

MICHIGAN BUSINESS STUDIES

VOL. III, NO. 1

SEPTEMBER, 1930

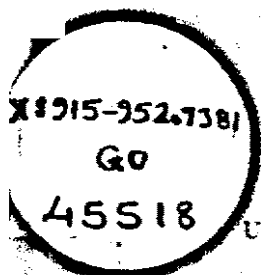
EARNINGS OF WOMEN IN BUSINESS AND THE PROFESSIONS

BY

MARGARET ELLIOTT

AND

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UNIVERSITY OF MICHIGAN
SCHOOL OF BUSINESS ADMINISTRATION
BUREAU OF BUSINESS RESEARCH
ANN ARBOR
1930

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AUTHORS' NOTE

This study is an adventure in co-operative research in the occupational achievement of business and professional women. Late in 1926, the National Federation of Business and Professional Women's Clubs agreed to co-operate with the Bureau of Business Research of the University of Michigan in making an occupational study to be based upon the work histories of the members of the National Federation. It was arranged that the Federation should oversee the distribution and "follow-up" of the questionnaire sent to more than 46,000 Federation members through their local clubs. The Bureau, in turn, was to assume entire financial and executive responsibility for the undertaking.

Sceptics who looked at the eight-page questionnaire on which it was proposed to base the study predicted returns varying anywhere from fifty to five hundred. Apparently, however, they failed to reckon with the enthusiastic interest of the group which was to supply the factual material. In spite of the detailed information sought, 14,858, or 31.8 per cent of the 46,760 questionnaires distributed, were returned, and of these 14,073 contained enough facts to be useable.

For counsel and assistance in the collection and analysis of the data contained in this study, our indebtedness is both real and widespread. The high percentage of questionnaires returned is largely due to the persistent efforts of the national, state, and local officers of the Federation, under the able leadership of the president, Lena Madesin Phillips, and to the generosity of the editor of *The Independent Woman*, the official organ of the Federation, who gave space for publicity.

Of the members of the staff of the Bureau of Business Research who have assisted in the tabulation and analysis of the data, we wish especially to acknowledge the responsible share taken by Richard C. Moore, Charlotte S. Horner, Esther A. Weil, Elizabeth H. Sams, and William H. Shannon. Through the various phases of the study, Dr. Edmund E. Day, formerly Dean of the School of Business Administration of the University of Michigan, Dean Clare E. Griffin, Professor C. S. Yoakum, and Professor O. W. Blackett have given generously of their counsel.

MICHIGAN BUSINESS STUDIES

This monograph, which is the first of a series now in preparation, analyzes the present occupational status of the group, with special emphasis on earnings in the various occupations and types of work. Later monographs will include studies of promotions based on full occupational histories of the group, occupational interests, and special vocational groups, such as clerical workers. Together they will, it is hoped, help to remove from the realm of conjecture some debated questions concerning the economic position of women workers above the wage-earning level. More immediately, however, they may be of assistance to vocational counsellors in advising women in their choice of work.

The text has purposely been adapted to persons unfamiliar with statistical analysis. This was done in the belief that those who have a more scientific interest in the results of the study will be best served by the tabulations themselves rather than by an interpretation of their contents. To those who attach a certain finality to the testimony of figures, our analysis may at times seem equivocal and inconclusive. Yet it is perhaps better to err on the side of reading too little rather than too much into the indicated relationships, especially in so complex a subject as possible causes of differences in earnings.

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EARNINGS OF WOMEN IN BUSINESS AND THE PROFESSIONS

SUMMARY AND CONCLUSIONS

This study is based on the collective occupational experience of fourteen thousand business and professional women. These women, who are members of the National Federation of Business and Professional Women's Clubs, constitute a mature, experienced, and well-educated group, more than half of whom live in small or medium-sized communities. Their occupations may be taken as representative of women workers above the wage-earning level throughout the country.

If, as it appears, the group is generally representative of business and professional women, the following conclusions, subject to minor qualifications which are indicated later, seem justified:

1. With a few spectacular exceptions, women in business and the professions are not highly paid. Women who are independently engaged in work of this sort earn considerably more than those employed on a salary basis.¹

2. About three-fourths of the women are employed in commercial, educational, and manufacturing organizations. More women are engaged in clerical work than in work of any other sort. Next in importance is teaching, with sales and publicity work in third place.

3. The chances of high earnings are about twice as great for women working in commercial and manufacturing organizations as for those employed in educational institutions; and a much larger proportion of women in sales and publicity work have high earnings than in either clerical work or teaching.

4. Earnings increase with experience for about the first twenty years of work, remain fairly constant for the next ten years, and then decline.

5. Earnings increase with age up to fifty years, vary but little between fifty and sixty, and decline thereafter. The tendency for earnings to drop after the age of sixty is not apparent in all kinds of work.

¹For comparative figures see p. 13.

6. Earnings, living expenses, and savings increase with the size of the community in which the women are working. The proportion of earnings, however, which goes for living expenses and also into savings remains fairly constant, regardless of the size of the community.

7. If allowance is made for differences in age and experience, single women earn most and married women least, while somewhere in between fall the earnings of widows and women who are divorced or separated from their husbands.

8. Earnings tend to increase with years of general education, that is, grade school, high school, and college or university work. For those who have had additional technical or professional education, earnings also increase with years of general education previous to their special training.

9. Women who have been graduated from a college or university are earning more in every kind of work than women with less education. They tend, however, to concentrate in lower paid fields of work, such as teaching and clerical work.

10. The value of business or commercial college training, measured in earnings, seems to vary inversely with the amount of previous education.¹ Women with only grade school education benefit most from it, while, with minor exceptions, college graduates who have had business college training earn less than the total group of college women.

11. The charge of occupational instability, which is sometimes preferred against women workers, seems to be unfounded. This is apparent from the number of different occupations engaged in by women, and also from their period of service with their present employers.

12. There is some evidence that women who have worked for two or more different employers during their first ten to fifteen working years have profited by the change, although in the long run women who have remained longest with their present employers have higher earnings than those who have made a change. Doubtless selective factors are

¹Throughout the study, a business or commercial college is taken to mean a school where stenography, typing, bookkeeping, filing, and related subjects are taught.

important in this situation. But in any case, a woman who has worked twenty years or more seems to be confronted with the probability of a drop in earnings if she shifts to a new employer.

