer, **PACKAGES**, Box Packer	1.0	2.4
54.	**PHARMACY TECHNICIAN**	0.3	0.0
55.	**PHOTOGRAPHER**, Studio Photographer	0.2	0.5
56.	**RECEPTIONIST**, Auto Center Greeter, Desk Receptionist, Medical Receptionist	3.4	0.0
57.	**RECREATION AIDE**, Facilities Attendant, Public Service Attendant	0.8	0.0
58.	Resident Advisor, Minority Aide-Live-In, Student Mentor, Student Advisor, Reservationist, **STUDENT ASSISTANT**, Dorm Guard, Research Assistant, Old Exam File Clerk, Faculty Assistant, Department Aide	9.9	5.7

Code	Job Groupings	Percents of Respondents Reporting Jobs Female	Male
59.	**SALES CLERK**, Sales and Marketing Clerk, Retail Clerk, Counter Clerk, Floor Clerk, Floor Girl, Concessionist, Sales Representative, Sales Person, Sales Fashion Consultant, Sales-Cashier	10.8	3.8
60.	**SECRETARY**, Secretarial Assistant, Executive Secretary, Legal Secretary, Assistant Secretary, Credit Counseling Secretary	3.2	0.9
61.	**STOCK PERSON**, Stock Boy, Midnight Stock Person, Transfer Loader, Textbook Worker	0.8	6.1
62.	**SUPERVISOR** Crew, Shift Supervisor, Plan Supervisor	0.2	0.9
63.	**SURVEYOR**	0.2	0.0
64.	**SWITCHBOARD OPERATOR**, Telephone Operator	0.5	0.0
65.	**TEACHER ASSISTANT**, Teacher Aide, Pre-School Teacher, Reading Tutor, Math Tutor, Student Teacher Helper	2.2	1.9
66.	**TELEMARKETER**, Telecommunicator-Sales, Caller, Interviewer, Phone Worker-Solicitor, Urban Marketer, Census Enumerator	2.4	2.4
67.	**TICKET CHECKER**, Ticket Taker, Usher	0.2	0.9
68.	**TYPESETTER**	0.2	0.0
69.	**WAITER**, Waitress, Apprentice Waiter, Food Server, Hostess	1.3	0.9
70.	**WORKSHOP FACILITATOR**	0.2	0.0
71.	**VALET** [Parks cars]	0.0	0.5
72.	**SECURITY**, Security Guard, Security Officer, Night Security, Store Detective	0.7	2.8

Code	Job Groupings	Percents of Respondents Reporting Jobs Female	Male
73.	**PLUMBER APPRENTICE**	0.0	0.5
74.	**RAG CUTTER**	0.2	0.0
75.	**CANNONEER** [U.S. Army]	0.0	0.5
	(N)	(593)	(212)

How much did you earn? What was your hourly rate of pay?
(Question 30)

Average Hourly Rate of Pay	Percent Choosing Female	Male
1. Less than $3.80	4.6	3.4
2. $3.80 to $4.25	33.4	23.6
3. $4.26 to $5.00	32.0	31.3
4. $5.01 to $6.00	17.9	16.3
5. $6.01 to $7.00	7.7	9.0
6. $7.01 to $8.00	4.0	6.4
7. Over $8.00	3.7	9.9
(N)	(647)	(233)

Where did you work in November, 1990? **CIRCLE ONLY ONE.**
(Question 31)

	Percent Choosing Female	Male
1. In Detroit	42.4	37.8
2. Not in Detroit but in Wayne, Oakland or Macomb County	28.0	27.8
3. Elsewhere in Michigan	20.8	22.8
4. Not in Michigan	8.8	11.6
(N)	(707)	(259)

Who gave you the **greatest assistance** in getting the job? **CIRCLE ONLY ONE.**
(Question 32)

		Percent Choosing Female	Male
1.	High school counselor	1.4	1.9
2.	Guidance department head	0.8	0.0
3.	High school teacher	1.1	2.3
4.	Co-op coordinator	6.2	3.4
5.	Friend	12.6	17.8
6.	Parent or other relative	19.8	17.4
7.	Vocational/Technical school placement office staff	3.7	5.7
8.	Regular high school placement office staff	0.6	0.4
9.	Member of church group or other organization to which you belong	0.7	1.9
10.	Employer	3.3	3.0
11.	Media such as TV, newspapers, radio, etc.	3.2	1.5
12.	No one but myself	37.9	35.2
13.	Other	8.7	9.5
	(N)	(723)	(264)

If you were **NOT EMPLOYED** in November, 1990, which of the following reasons describe why you were not. If you **WERE EMPLOYED**, skip to Item 34. **CIRCLE ALL THAT APPLY.**
(Question 33)

		Percent Choosing Female	Male
1.	Had never been employed	3.0	5.5
2.	Laid off from the job I had	6.4	6.7
3.	Quit the job I had	17.2	7.3
4.	Fired from the job I had	1.8	2.4
5.	Going to school	62.5	74.5
6.	Received ADC or welfare aid	13.3	2.4
7.	Pregnant	8.0	0.0
8.	Lacked child care	4.8	0.0
9.	Health or family reasons	6.4	3.0
10.	Looked but couldn't find work	23.4	17.6
11.	Had given up looking for work	3.7	2.4
12.	Lacked schooling or necessary training	5.3	4.8
13.	Transportation problems	13.6	12.7
14.	Other	5.7	4.2
	(N)	(435)	(165)

Which one of the following statements best describes you now? **CIRCLE ONLY ONE.**
(Question 34)

		Percent Choosing Female	Male
1.	I am **ENROLLED FULL-TIME** in an educational program.	57.1	59.7
2.	I am **ENROLLED PART-TIME** in an educational program.	14.3	13.0
3.	I am **NOT NOW** enrolled in an educational program.	18.2	13.9
4.	I have not been enrolled in any educational program since graduating from high school.	10.4	13.4
	(N)	(1084)	(409)

If you are **NOT CURRENTLY ENROLLED** in a post high school educational program, what is the main reason? If you are continuing your education, or you have completed the program you were in, **SKIP** this item. **CIRCLE ONLY ONE.**
(Question 35)

		Percent Choosing Female	Male
1.	Began in a school or training program, but dropped out	11.0	6.0
2.	Have completed a post-high school program	7.7	1.0
3.	Personal choice	5.1	6.0
4.	Not interested	1.5	6.0
5.	Applied but not accepted	1.5	3.0
6.	Decided to wait	13.2	14.0
7.	Have applied, waiting for acceptance	11.0	9.0
8.	Lack of money	20.2	22.0
9.	Lack of time due to employment	5.5	16.0
10.	Pregnant or a full-time homemaker	12.5	0.0
11.	In military service	1.1	4.0
12.	Looking for a school to meet my needs	5.9	7.0
13.	Other	3.7	6.0
	(N)	(272)	(100)

IF YOU ARE NOW OR WERE PREVIOUSLY ENROLLED IN AN EDUCATION PROGRAM, PLEASE COMPLETE THE ADDITIONAL SURVEY ITEMS. If you have NOT attended a school since high school graduation, skip to Item 44.

What type of program were you, or are you now, enrolled in? **CIRCLE ONLY ONE.**
(Question 36)

		Percent Choosing Female	Male
1.	A course of study or program that lasted less than one year	13.5	9.5
2.	1-year college vocational-technical or business program	3.0	2.0
3.	2-year college vocational-technical or business program	12.4	13.7
4.	2-year college liberal arts program	12.3	10.4
5.	4-year college or university	58.2	63.0
6.	Other	0.5	1.4
	(N)	(272)	(100)

Enter the cumulative grade point average you have earned at the school you now attend. If you completed a program or course of study, enter your final GPA.
(Question 37)

Responses to this question were not recorded into a data file, and thus could not be tabulated for presentation in this report. This does not preclude the recording and analysis of these responses at some future date.

What types of remedial classes did you take in your post-high school educational program? **CIRCLE ALL THAT APPLY.**
(Question 38)

Responses to this question were not tabulated. There was a tendency by far too great a proportion of respondents to list their current class titles in addition to or instead of circling the remedial classes provided.

Have you received scholarship or financial aid to attend a school or program since graduating from high school?
(Question 39)

		Percent Choosing Female	Male
1.	Yes	81.3	73.1
2.	No	18.7	26.9
	(N)	(993)	(353)

If you answered "yes" to Number 39, who assisted you the most in obtaining your financial aid? If you answered "no" to Number 39, skip this item. **CIRCLE ONLY ONE.**

(Question 40)

		Percent Choosing Female	Male
1.	College financial aid representative	31.9	31.3
2.	Member of a college department such as athletics, music, science, etc.		
3.	Parent or other relative	2.6	5.2
4.	Friend	27.2	25.3
5.	Guidance department head	3.0	2.0
6.	High school counselor	5.4	3.2
7.	High school teacher or coach	9.7	12.4
8.	High school administrator	1.7	5.6
9.	Member of a church group or other social organization	0.9	1.2
10.	Military recruiter	0.1	0.8
11.	No one but myself	13.6	11.2
12.	Other	3.1	0.8
	(N)	(766)	(249)

If you answered "yes" to Number 39, what types of financial aid have you received? **CIRCLE ALL THAT APPLY.**

(Question 41)

		Percent Choosing Female	Male
1.	Pell Grant	83.8	75.2
2.	State of Michigan Competitive Scholarship	8.2	12.2
3.	State of Michigan Tuition Grant	18.3	14.5
4.	National Merit Scholarship	1.2	1.1
5.	National Achievement Scholarship	0.6	1.5
6.	Athletic Scholarship	1.9	6.5
7.	College/School Scholarship	16.7	19.1
8.	Private-Institutional Scholarship	9.3	11.5
9.	Veteran Benefits	0.7	1.1
10.	Student loans	43.8	38.5
11.	College Work Study (CWS)	29.7	31.3
12.	Others	14.0	11.5
	(N)	(808)	(262)

Of all the people who helped you get into your post-high school educational program, who would you say gave you the **MOST** help? **CIRCLE ONLY ONE.**