13. For most women, earnings in their chief occupation are the only important source of income. Relatively few have any income from inheritance, gifts, or supplementary work; and although a larger number have some income from savings, in the great majority of cases the amount saved is small.

14. It is a relatively simple matter to indicate in what way earnings vary with certain known factors like age, experience, and education; but it is quite another to discover why these variations occur. With data such as these, where not only are the various influences on earnings closely interwoven, but also information on some of these influences is not available, definitive statements concerning causes of differences in earnings are not justified.

Part I

THE GROUP STUDIED AND THEIR EARNINGS

THE GROUP STUDIED

The achievements of women in business and the professions have been the subject of much discussion, but relatively little scientific analysis. For although exhaustive studies of wage-earning women have been made by federal and state departments of labor, there is still a conspicuous lack of quantitative data concerning the status of women at higher occupational levels. How much do they earn? With what success, measured in numbers and earnings, are they venturing into the "newer" occupations for women? How important are such factors as age, experience, marital status, and education in their effect on earnings? What proportion of women in business or professional work have dependents? How do expenditure and saving vary with income? On these and many related questions, this study presents evidence from the collective experience of over fourteen thousand women now engaged in business and professional work.

The study, the first results of which appear in the following pages, has been made possible through the co-operation of the National Federation of Business and Professional Women's Clubs, an organization with a present membership of approximately fifty-three thousand. These women are grouped in 1,018 clubs in 47 different states of the United States. At their annual convention in 1926, the Federation voted to co-operate with the Bureau of Business Research of the University of Michigan in a study of the occupational achievement of business and professional women. It was agreed that the Federation should supply the information through questionnaires distributed to its entire membership, then numbering over forty-six thousand, and that the Bureau should assume full responsibility for the preparation of the questionnaire and the analysis and publication of data.

An eight-page questionnaire was prepared, covering such topics as education, marital status, dependency, mode of living, financial status, and occupational history. The first blanks were sent out in November, 1926. In the course of the next year, 46,760 questionnaires were

distributed through 813 local clubs, of which number 14,073, or 30.1 per cent, were returned containing enough information to be useable.¹

The value of any statistical study depends, in the first instance, upon the reliability of the original data on which it is based. Here there are two measures for evaluating the data used—first, the accuracy of the information contained in the questionnaires, and second, the quality of the sampling of 14,073 cases included in the study. We need to know not only that the women who returned their questionnaires have given an accurate statement of facts; but we need also to know to what degree they, as a group, are representative of the organization to which they belong, and, more generally, of all gainfully employed women at higher occupational levels in the country.²

We find no reason to suppose that inaccurate information was intentionally given in the questionnaires. A possible motive for falsifying was removed by omitting all means of identification from the blanks. Those who filled out the questionnaires mailed them anonymously to the Bureau of Business Research. There, as was explained to the members of the Federation, the information was handled by a statistical staff in the employ of the Bureau, which had no connection with the Federation. Further assurance was given that no officer or member of the Federation should ever have access to the questionnaires. It seems, therefore, that if inaccurate information were given, it can be ascribed almost entirely to carelessness. Errors of this sort could usually be detected through inconsistencies in different sections of a questionnaire. Whenever there was lack of agreement between facts contained in a blank, it was discarded, or, if possible, corrections were

¹A copy of the questionnaire may be found in Appendix V, p. 204. For a detailed description of the methods of distribution and "follow-up" of the questionnaires, as well as the technique of handling the data contained in them, see Appendix V, pp. 203-215.

²In comparing our group with all women workers in the country according to the 1920 census, it was of course necessary to exclude factory workers, agricultural and other laborers, and domestic servants from both groups, since only fifty-one of the women included in this study are engaged in work of this sort, as compared to over four million women, or half of all who are gainfully employed in the country as a whole. The term "higher occupational levels" refers to non-manual work, i.e., excluding factory work, domestic service, and farm labor.

made. This applied particularly to occupational titles, which were changed, if necessary, to conform to the description of duties performed.

To insure uniformity in interpreting the questions, careful directions for filling in questionnaires were sent to each local club.¹ This information was made available to club members either at a special meeting at which the questionnaires were distributed and discussed, or by individual consultation with the club officer in local charge of the survey. By reducing the chances for misinterpretation in this way, the possibility of error was further diminished. It therefore seems safe to say, in view of these various checks and corrections for inaccuracies, that error in the original data is at a minimum for material assembled through the use of questionnaires.

A second measure for determining the value of our data is the quality of the sampling of 14,073 cases included in the study. Are the women who returned their questionnaires representative of the National Federation of Business and Professional Women's Clubs? The answer to this question is of immediate importance to the members of the Federation. More crucial, however, is the question whether or not the group, whose occupational histories form the basis for our conclusions, is representative of all women at higher occupational levels throughout the United States.

Various tests have been used to appraise our sampling of cases.² In geographical distribution, the group is an accurate miniature of the entire National Federation, although compared to gainfully employed women throughout the country, it is overweighted for the East and West North Central States, and underweighted for New England, New York, New Jersey, and Pennsylvania. More than half the members of the reporting group live in small or medium-sized communities, with a population varying from 2,500 to 25,000. This is in marked contrast to the country as a whole, where only one in six white women lives in a community of this size. Offsetting this, very small communities and large cities, with populations of less than 2,500 and more than 500,000, respectively, have correspondingly scanty representation

¹Appendix V, p. 209.

²The results are shown in Tables 1, 4, and 5; also Appendix I, Tables 1, 2, and 3, pp. 121-124.

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TABLE 1—AGE DISTRIBUTION OF REPORTING GROUP IN 1927 COMPARED WITH THAT OF ALL GAINFULLY EMPLOYED WOMEN 18 YEARS OF AGE AND OVER IN THE UNITED STATES IN 1920¹

Age (years)	Per Cent in U. S.	Per Cent in Reporting Group
18-24.9	34.4	10.7
25-44.9	45.0	60.6
45-64.9	17.8	26.1
65 and over	2.6	0.9
Information missing	0.2	1.7
Total per cent	100.0	100.0
Total number	7,593,709	14,071 ²
Median age ³	29.1 years	37.7 years
Lower quartile	21.2	29.6
Upper quartile	41.6	46.9

¹U. S. Census of 1920, Vol. IV.

²Two cases below 18 years of age.

³See p. 201 for definitions of median and quartile.