(Question 42)

		Percent Choosing	
		Female	Male
1.	High school counselor	13.1	12.1
2.	High school guidance department head	2.8	3.6
3.	Parent or other relative	37.0	39.3
4.	Friend	3.9	3.6
5.	College placement office staff or admissions official	6.0	5.9
6.	Member of a church or other organization to which you belong	0.6	0.0
7.	Vocational/Technical Center staff	1.1	2.4
8.	High school teacher	4.7	7.4
9.	Member of a college department such as athletic, music, science, etc.	1.0	2.1
10.	No one but myself	27.4	21.3
11.	Other	2.3	2.4
	(N)	(963)	(338)

Look on the last page of this survey. Find the name of the school you are attending or attended. **CIRCLE THE NUMBER OF YOUR SCHOOL.**

If your school is not listed, enter the name in the space provided.
(Question 43)

Respondents Who Had Attended or Were Attending Schools Located in Michigan

School Code	Name of School	Female Number	Female Percent	Male Number	Male Percent
9128	Academy of Health Careers, Inc.	1	0.1	0	0.0
1000	Academy of Court Reporting	1	0.1	0	0.0
1001	Adrian College	0	0.0	1	0.4
1005	Adult Career Training,*[29]	14	1.8	5	2.0
9101	Adult Education, Detroit Public Schools*	7	0.9	4	1.6
9102	Adult Education, Other School Districts*	2	0.3	3	1.2
1007	Albion College	0	0.0	1	0.4
9106	American Career Academy	2	0.3	0	0.0
1018	Aquinas College	3	0.4	0	0.0
1030	Cambridge Business*	1	0.1	0	0.0
1035	Center for Creative Studies	3	0.4	1	0.4
1106	Central Michigan University	5	0.7	3	1.2
9107	Concorde Career Institute	1	0.1	0	0.0
1020	Control Data Institute	2	0.3	1	0.4
9108	CYTCIP Computer Skills Training Center	2	0.3	0	0.0
1040	Detroit Business Institute	7	0.9	0	0.0
1181	Detroit College of Business	58	7.6	7	2.9
1045	Detroit Institute of Commerce	2	0.3	0	0.0
9110	Detroit Job Corps Center*	1	0.1	1	0.4
1050	DeVry Institute of Technology	0	0.0	1	0.4
1055	Dorsey Business School, Inc.	2	0.3	0	0.0
1201	Eastern Michigan University	25	3.3	9	3.3
1222	Ferris State University	14	1.8	10	4.1
9109	Focus:Hope Machinist Training Ins.	1	0.1	3	1.2
1246	GMI Engineering & Management Institute	1	0.1	2	0.8
9129	Goodwill Industries*	1	0.1	0	0.0
9113	Grand Rapids Job Corps*	1	0.1	0	0.0
1254	Grand Rapids Junior College	1	0.1	0	0.0
1258	Grand Valley State University	6	0.8	1	0.4
1293	Henry Ford Community College	40	5.2	15	6.1
3177	Henry Ford Hospital	1	0.1	0	0.0
1294	Highland Park Community College	13	1.7	3	1.2

[29]An (*) is used to denote Michigan schools and training centers not listed in Michigan State Board of Education, Michigan Department of Education, 1989-90 Michigan Postsecondary Admissions and Financial Assistance Handbook, October, 1989.

School Code	Name of School	Female Number	Female Percent	Male Number	Male Percent
1070	IBA State College of Beauty*	1	0.1	0	0.0
1[illegible]/5	ITT Technical Institute	0	0.0	4	1.6
1952	Jordan College	5	0.7	0	0.0
1378	Kalamazoo Valley Community College	0	0.0	1	0.4
1376	Kendall College of Art and Design	0	0.0	1	0.4
9114	Krainz Woods Academy of Medical Laboratories	1	0.1	0	0.0
1414	Lansing Community College	0	0.0	1	0.4
1399	Lawrence Technological University	2	0.3	5	2.0
1080	Lawton School	4	0.5	2	0.8
1425	Lewis College of Business	19	2.5	4	1.6
1521	Macomb Community College	9	1.2	5	2.0
1437	Madonna College	1	0.1	1	0.4
9116	Marketwise*	0	0.0	1	0.4
1452	Marygrove College	7	0.9	0	0.0
1460	Mercy College of Detroit	6	0.8	2	0.8
1085	Michigan Career Institute	0	0.0	1	0.4
1095	Michigan Computer Institute	7	0.9	2	0.8
1097	Michigan Institute of Technology	1	0.1	4	1.6
1465	Michigan State University	69	9.0	24	9.8
1464	Michigan Technological University	2	0.3	2	0.8
9115	Middleton Real Estate Training, Inc.	1	0.1	0	0.0
2000	National Education Center	22	2.9	3	1.2
2005	National Technical Institute	2	0.3	2	0.8
1560	Northern Michigan University	0	0.0	1	0.4
1568	Northwood Institute	4	0.5	4	1.6
1607	Oakland Community College	25	3.3	7	2.9
1497	Oakland University	22	2.9	4	1.6
1595	Olivet College	2	0.3	0	0.0
9121	Payne-Pulliam School of Trade and Commerce	2	0.3	0	0.0
9122	PK Technologies*	0	0.0	1	0.4
9120	Pontiac Business Institute	1	0.1	0	0.0
2020	PSI Institute of Michigan	1	0.1	0	0.0
2025	Ross Business Institute and Ross Medical Education Center	17	2.2	1	0.4
1766	Saginaw Valley State University	0	0.0	1	0.4
2030	Sawyer School of Business	3	0.4	0	0.0
1764	Schoolcraft College	3	0.4	3	1.2
2035	SER, Metro-Detroit, Jobs for Progress	1	0.5	0	0.0
1719	Siena Heights College	1	0.3	1	0.4
9123	Specs Howard School of Broadcasting	3	0.4	1	0.4
2050	Technical Careers Institute of Michigan	5	0.7	0	0.0
1835	University of Detroit	18	2.3	7	2.9
1839	University of Michigan (Ann Arbor)	27	3.5	12	4.9

School Code	Name of School	Female Number	Female Percent	Male Number	Male Percent
1861	University of Michigan (Dearborn)	12	1.6	2	0.8
2055	Virginia Farrell Beauty School	3	0.4	0	0.0
1935	Washtenaw Community College	1	0.1	0	0.0
1937	Wayne County Community College	75	9.8	31	12.7
1898	Wayne State University	126	16.4	23	9.4
1902	Western Michigan University	35	4.5	10	4.1
		(N) (768)	100.0	(244)	100.0

Respondents Who Had Attended or Were Attending Out-of-State Schools

School Code	Name of School	Female Number	Female Percent	Male Number	Male Percent
1003	Alabama A & M University*[30]	6	3.6	4	4.6
1006	Alabama State University*	8	4.8	8	9.2
5006	Allen University (SC)*	0	0.0	1	1.1
9908	American College of Applied Art (GA)**[31]	0	0.0	1	1.1
9901	Apex Academy of Hair Design (IN)**	1	0.6	0	0.0
9902	Bessemer State Technical (AL)**	0	0.0	1	1.1
5061	Bethune-Cookman College (FL)*	1	0.6	1	1.1
1069	Bowling Green State University (OH)	0	0.0	1	1.1
2074	Carnegie-Mellon University (PA)	1	0.6	0	0.0
1107	Central State University (OH)*	14	8.3	4	4.6
2648	Cheyney University of Pennsylvania (PA)*	1	0.6	0	0.0
1984	Cincinnati Technical College (OH)	1	0.6	0	0.0
5110	Clark College (GA)*	4	2.4	1	1.1
5145	Clayton State College (GA)	1	0.6	0	0.0
9903	Cleveland Job Center (OH)**	1	0.6	0	0.0
1134	College of Wooster (OH)	0	0.0	1	1.1
4075	Colorado State University	1	0.6	0	0.0
2098	Cornell University (NY)	1	0.6	0	0.0
5711	DeKalb College (GA)	0	0.0	1	1.1
5153	Delaware State College (DE)*	2	1.2	0	0.0

[30]An (*) is used to denote a traditionally black institution of higher learning. Source: U.S. Department of Education, National Center of Educational Statistics, "The Traditionally Black Institutions of Higher Education: Their Development and Status, 1860 to 1982," March, 1985, pp. 1025.

[31]A (**) is used to indicate that the school is not listed in Educational Testing Service, College Entrance Examination Board, Registration Bulletin, 1989-90, "College and Scholarship Program codes" 1989, pp. 24-34. Each out-state school's 4-digit code, save those designated with (**), was derived from this, the ETS, source. This also applies to all Michigan academic colleges and universities previously listed.