TABLE 2—YEARS OF WORK EXPERIENCE

Experience in 1927 (years)	Number of Women	Per Cent of Total
Less than 5	1,559	12.1
5-9.9	2,961	23.0
10-14.9	2,585	20.1
15-19.9	2,085	16.2
20-24.9	1,618	12.6
25-29.9	1,045	8.1
30 and over	1,021	7.9
Information missing	1,199	...
Total	14,073	100.0
Median experience ¹		13.7 years
Lower quartile		7.8
Upper quartile		21.4

¹See p. 201 for definitions of median and quartile.

in our group. This heavy concentration in population centers varying from 2,500 to 25,000 should be borne in mind in subsequent analysis.

The group is clearly a mature one, measured either in terms of age or years of work experience (Tables 1 and 2). The median age for the 13,837 women who report their age is 37.7 years, in contrast to 29.1 years for all gainfully employed women in the United States in ✓ 1920. Median age is that age above and below which 50 per cent of the

TABLE 3—WEEKLY HOURS OF WORK

Work Hours per Week in Present Position in 1927	Number of Women	Per Cent of Total
Less than 15	40	0.3
15-19.9	76	0.6
20-24.9	150	1.1
25-29.9	238	1.8
30-34.9	793	6.0
35-39.9	1,223	9.3
40-44.9	3,549	27.1
45-49.9	3,931	30.0
50-54.9	1,744	13.3
55 and over	1,375	10.5
Information missing	954	...
Total	14,073	100.0
Median work hours per week ¹		45.6
Lower quartile		41.1
Upper quartile		49.8

¹See p. 201 for definitions of median and quartile.

cases lie.¹ It is interesting that although approximately half of all the gainfully employed women in the country are under 29.1 years of age, only one-fourth of the women in our group are below that age.

As these figures suggest, we are apparently not dealing here with temporary workers. The group is unmistakably an experienced one,

✓ ¹More exactly, the median is the size of the middle item in a series arranged in order of magnitude. Fifty per cent of the total number of cases, when arranged in order of magnitude, lie below it, and 50 per cent above it. Throughout the study, we have used the median as a representative measure in preference to the arithmetic average, since it is not, like the latter, subject to distortion by very large or very small items.

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TABLE 4—EDUCATION OF REPORTING GROUP IN 1927 COMPARED WITH SCHOOL ENROLLMENT OF WOMEN IN THE UNITED STATES IN 1900, 1910, AND 1924¹

School Attended (public or private)	Per Cent of Women Students in United States			Per Cent of Reporting Group in 1927
	1900	1910	1924	
Elementary school	94.0	91.9	82.0	11.2
High or secondary school	4.9	6.6	15.3	49.4
Normal school or teachers' college	0.6	0.8	0.8	12.6
University, college, or professional school	0.5	0.7	1.9	26.8
Information missing	...	...	...	...
Total per cent	100.0	100.0	100.0	100.0
Total number	7,768,253	9,060,275	12,602,322	14,073

¹*Statesman's Year Book*, 1902, pp. 1204-1206; *ibid.*, 1912, pp. 375-376; *ibid.*, 1927, pp. 447-448.

TABLE 5—MARITAL STATUS OF REPORTING GROUP IN 1927 COMPARED WITH THAT OF ALL GAINFULLY EMPLOYED WOMEN IN THE UNITED STATES IN 1920¹

Marital Status	Per Cent of All Women 15 Years of Age and Over	Per Cent of Gainfully Employed Women 15 Years of Age and Over	Per Cent of Reporting Group
Married	60.6	23.0	14.3
Single, widowed, divorced, and information missing	39.4	77.0	85.7
Total per cent	100.0	100.0	100.0
Total number	35,177,515	8,346,796	14,073

¹U. S. Census of 1920, Vol. IV.

since half of them have worked more than 13.7 years. Only one woman in four has been gainfully employed less than 7.8 years, and to offset these, one in four has worked over 21.4 years (Table 2). There are, moreover, relatively few part-time workers in the group. Seventy per cent report working hours varying from 40 to 55 a week. The median

number of hours of work weekly for all those giving this information is 45.6 (Table 3).

The group, measured in terms of education, is a highly selected one. Fifty per cent have attended or been graduated from secondary schools. This is in marked contrast to the figures for the United States as a whole, for in 1924 only 15.3 per cent of all women students in the country were enrolled in secondary schools. At the college or university level, moreover, the difference is even more striking. One in every four women included in this study has attended or been graduated from a college or university, although in 1924 only one in fifty women students in the country was in attendance at a college or university (Table 4).

Of the women who report concerning marital status, 71.5 per cent are single, 15.2 per cent married, 7.5 per cent widowed, and 5.8 per cent divorced or separated from their husbands. It is not possible to say how these figures compare with those for all gainfully employed women in the country, since the census of 1920 includes single, widowed, and divorced women in one group total (Table 5). The proportion of employed married women for the whole country in 1920 was 23 per cent as compared with 14.3 per cent for the 14,073 cases in this study.¹ This difference can almost certainly be accounted for by the relatively large number of manual workers included in the federal census.

Probably the most important single test of the quality of our sampling of cases is to be found in the occupational distribution of the group. Is it representative of the Federation membership, and also of women's work at the business and professional level throughout the country? The first question can be answered with an unequivocal affirmative from figures obtained in a Federation census of occupations including over forty thousand members. The agreement, however, is less close between the occupational distribution of our group and that of all women workers in the country in 1920—exclusive, that is, of

¹The reason for the apparent difference in percentages of married women in the reporting group—14.3 per cent here as against 15.2 per cent indicated above—is that the proportion of cases not reporting marital status was not calculated in the first distribution, thus giving 15.2 per cent of the total number of cases instead of 14.3 per cent when, to conform with census practice, "unknown" cases were included in one total with those of single, widowed, and divorced women.