School Code	Name of School	Female Number	Female Percent	Male Number	Male Percent
4457	Fashion Institute of Design and Merchandising (CA)	1	0.1	0	0.0
1224	Fisk University (TN)	1	0.6	1	1.1
5215	Florida A & M University*	5	3.0	6	6.9
5217	Florida Memorial College*	1	0.6	1	1.1
5219	Florida State University	1	0.6	0	0.0
5220	Fort Valley State College (GA)*	1	0.6	0	0.0
5230	Frederick Community College (MD)	1	0.6	0	0.0
9904	Gateway Community College (AZ)**	1	0.6	0	0.0
5248	Georgia Institute of Technology	1	0.6	0	0.0
5251	Georgia State University	1	0.0	0	0.0
6250	Grambling State University (LA)*	3	1.8	3	3.4
5292	Hampton University (VA)*	9	5.4	3	3.4
6276	Highland Community College (KS)	0	0.0	1	1.1
5297	Howard University (DC)*	6	3.6	1	1.1
6306	Iowa State University	3	1.8	0	0.0
1341	Jackson State University (MS)*	4	2.4	1	1.1
1736	Jacksonville State University (AL)	1	0.6	0	0.0
5333	Johnson C. Smith University (NC)*	2	1.2	0	0.0
1346	Joliet Junior College (IL)	0	0.0	1	1.1
1367	Kent State University (OH)	0	0.0	1	1.1
1368	Kentucky State University*	4	2.4	2	2.3
1373	Knoxville College (TN)*	2	1.2	2	2.3
1395	Lane College (TN)*	2	1.2	3	3.4
6361	Langston University (OK)*	0	0.0	1	1.1
6366	Lincoln University (MO)*	4	2.4	0	0.0
6373	Louisiana State University	1	0.6	0	0.0
1450	Mary Holmes College (MS)*	1	0.6	0	0.0
1459	Memphis State University (TN)	1	0.6	0	0.0
5415	Morehouse College (GA)*	0	0.0	5	5.7
5417	Morris Brown College (GA)*	2	1.2	0	0.0
5418	Morris College (SC)*	1	0.6	0	0.0
5003	North Carolina A & T State University*	2	1.2	0	0.0
5517	Northern Virginia Community College	1	0.6	0	0.0
1561	Northland College (WI)	0	0.0	1	1.1
3669	Norwich University (VT)	0	0.0	1	1.1
1587	Oberlin College (OH)	1	0.6	0	0.0
6552	Oral Roberts University (OK)	1	0.6	0	0.0
5530	Paine College (GA)*	1	0.6	0	0.0
9907	Phoenix Institute of Technology (AZ)**	1	0.6	1	1.1
6580	Prairie View A & M University (TX)*	1	0.6	4	4.6
1638	Purdue University (IN)	2	1.2	3	3.4
1669	Rust College (MS)*	1	0.6	0	0.0
4679	San Bernardino Valley College (CA)	1	0.6	0	0.0
5609	Savannah State College (GA)*	1	0.6	0	0.0

School Code	Name of School	Female Number	Female Percent	Male Number	Male Percent
6663	Southern University A & M College (LA)*	4	2.4	1	1.1
5628	Spelman College (GA)*	3	1.8	0	0.0
5596	Saint Augustine's College (NC)*	1	0.6	0	0.0
5604	Saint Paul's College (VA)*	0	0.0	1	1.1
1739	Stillman College (AL)*	0	0.0	1	1.1
1803	Tennessee State University*	6	3.6	3	3.4
6821	Texas College*	1	0.6	0	0.0
6824	Texas Southern University*	1	0.6	0	0.0
1813	Tuskegee University (AL)*	10	6.0	3	3.4
2924	United States Military Academy (NY)	0	0.0	1	1.1
5809	United States Naval Academy (MD)	0	0.0	1	1.1
6368	University of Arkansas at Little Rock	0	0.0	1	1.1
6004	University of Arkansas at Pine Bluff*	2	1.2	0	0.0
1832	University of Chicago (IL)	2	1.2	0	0.0
1834	University of Dayton (OH)	0	0.0	1	1.1
5811	University of Delaware (DE)	0	0.0	1	1.1
5812	University of Florida	0	0.0	1	1.1
1851	University of Illinois at Chicago	1	0.6	1	1.1
6871	University of Kansas	0	0.0	1	1.1
1840	University of Mississippi	1	0.6	0	0.0
6875	University of Missouri	0	0.0	1	1.1
1841	University of Notre Dame (IN)	1	0.6	0	0.0
2986	University of Pennsylvania	1	0.6	1	1.1
4849	University of San Diego (CA)	1	0.6	0	0.0
3920	University of Vermont	1	0.6	0	0.0
1847	Urbana University (OH)	0	0.0	1	1.1
6884	Wichita State University (KS)	0	0.0	1	1.1
1906	Wilberforce University	10	6.0	0	0.0
6975	Xavier University of Louisiana*	0	0.0	1	1.1
3987	Yale University (CT)	1	0.6	0	0.0
		(N) (168)	100.0	(87)	100.0

EMPLOYER NAMES

The names of companies or organizations employing those respondents who worked as either full- or part-time employees during the month of November, 1990 are presented below. Employer names were derived from respondents' answers to Question 29: List the name of the company or organization _____. Included below are all save a few of the employer names provided. While there was no attempt to code employer names, an incomplete set of categories was developed and used, with however, a large collection of employer names assigned to a miscellaneous category. For the most part, employer names are listed below as provided by the respondents.

BANKS, MORTGAGE COMPANIES AND CREDIT UNIONS

Dearborn Federal Savings
First Federal of Michigan
First of America Bank
Manufactures National Bank
Marathon Mortgage Corp
Michigan National Bank
National Bank of Detroit
____ Bank Corp
Nationwide Credit
Old Kent Bank

COLLEGES AND UNIVERSITIES

Akers Hall, MSU
Alabama A & M U
Alabama State U
Asian Studies Center
Association of Black Students
Barnes & Noble Bookstore
Campus Bookstore
Campus Comp Sites Center
Carnegie Mellon U
Central Michigan U
Central State U
College Dormitory
College OSTEO, Med MSU
Cornell Department of Psychology
DCB, Library
Detroit College of Business
DeVry Institute of Technology
Eastern Michigan, _____
- Admissions, _____
- Career Service, _____
- Rec Center [EMU]