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TABLE 6—ANNUAL EARNINGS

Annual Earnings in 1927 (dollars)	Salaried Workers		Independent Workers		Total Group	
	Number	Per Cent of Total	Number	Per Cent of Total	Number	Per Cent of Total
Less than 500	98	0.79	16	2.26	114	0.86
500- 999	1,650	13.21	68	9.60	1,718	13.02
1,000-1,499	3,950	31.63	133	18.79	4,083	30.94
1,500-1,999	3,850	30.83	108	15.25	3,958	30.00
2,000-2,499	1,707	13.67	106	14.97	1,813	13.74
2,500-2,999	565	4.53	57	8.05	622	4.71
3,000-3,999	475	3.80	92	12.99	567	4.30
4,000-4,999	106	0.85	40	5.65	146	1.11
5,000-5,999	43	0.34	40	5.65	83	0.63
6,000-6,999	17	0.14	15	2.12	32	0.24
7,000-7,999	9	0.07	7	0.99	16	0.12
8,000-8,999	5	0.04	13	1.84	18	0.14
9,000-9,999	2	0.02	0.0	0.00	2	0.02
9,900 and over Information missing	10	0.08	13	1.84	23	0.17
	610	....	268	....	878	....
Total	13,097	100.00	976	100.00	14,073	100.00
	Median salary ¹	\$1,540	Median earnings ¹	\$2,043	Median earnings ¹	\$1,548
	Lower quartile	1,211	Lower quartile	1,261	Lower quartile	1,213
	Upper quartile	1,945	Upper quartile	3,072	Upper quartile	2,004

¹Calculated on \$100 class intervals. See p. 201 for definitions of median and quartile earnings.

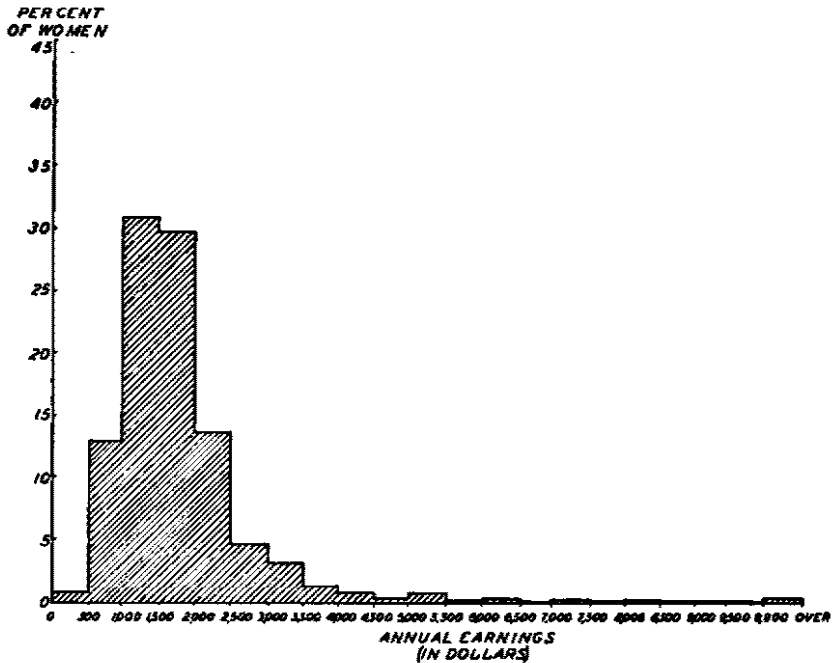
factory workers, agricultural and other laborers, and domestic servants.¹ Approximately three-fourths of the reporting group, as against two-thirds of all women in the country in "non-manual" occupations as defined here, are engaged in clerical work, teaching, and sales and publicity work. But there are more conspicuous differences than this in the occupational distribution of the two groups. The so-called "newer" occupational fields of finance, law, welfare, and editorial work

¹See Appendix I, Table 3, p. 124; also, for the Federation census of occupations, Appendix III, p. 133 ff.

TABLE 7—PERCENTAGE OF REPORTING GROUP EARNING \$2,500 AND OVER

Annual Earnings in 1927 (dollars)	Salaried Workers		Independent Workers		Total Group	
	Number	Per Cent of Total	Number	Per Cent of Total	Number	Per Cent of Total
Less than 2,500	11,255	90.13	431	60.88	11,686	88.56
2,500 and over	1,232	9.87	277	39.12	1,509	11.44
3,000 and over	667	5.34	220	31.07	887	6.73
4,000 and over	192	1.54	128	18.08	320	2.43
5,000 and over	86	0.69	88	12.43	174	1.32
9,900 and over	10	0.08	13	1.84	23	0.17
Information missing	610	....	268	....	878	....
Total	13,097	....	976	....	14,073	....

CHART I—ANNUAL EARNINGS



claim relatively more of our group, while the more traditional fields of food and housing work, personal service, and production include a distinctly smaller proportion.¹ Yet despite these differences, it seems fair to say that the reporting group is, on the whole, representative of women's work at the higher occupational levels throughout the country.

With a few spectacular exceptions, the group we are studying is not a highly paid one (Tables 6 and 7 and Chart 1). Their median earnings are \$1,548.² By contrast, average earnings for the group are \$1,662, or \$114 above the median earnings figure—a difference which reflects the influence of relatively few cases of high earnings which are not representative of the group as a whole. This is further apparent from the fact that one woman in four in the total group earns less than \$1,213, while a similar proportion earns over \$2,004. Of the 13,195 women reporting earnings, only 6.7 per cent are earning \$3,000 or over. These figures, it should be noted, include 1927 salaries in the chief occupations, or, for the independent workers, "net business earnings." They do not include any supplementary income, earned or unearned. The data for income of this sort are later analyzed independently.³

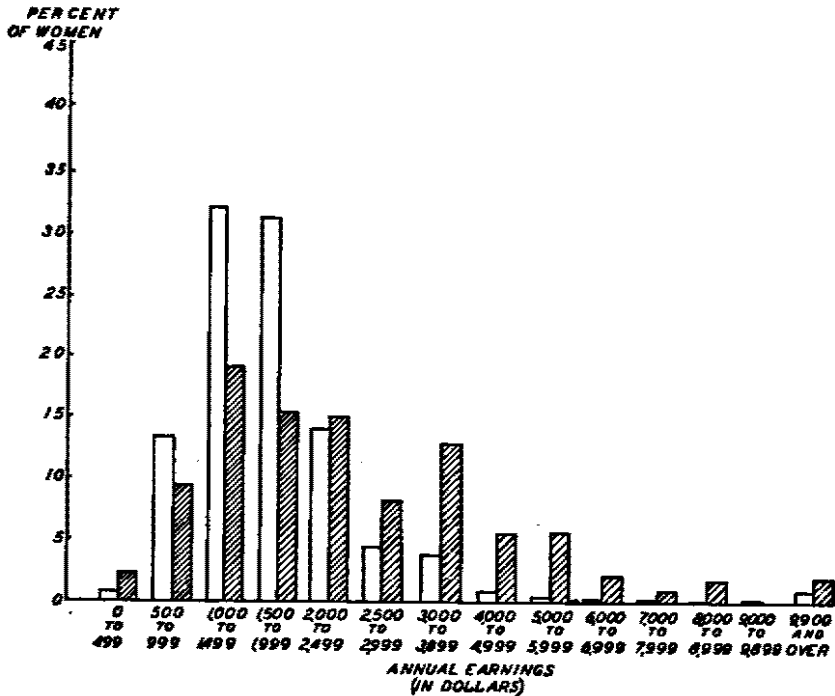
There are notable differences in earnings between women who are independently engaged in business or professions and those employed on a salary basis (Chart 2). Not only are their median earnings \$503 above those of the salaried workers, but approximately one in three earns \$3,000 or more a year, while only one in twenty of the salaried women earns this amount.⁴

¹See p. 15 ff. for a description of the classification used.