Erickson Library, MSO [MSU]
FSU
Ferris State U
Fort Valley State College
Georgia Tech
Grambling State U
Grand Valley State U
Henry Ford Library
Highland Park Comm College
Howard U, _____ Student Life
ITT Technical Institute
Jacksonville State U
Kendall College A & D
Knoxville College
Lawrence Tech Bookstore
Lewis College of Business
Lincoln U
MSU, _____ Library, _____ Physical Plant, _____ Chem, _____ English Dept, _____ Housing, _____ Bookstore, _____ Show Cafe, _____ Elec Eng Dept, _____ Math Dept, _____ Osteopathic Medice, _____ Off of Suppt Servs, _____ Plant Biology
Min Biomedical Res Suppt
Oakland Community College
Oakland U
Prairie View A & M U
Psychology Dept
Purdue Memorial U, Purdue U
Purdy Kresage Library
School of Labor & Industry

COLLEGES AND UNIVERSITIES (Cont'd)

Schoolcraft College
Student Accounts
Talladega College
Tennessee State U
The Theater Company of U of M
TSU Bursar Office
Tuskegee U
U of D Bursar, _____
Int'l Serv Off, _____
_____ Athletic Dept,
_____ Dept of Pharm,
_____ Housing
U of M Dearborn
U of M Ann Arbor
Undergrad Research Program
U of Chicago
University of Michigan Union
Bookstore, _____
Athletic Dept
University of Missouri Campus
University Health Center
University of Chicago
University of Dayton
University of Detroit
University of Florida
University of Michigan
University of Pennsylvania
University of San Diego
University of Vermont
Veteran Servs Off EMU
WMU - School of Business, _____
Alumni Assoc, _____ Purdy Kresge Lib,
_____ Medical School, _____
Acct Dept
WCCC
Western Michigan University, _____
Administration
Warton Center, MSU
Wilberforce Police Dept

FEDERAL, STATE AND MUNICIPAL GOVERNMENT AGENCIES

City County Building
City of Detroit, _____
Recreation Dept
City of Southfield
Internal Revenue Service
Royal Oak Postal Service
School System: Board of Education,
Cass Tech HS, Detroit Public
Schools, Murphy MS,
Ferndale Adult Comm Ed
State of Michigan
U S Postal Service,
U S Post Office
U S Census Bureau
U S Government
Wayne County Intermediate
School District
Warren Post Office

HOSPITAL AND HEALTH CARE

Allen Health Care
Beaumont Hospital
Bon Secour Center
Home Health Care, _____
Nursing
Care Center of Michigan
D O C Optical
Dental-One Fairlane
Detroit Receiving Hospital
Detroit-Macomb Hospital Corp
Fairlane Memorial
Family Planning Center
Ferndale Dental Clinic
Farmington Nursing Home
H & M Homes for Alter Care
Henry Ford Continuing Care
Henry Ford Hospital
Hutzel Hospital
Independent Living
Inglerside Nursing Home
Jewish Home for the Aged
Kidney Foundation of MI
Marie Ashley, DDS
Medicos Nursing
Medwestern Dental Center
New Light Nursing Home
Northland Nursing Center
Norwest Chiropractic Life Center
Park Geriatric Village Professional
Dental Centers
Redford Clinic P C
Sinai Hospital
Southwest Detroit Hospital
Sunrise Health Associates
Univ Family Physician
Unlimited Care
Wayne Total Living Center
Weight Tr American Lady

INFORMATION PROCESSORS

Comp-U-Check
Digitron Inc
Electronic Data Systems
Indata Corporation
Unisys Corp

INSURANCE

AAA
All-State
Amerisure/Michigan Mutual
Blue Care Network
CNA Insurance
Enterprise Insurance
Insurance Company
Metro Life Insurance Co
Midwest Benefits
New York Life Insurance Co
The Wellness Plan

MANUFACTURING

Ace-Tex Factory
American Standard Windows
Apollo Plating Inc
BUDCO Marketing & Dist
Centray Steel Wire Co
Chrysler
Cobane Corporation
Cummins On-time Assemblies
EDS
Ford Motor Company
GM, _____ Hydra-Matic Warren, _____ Production, _____ Tool Supply
Harber Tool Operation
Lincoln Brass Works
Mari Leather Works, Inc
Michigan Chrome & Chemical Co
PGF Inc
The Budd Company

PERSONAL SERVICE

Arrows Uniform Rental
Cobo Cleaners
Colley Co Landscaping
E-⁷ 4g Minute Cleaners
Express Cleaning Corp
Fisher Day Care
Fitness USA
Harry Anderson Janitor Service
Kermit's Hair Salon
Maikai Cleaners
Monson Cleaners
Nature Nook Florists
Orchard-14 Car Wash
Plum Hollow Shell
Portia Lawn Care
Queen Cleaners
R Miller Salon (Florida)
T & H Lawn Service

PROTECTIVE SERVICE

All Safe Security
Burns Int'l Security
DFD Apparatus Division
Emergency Network Security
Nation Wide Security
Security Plus

QUICK SERVICE FOOD: FAST FOOD RESTAURANTS, DONUT SHOPS, YOGURT SHOPS, ETC.