²In 1926, average annual earnings of wage-earners, excluding farm laborers, were \$1,444, while \$1,699 was the per capita income for the 99 per cent of all the forty odd million income recipients in the country whose incomes were less than \$8,700. P. H. Douglas, *Real Wages in the United States* (Boston: Houghton Mifflin Co., 1930), p. 391; and National Bureau of Economic Research, *News Bulletin*, No. 34, November 8, 1929.

³Analysis of supplementary income will be found on p. 103. For fuller definitions of earnings, "net business earnings," median, and quartile, see Appendix IV, p. 201. It should be noted that the earnings figures given above are derived from a distribution in which intervals of \$100 are used. When \$200 intervals are used, the earnings median for the total group is \$1,526, instead of \$1,548. Minor discrepancies in figures for earnings in later tables are to be accounted for by differences in the size of the interval used.

⁴The National Bureau of Economic Research, in a study of incomes in the United States in 1918, shows that 6 per cent of all income recipients in the country, both men and women, had incomes of \$3,000 or over for that year. Un-

CHART 2—COMPARISON OF EARNINGS OF SALARIED AND INDEPENDENT WORKERS¹

¹Solid white bars represent salaried workers; obliquely shaded bars represent independent workers.

Briefly, then, the evidence contained in these comparative figures seems to indicate that the group of women we are studying may be taken as representative of mature, experienced women at the higher occupational levels throughout the country. There are certain respects in which the sampling of cases might be improved. One might wish that relatively more women from large cities, and relatively fewer clerical workers were included. Yet considering the hazards involved in securing information through questionnaires, even under the most favorable circumstances, the results may probably be regarded as satisfactory both in quantity and quality.

fortunately, the corresponding figures for 1927 are not available, but it is fair to suppose that a larger proportion of recipients had incomes equal to or exceeding \$3,000 in that year. *Income in the United States*, I, 135.

EARNINGS IN DIFFERENT OCCUPATIONS AND OCCUPATIONAL GROUPS

Interest in any study of occupations quite naturally focuses on earnings. What may one hope to earn in any given occupation? Why do earnings vary in the same kind of work? The first of these questions is answered in Appendix II for occupations represented in our group by ten or more women. In analyzing possible causes of differences in earnings, however, it becomes a practical impossibility, because of the number of different occupations, to consider each one independently. There are among the 14,073 cases more than sixty-six hundred combinations of jobs and employers or work organizations, such as stenographer in a doctor's office, stenographer in a bank, and so on. In Appendix III is given the complete occupational distribution of the reporting group, together with that of approximately forty thousand Federation members included in their national census in 1928. They merit careful study. In no other way can the range of occupations represented in the Federation or in the reporting group be fully comprehended.

Because of the impossibility of analyzing each occupation independently, occupational groups, not specific jobs, become the basis of much of the analysis that follows. For this reason, an understanding of the method of grouping occupations is essential. A dual scheme of classification has been used here. Occupations were first grouped by "fields of employment"—that is, according to the nature of the business or organization in which the work is carried on—as follows:

- | | |
|----------------|------------------------------------|
| 1. Commerce | 5. Primary production ¹ |
| 2. Education | 6. Professional ² |
| 3. Government | 7. Semi-public ³ |
| 4. Manufacture | 8. Transportation ⁴ |

Occupations have also been classified on the basis of the nature of the work performed, without reference to the employer's business or

¹"Primary production" includes agriculture, animal husbandry, and mining.

²Only independently employed professional workers are classified as "professional." All others are segregated according to the kind of organization in which they are employed.

³"Semi-public" includes civic, eleemosynary, fraternal, and religious organizations.

⁴Transportation includes communication, i.e., telephone and telegraph companies.

the organization in which the job was carried on. The "types of work" included in this second classification, arranged in order of their numerical importance in this study, are:

- | | |
|---|--|
| 1. Clerical | 11. Editorial |
| 2. Teaching | 12. Purchasing |
| 3. Sales and publicity | 13. Research |
| 4. Health | 14. Personnel |
| 5. Finance | 15. Service ¹ |
| 6. Production and planning | 16. Professional, not
elsewhere classified |
| 7. Food, housing, and
personal service | 17. Religious |
| 8. Welfare | 18. Administrative, not
elsewhere classified ² |
| 9. Library | 19. Amusements |
| 10. Legal and protective | 20. Political |

In this second classification, professional workers are segregated according to the nature of their work—physicians under *Health*, ministers under *Religious*, authors under *Editorial*, and lawyers under *Legal and protective*. All treasurers are grouped together under *Finance*. Accountants, who by their description of duties and training were clearly of professional rank, are classified under *Finance*, while those who, though calling themselves accountants, were judged by their

¹This group includes miscellaneous auxiliary occupations, such as traffic manager, and claim adjuster; also, all postal service work.

²Contrary to the general principle of this classification, proprietors, managers, and general executives have been classified according to the kind of organization of which they are officials. This was done for two reasons—first, to avoid a large, miscellaneous administrative group, and, second, because these occupational titles mean comparatively little unless attached to the industry, business, or organization in which the work is carried on. By subdividing owners and general officials in this way, proprietors and managers of office service bureaus are grouped under *Clerical*, while similar positions in schools and theaters appear under *Teaching* and *Amusements*, respectively, hospital managers under *Health*, and restaurant owners or managers under *Food, housing, and personal service*. A few proprietors and general executives did not fall logically in any of the occupational groups. These are included in the group, *Administrative, not elsewhere classified*.

The reader is again referred to Appendix III, p. 133ff., for a complete list of the occupations included in each of these groups.