Arby's, _____ Roast Beef
Bonanza Southwest
Burger King, _____ Ren Cen, _____ (Troy MI)
Church's Chicken
Domino's Pizza
Dutch Girl Donut
Hardee's
Hungry Harvy's (Ren Cen)
Kentucky Fried Chicken
Little Ceaser's Pizza
Long John Silver's
McDonald's
Mrs Fields
Olga's Kitchen
Original Cookie
Pizza Hut
Ponderosa
Rally's
Seafood Bay
Taco Bell
Wendy's Yogurt Express

RECREATION AND HOSPITALITY

Alamo Rental Car Agency
A M Photography
AME Bel Air Theaters
Carden Cable Vision
Blockbuster Video
Detroit Golf Club
Fox Theatre
General Cinema Corp
Hall of Games
Holiday Inn
Joe's Hobby Center, Inc
Marriott
Martin's Recreation Center
Northwest Airlines
Pontchtrain Hotel
Red Roof Inn
Red Run Golf Club
Technicolor Video
United Artists Movies
Williams Exec Prkg Serv
Wireless Cable
YMCA

RETAIL

A & P Market
Accesory Place
Art Van Furniture
Auburn Pontiac
Barish Market
Barrel & Bottle Shop
Beauty Rest
Big J Supermarket
Bresler's Ice Cream
Calumet Tobacco Shop
Casual Corner
Chess King
Children's Palace
Cobbie Shop
Crowley Milner Company
Crown Home Center
Dayton Hudson
Dearborn Sausage
Family Dollar
Farmer Jack
Foland's
Foodland
Frederick's of Hollywood
Fulton Heights Foods
Gantos Boutique
Goff Food Store
Gussini Shoes
Harbortown Market
Highland Superstore
Hit or Miss
Hobbies
Home Pride Market
Honey Bee Market
Hot Sams
J C Penney
Jean Nicole
K-Mart
Kenwood Market
Kinney's Shoe Store
Knight Drugs
Kohl's Department Store
Kroger
L & L Food Center
Lady Foot Locker
Lafeyette Drugs
Lane Bryant
Layton's Clothing Store
Lerner of New York
Linens and More
Marianne
Mason's
Mays Printing Service
McCory's 5 & 10
Meatland
Meijer's
Mervyn's
Metro Foodland
Metro Furniture
Modern World Coatings Inc
Montgomery Wards
Mr Bulky's
Murray's Auto Stores

RETAIL (Cont'd)

Musicland
Oak Farms Fruit Market
Oat Tree
Olan Mills
PACE Warehouse
Papoose Party Shop
Party Time Market
Perry Drugs
Pharmacy
Pier 1
Record Outlet
Sam's Jams
Sbarro's Italian Eatery
Sears & Roebuck Company
Service Merchandise Co
Shoe Town
Shopper's World
Sibley Shoes
Specialized Pharmacy Inc
Speedway Gas Station
Spencer Gifts Sunglass Hut
Sutton's Candy Company
T J Maxx
Target
Tive Wholesale
Ton Def Records
Toys-R-Us
Tri-State Furniture
Value Village
Wilson's Suede & Leather
7-11 Retail Store

RESTAURANTS

Baker's Square
Bennigan's
Cafe Rio
Courtyard by Marriott
Lou's Finer Deli
O'Quin's Shrimp House
Ram's Horn
Shaw Halls Cafeteria
Sign of the Beef Eater
Steak & Ale
Steve's Soul Food
Susan Hoffmanns Fine Pastries
Tony's Villa
Van Dyke Place

UTILITIES

AT & T
Consumer Power Gas Co
Mich Con Gas Co

MISCELLANEOUS

ACA Management
Action Distributor
ADCOM
Adult Career Training
Albee Services
All Around Agency
American Mailer
APS Dashin's
Arthur Andersen & Co
Autotote
Autoworks
Baby & Company Inc
Best Care Trans
Blum's
BMC
C C S
C D I Temporary Services
Cape Cod
Centrum Corporation CCC
CIGNA
Creative Crafts
Delta-Waverly Jaycees
Det Coun of Perf Arts
Detroit Bulk Mail Center
Detroit Urban Lutheran School
Detroit Youth for Christ
Dorvins
E & L Cals
Engineer Plastic Prod
Evergreen Estates
Express Campaign Inter
FDM
For a friend
Fred Silber's
Garan, Lucow, Miller P C
Geometric Results Inc
Gerber Childrens Center
GOIC
Guarantee Electric Co
House of Winslow
Hubbard Richard Comm Count
Hylton & Hylton P C
Instruction Technology
Interior Design Program
Intervale Fuel Corp
Jack Gell & Co
Jackson Building
Jackson-Randolph School
Joan Bari
Joe's Hobby Center Inc
Kanners & Patrinze Co
Kelly Services
Ken Morris Cen
Lady Rose
Lear Seating Corporation
Learning Resource Center
Lechters
Lewis, White and Clay
Management Info & Planning
Media Base Research Corp
Metro Airport Cab
Michigan Citizen News
Michigan Telefund
National Handi Workers
National Repor Corp
Noel Enterprises
Nordhaus Research
Office Max
Olympia Avenas Inc
One Stop Western Union
P G F Ind
Page Net Paging Network
Parent
Patton Homes
Peter Hart Research
Phillips Electric
Phone Bank Systems Inc
Physical Plant
Premier Marketing
Private Company
Production Services Inc
Project Community
Public Benefit Corp
R A S Financial Inc
Ralph Bunch Co-op
Realtron Printing Co
Renaissance Wrecking Inc
Roney & Company
Rose Imaging Center
Sage McHay & Co Inc, (NY)
Schad Boilers
Service Master Food Mgmt