TABLE 8—EARNINGS IN DIFFERENT FIELDS OF EMPLOYMENT

Field of Employment	Number of Women	Per Cent of Total	Earnings in 1927 ¹			Per Cent Earning \$3,000 and Over	Median Experience (years)
			Lower Quartile	Median	Upper Quartile		
Commerce	4,743	35.7	\$1,065	\$1,436	\$1,849	8.2	13.7
Education	3,088	23.2	1,253	1,558	1,949	3.7	13.3
Manufacture	1,922	14.4	1,216	1,554	1,999	7.2	14.4
Government	1,194	9.0	1,336	1,803	2,150	5.3	14.8
Professional	1,021	7.7	1,194	1,554	2,046	11.8	12.5
Semi-public ²	831	6.2	1,529	1,854	2,269	7.3	14.6
Transportation	448	3.4	1,197	1,435	1,683	2.3	12.8
Primary production	55	0.4	1,233	1,750	2,200	10.4	13.2
Information missing	771	...	1,077	1,470	1,922	6.9	13.8
Total group	14,073	100.0	\$1,213	\$1,548	\$2,004	6.7	13.7

¹Calculated on \$100 class intervals. See p. 201 for definitions of median and quartile earnings.

²Civic, eleemosynary, and fraternal organizations.

description of functions to have essentially clerical duties are included in the clerical group.¹

¹Two illustrations will perhaps help to make clear the difference between these two schemes of classification. In the first we find a group designated *Education*; the corresponding group title in the second classification is *Teaching*. The difference between them is this: In *Education* are included all jobs which are carried on in educational institutions, from school principal to cafeteria manager or stenographer. In *Teaching*, however, one finds only school principals and general executives in educational institutions, and teachers. A cafeteria manager in a school, according to the second classification, is grouped with all other cafeteria managers under *Food, housing, and personal service*.

The difference between the two classifications may be further illustrated by the position of physicians in each. In the first classification, physicians are segregated according to the nature of the organization in which they are employed. Physicians in public school work are classified under *Education*; under *Government*, if they are connected with a city health department, or, if they are engaged in private medical practice, under *Professional*. If, however, occupations are classified on the basis of the task performed, as in the second classification, all physicians are included under *Health*.

The first of these two classifications—by “fields of employment”—reveals a marked concentration of cases in *Commerce, Education, and Manufacture*, as shown in Table 8. Approximately one in three of the women reporting is employed in a commercial organization, and one in four is working in an educational institution. Together these three fields of commerce, education, and manufacture command the services of 73.3 per cent of the total group. With the exception of *Primary production*, however, all the groups are probably large enough to show definite tendencies.

There are conspicuous differences in earnings between these groups. Median earnings vary anywhere from \$1,435 in the transportation group to \$1,854 in civic, eleemosynary, and fraternal organizations—designated *Semi-public* in this classification. First quartiles, with 25 per cent of the cases showing lower earnings, range from \$1,065 in *Commerce* to \$1,529 in *Semi-public*. Third quartiles, with 25 per cent of the cases showing higher earnings, vary from \$1,683 in *Transportation* to \$2,269 in *Semi-public*. Earnings are noticeably lower in *Transportation, Commerce, Education, and Manufacture* than in *Government, Professional, and Semi-public*.¹

A comparison of earnings at the upper extremes in these groups is notably to the disadvantage of *Transportation and Education*. It is perhaps not surprising that only 2.3 per cent of the transportation group are earning \$3,000 or over, since four out of every five women in it are either clerical workers or telephone operators. But in *Education* it is a different matter. Only 3.7 per cent of the women employed in educational institutions report earnings of \$3,000 or more, despite the

¹One is tempted to offer as an explanation of the differences in earnings in Table 8 the varying proportions of clerical workers included in the different groups, ranging anywhere from 8.8 per cent in *Education* to 67.6 per cent in *Manufacture*. The argument is apparently not tenable, however, for these two groups, which represent the two extremes in the relative number of clerical workers included in them, have almost identical median and quartile earnings. Nevertheless, it is true that earnings are lowest in *Transportation*, where 80.8 per cent are either clerical workers or telephone operators, and highest in *Semi-public*, in which group only 23.3 per cent are clerical workers. The percentages of clerical workers in each of the groups in Table 8 are as follows: *Manufacture, 67.6; Primary production, 67.3; Transportation, 65.8; Commerce, 52.4; Government, 45.9; Professional, 43.4; Semi-public, 23.3; Education, 8.8.*

EARNINGS OF WOMEN

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TABLE 9—EARNINGS IN DIFFERENT TYPES OF WORK

Type of Work	Number of Women	Per Cent of Total	Earnings in 1927 ¹			Per Cent Earning \$3,000 and Over	Median Experience (years)
			Lower Quartile	Median	Upper Quartile		
Clerical	5,862	42.8	\$1,161	\$1,467	\$1,830	2.6	12.1
Teaching	2,689	19.7	1,253	1,557	1,965	4.0	13.6
Sales and publicity	1,469	10.8	1,019	1,531	2,220	15.2	16.4
Health	894	6.5	1,382	1,835	2,418	14.1	13.3
Finance	602	4.5	1,511	1,864	2,498	17.7	16.9
Production and planning	453	3.4	968	1,295	1,870	8.3	15.5
Food, housing, and personal service	418	3.1	1,219	1,860	2,494	13.7	13.8
Welfare	315	2.3	1,664	1,911	2,434	7.0	15.6
Library	295	1.5	1,230	1,621	2,458	5.5	16.2
Legal and protective	182	1.3	1,356	1,843	2,517	18.2	14.9
Editorial	168	1.2	1,192	1,564	2,030	7.7	13.4
Purchasing	141	1.0	1,061	1,368	1,888	5.8	18.3
Research	80	0.6	1,550	1,900	2,225	5.1	10.3
Personnel	75	0.5	1,690	2,066	2,662	21.6	16.5
Service	45	0.3	2,012	2,483	2,975	24.4	17.8
Professional, not elsewhere classified	34	0.3	1,025	1,350	2,017	6.7	12.9
Religious	18	0.1	1,000	1,275	1,900	...	18.8
Administrative, not elsewhere classified	12	0.1	1,575	3,025	4,225	54.5	15.0
Amusements	7	0.0	....	....	....	...	...
Political	2	0.0	....	....	....	...	...
Information missing	385	....	1,052	1,515	2,046	10.8	19.5
Total group	14,073	100.0	\$1,213	\$1,548	\$2,004	6.7	13.7
Total non-clerical	8,211	....	1,238	1,636	2,148	9.9	14.7

¹Calculated on \$100 class intervals. See p. 201 for definitions of median and quartile earnings.

fact that 91.2 per cent are above the clerical level. By contrast, 8.2 per cent of the women in commercial organizations and 7.2 per cent of those in manufacturing are earning this amount, and this in spite of a high proportion of clerical workers in both groups. The chances of high financial rewards are, according to these figures, twice as great in commerce and manufacturing as in educational institutions.

So far our analysis of earnings indicates comparative opportunities in the various fields of employment included in the first classification of occupations. More significant, however, is the comparison of group concentration and earnings under the second classification, which is based on the nature of the job itself (Table 9). Grouped in this way, the women show a marked tendency to concentrate in clerical work, with teaching, and sales and publicity work in second and third place, respectively. Forty-two per cent of all those reporting are engaged in clerical work, 19.7 per cent in teaching, and 10.8 per cent in sales or publicity work.¹ Together, these three groups include 10,020 women, or approximately three-fourths of the total group. The number of cases in some of the remaining groups is too small to permit any significant conclusions.² The others, including *Personnel, Welfare, Research, Finance, Food, housing and personal service, Legal and protective, and Health*, all show relatively high median earnings, in the order named. Then comes a drop in earnings of over \$200 to *Library*, with median earnings of \$1,621, and further substantial decreases to *Editorial, Teaching, Sales and publicity, Clerical, and Purchasing*,³ again in the order indicated.

The spread of earnings for the middle 50 per cent of the cases (the difference, that is, between the lower and upper quartiles in Table 9) varies considerably in different types or work. The middle range of

¹Although this concentration may at first seem unduly heavy, it will be recalled that the corresponding figures for all non-manual women workers in the United States in 1920 are as follows: *Clerical*, 32.5 per cent; *Teaching*, 16.9 per cent; and *Sales and publicity*, 15.1 per cent (Appendix I, Table 3, p. 124).

²These groups are *Service, Professional, not elsewhere classified, Religious, Administrative, not elsewhere classified, Amusements, and Political*.

³The purchasing group is composed almost exclusively of buyers; buyers and department managers; buyers and sales clerks; and assistant buyers. In view of this fact, the range of earnings—from \$1,061 to \$1,888 for the middle 50 per cent of the cases—is surprisingly low.

earnings is both narrow and low in clerical work and teaching. It is also limited, but distinctly higher, in research and welfare work. Groups having a comparatively wide range in earnings are *Food, housing, and personal service, Library, Sales and publicity, and Legal and protective.*

Apparently the spread in earnings in any group varies directly with the degree of homogeneity of the occupations included in it. In the clerical group, for instance, occupations are more nearly on a level with respect to training, ability, and degree of responsibility involved than is the case in *Food, housing, and personal service*, where occupations range from proprietors and managers of hotels and restaurants to laundry workers and waitresses. Similarly occupations included in *Teaching*, where the range of earnings is also narrow, are all at the professional level, in contrast to the legal and protective group in which the occupations included vary from judges to policewomen and title examiners. Naturally, in such a group one would expect to find a wider range in earnings than in teaching.

There are wide and interesting variations between the different groups with respect to the proportion of cases reporting earnings of \$3,000 or more. As one might guess, the chances of high financial rewards are relatively slight in clerical work, in which less than 2.6 per cent of the cases report earnings at or above \$3,000. At the other extreme is personnel work, in which 21.6 per cent earn this amount. Only 4 per cent of the women engaged in teaching earn \$3,000 or more, in contrast to 18.2 per cent in the legal and protective group, 17.7 per cent of those in finance, 15.2 per cent in sales and publicity work, 14.1 per cent in health, and 13.7 per cent in welfare work. Less than 7 per cent of the total group report earnings of \$3,000 or over.

Pronounced differences in range of earnings are apparent between specific occupations as well as occupational groups. Median earnings, for example, vary anywhere from \$682 for 23 telephone operators to \$3,088 for 55 physicians engaged in private practice. If we confine our attention to occupations in which more than a hundred members of the reporting group are engaged, median earnings vary from \$932 for 279 sales clerks to \$2,023 for 446 proprietors, while the proportion earning \$3,000 or over ranges from zero for 925 elementary public

TABLE 10—EARNINGS IN OCCUPATIONS IN WHICH MORE THAN ONE HUNDRED OF THE REPORTING GROUP ARE EMPLOYED

Occupation	Number of Women Indicating Earnings	Earnings in 1927 ¹			Per Cent Earning \$3,000 and Over
		Lower Quartile	Median	Upper Quartile	
CLERICAL					
Office manager	285	\$1,555	\$1,881	\$2,461	17.5
Private secretary	534	1,429	1,733	2,095	4.5
Bookkeeper ²	752	1,046	1,317	1,595	0.8
Bookkeeper-cashier	140	1,033	1,343	1,570	1.4
Stenographer ²	1,029	1,026	1,295	1,567	0.2
Stenographer-clerk ²	143	1,235	1,396	1,602	0.7
Clerk	352	1,064	1,264	1,569	0.6
Cashier	135	949	1,253	1,645	0.7
HEALTH					
Nurse, trained ³	270	1,558	1,783	1,882	0.4
TEACHING					
Supervisor, public schools	103	1,462	1,907	2,345	8.7
Principal, public schools (elementary, secondary, technical)	216	1,439	1,700	2,100	5.1
Teacher, high school	649	1,385	1,615	1,889	2.3
Teacher, public school (elementary)	925	1,070	1,289	1,800	0.0
LIBRARY					
Librarian	140	1,247	1,595	2,200	6.4
SALES					
Proprietor, sales organization	237	1,217	1,992	3,093	31.6
Sales agent or solicitor	150	1,282	1,860	3,012	25.3
Sales clerk	279	730	932	1,100	0.4
ALL PROPRIETORS	446	1,244	2,023	3,053	28.9
Total group	14,073	\$1,213	\$1,548	\$2,004	6.3

¹Calculated on \$100 class intervals. See p. 201 for definitions of median and quartile earnings.

²Compare median earnings here with the average salary reported in the same occupation in a recent government wage survey, as follows: 31,865 stenographers, \$1,318.78; 5,151 stenographer-clerks, \$1,347.99; 3,322 bookkeepers, \$1,442.81. Personnel Classification Board, *Report of Wage and Personnel Survey* (Washington: United States Government Printing Office, 1929), pp. 109, 112, and 113.