MISCELLANEOUS (Cont'd)

Sleepy Hollow
Special Projects
St Annes Mead
Staff Builder's
Stillman
Strawberry Hills
Sun Vision Inc
T & T Electric
Tech, Inc thru Kelly Serv
Teltron Commun Systems
Temporary Associates
The Cathedral School
Thingz Inc
Towers of Southfield
TSI, CDI, ADIA
Unibar Maintenance
Unisys Federal
United Marine Corp
United Methodist Church
United Parcel Service
United Parcel Service (Phoenix)
United Transfer Loaded
United Way
Value by Mail Marketing Co
Van Dresser
Village Green Mgmt Co
Vispac
Volunteer's of America
Ward's Communications
Windemere
Woodland DMC
Woods Heating & Cooling
Wright & Brown
Zip Mail
Zip Mail Service

HISTORY OF GRADUATE FOLLOW-UP STUDIES IN DETROIT[32]

As early as 1944, the Detroit Public Schools Guidance and Counseling Department conducted a survey of senior high school students with regard to their educational and vocational plans. By 1964, this survey approach included the cooperative efforts of the Michigan Employment Security Commission (MESC) in working with the local school personnel to obtain survey data. The usual survey approach was to enter high school study halls, explain the purpose of the questionnaire, give information about the current purpose of the questionnaire, give information about the current labor market and services available through MESC. By 1970, this survey approach was discarded because of the social and economic pressures which were beginning to raise issues as to the effectiveness of education and society to provide for post high school student needs.

At the beginning of the decade, a school-leaver project was developed by the MESC and the Detroit Public Schools, in cooperation with the United States Department of Labor. The thrust of the project was to identify those elements which caused students to leave school before graduation. The project sample was only 256 in number and dealt with individuals over twenty-five years of age.

In 1972, Region Seven of the Detroit Public Schools formally adopted a follow-up study approach which had been periodically used at Denby High School. Each Region Seven graduate was sent a two-part, pre-paid postal card having one section as the questionnaire. The questionnaire was then to be mailed to the Department of Guidance and Counseling. The questions on the postcard dealt with employment, college attendance, institutional enrollment other than college, apprenticeship programs, military status, marital status, and receipt of financial aid. This approach continued until 1977 when the report noted that data collection was decreasing at a rate which was hampering the study. Factors such as decreasing enrollment, population mobility, and problems of forwarding postcard questionnaires to new addresses, affected the survey return rate.

In 1972, the Detroit Public Schools Department of Business Education, in conjunction with the Michigan Department of Education, developed an annual study of all graduates, city-wide, who had previously been enrolled in vocational programs that were financially reimbursed by the Michigan Department of Education.

During the spring of 1976, a city-wide follow-up study proposal was developed by a committee of Detroit Public Schools personnel. The proposal was approved by the administration and funded by the Michigan Department of Education, with ESEA, Title IV B funds. The initial phases of the program were implemented during the 1976-77 school year. The first city-wide follow-up study of the 1977 graduates was completed and published in the fall of 1978.

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[32]This short history of graduate follow-up studies in Detroit first appeared in Linda Leddick and Denny Stavros, "Follow-up Study of 1988 Graduates," Detroit Public Schools, 1990, pp. 45-45. Changes in the survey instrument and methodology in the 1989 survey are present above. For purposes of comparison, 1989 return rate data are included here.

The study format remained constant until the 1988-89 school year when the responsibility for conducting the study was shifted to the Office of Research, Evaluation and Testing. The content of the survey instrument was revised by a committee of educators representing schools and area and central offices, respectively. The new instrument was first used for the collection of data from June, 1988 graduates.

The percent of graduates responding to the survey has varied over the years, with the overall trend being one of fewer responses each year. The number of surveys mailed, the number returned, and the percent returned for all years since 1977 are presented in the following table.

GRADUATE FOLLOW-UP STUDY RETURN RATES

Date	Number Mailed	Number Returned	Percent Returned
1977	9446	3441	36%
1978	7437	2340	32
1979	8559	2901	34
1980	6562	2487	38
1981	7518	2744	37
1982	8232	2598	32
1983	7774	2394	31
1984	7550	2121	28
1985	6028	1744	29
1986	6075	1828	30
1987	5213	1320	25
1988	7329	1771	24
1989	7395	1687	23