³For nurses who reported earnings on a weekly basis, 40 weeks of employment per year were assumed. Where maintenance was not included in calculating earnings of nurses on private duty, \$300 was added to total annual earnings. For example, yearly earnings for a trained nurse on private duty who stated that her weekly earnings in 1927 were \$40 plus maintenance were estimated by multiplying by 40 and adding \$300, making a total of \$1,900.

school teachers to 31.6 per cent for 237 proprietors of sales organizations. Earnings data for all occupations represented by more than one hundred women in the group are given in Table 10. Appendix II contains the same information for all occupations in which more than ten women are engaged.

So far we have been content to observe how earnings vary within and between occupations and occupational groups. An analysis of this kind presents no appreciable obstacles. It is, however, quite another matter to determine why these differences occur. The last columns in Tables 8 and 9, for instance, show that median years of work experience vary considerably between the different groups. How much of the indicated variation in earnings is due to differences in the amount of work experience of the women included in these groups? With the same amount of experience, will these occupational groups maintain characteristically different earnings curves? It is questions such as these which next concern us.

Part II

SOME FACTORS RELATED TO EARNINGS

METHOD OF ANALYSIS

Earnings vary substantially, we have seen, both within and between occupations and occupational groups. But why? Under what circumstances do these variations in earnings occur? To what extent are they to be attributed to differences in education and work experience? May they be due, in part at least, to differences in living costs or work opportunities between small and large communities? What of marriage and responsibility for dependents in their effect on earnings? Each of these factors, and many more, have logical claims to consideration as possible causes of variations in earnings.

Quantitative analysis of causal factors in earnings presents some rather serious difficulties, both in method and in interpretation of data. Ideally, one would isolate successively each of the probable causes of differences in earnings. If, for instance, certain variations in earnings occur in a group which is homogeneous in every respect but one, which might presumably have some effect on earnings, as age or education, it is reasonable to conclude that these differences are due to the one remaining variable factor. In this study, however, it has been impossible to secure groups which were completely homogeneous except for one factor, and still have enough cases to justify any conclusions. We have, therefore, been forced to work with groups which were alike in as many respects as possible, and yet afforded adequate basis for general conclusions. This has usually meant that not more than two factors could be held constant at the same time. Given, for instance, a group with the same number of years of work experience who are living in communities of the same size, how do earnings vary between single and married women? Or, what differences in earnings are observable in a group of women with the same education and number of years of experience who live in communities of different size?

These illustrations indicate the general method followed in analyzing the various factors which might presumably have some effect on earnings. They also suggest a need for care in interpreting the results

of the analysis, since all the possible causes of differences in earnings cannot be simultaneously held constant. Earnings, for example, show a definite tendency in this study to increase with years of education. This conclusion supports the claims of educators who have recently cited statistics of earnings at different educational levels to prove the economic value of added years of schooling. But because high school graduates earn more than grade school graduates, and college graduates more than high school graduates, one cannot infer that these differences in earnings are attributable solely to the additional education received, since we know nothing of the comparative mental abilities or differences in socio-economic background of the two groups whose earnings we are comparing.

Certainly there is need for caution in interpreting data in which causative influences are so intricately interwoven. Nor is it easy to keep an even course between needless equivocation on the one hand, and overestimate of the significance of the data on the other. The complete tabulations are available, however, either to support or deny the explanations offered here.

AGE, WORK EXPERIENCE, AND EARNINGS

Business and professional women may apparently look forward to a work span of about thirty years during which earnings will increase. For ten years thereafter, or during the interval between thirty and forty years of work experience, they may expect that earnings will remain fairly constant, and then perhaps decline (Table 11 and Chart 3).¹ Median earnings for the 1,559 women who have worked less than five years are \$1,133, as compared with a median of \$1,526 for the total group. The middle 50 per cent of this least experienced group (the difference between the lower and upper quartiles in Table 11) are earning between \$858 and \$1,398, a range of only \$540. By contrast, median earnings for the 1,045 women who have had between twenty-five

¹This interpretation assumes that it is possible to predict from the variations in earnings of different groups of women with varying amounts of experience in any one year—1927 in this case—how earnings may be expected to vary with experience for a single group over a period of years. Whether or not this assumption is allowable will be determined in a later study which analyzes variations in earnings of these same women throughout their working life.

and thirty years of experience are \$1,920, while the middle 50 per cent of the group are earning between \$1,490 and \$2,556. This represents a difference of \$1,066, or almost twice that of women with less than five years' experience.

TABLE II—VARIATION IN EARNINGS WITH YEARS OF EXPERIENCE

Experience (years)	Number of Women	Earnings ¹		
		Lower Quartile	Median	Upper Quartile
Less than 5	1,559	\$ 858	\$1,133	\$1,398
5-9.9	2,961	1,106	1,350	1,696
10-14.9	2,585	1,272	1,553	1,973
15-19.9	2,085	1,375	1,726	2,187
20-24.9	1,618	1,427	1,843	2,335
25-29.9	1,045	1,450	1,920	2,556
30-34.9	590	1,434	1,900	2,643
35-39.9	296	1,520	1,923	2,612
40-44.9	103	1,420	1,882	2,350
45-49.9	28	1,220	1,700	2,550
50 and over	4	....	....	....
Information missing	1,199	1,046	1,435	2,000
Total group ²	14,073	\$1,215	\$1,525	\$2,006

¹Calculated on \$200 class intervals. See p. 201 for definitions of median and quartile earnings.

²Median years of work experience for the total group are 13.7.

As one might expect, earnings increase and decrease with age in much the same way as with work experience. For the total group they increase up to fifty years of age; between the ages of fifty and sixty they vary but little, and then decline (Table 12 and Chart 4). Median earnings for the women between the ages of twenty-five and thirty are \$1,105, in contrast to \$1,819 for women of forty-five to fifty. The middle range of earnings, moreover, increases from \$483 for the younger women to \$979 for the older group. It is interesting to note that this spread is maintained or even slightly increased in the groups above the age of fifty, due more, however, to a drop in earnings at the first quartile than to an increase at the third quartile. Third quartile earnings are remarkably constant from the ages of forty-five to seventy,

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CHART 3—VARIATION IN EARNINGS WITH YEARS OF WORK EXPERIENCE

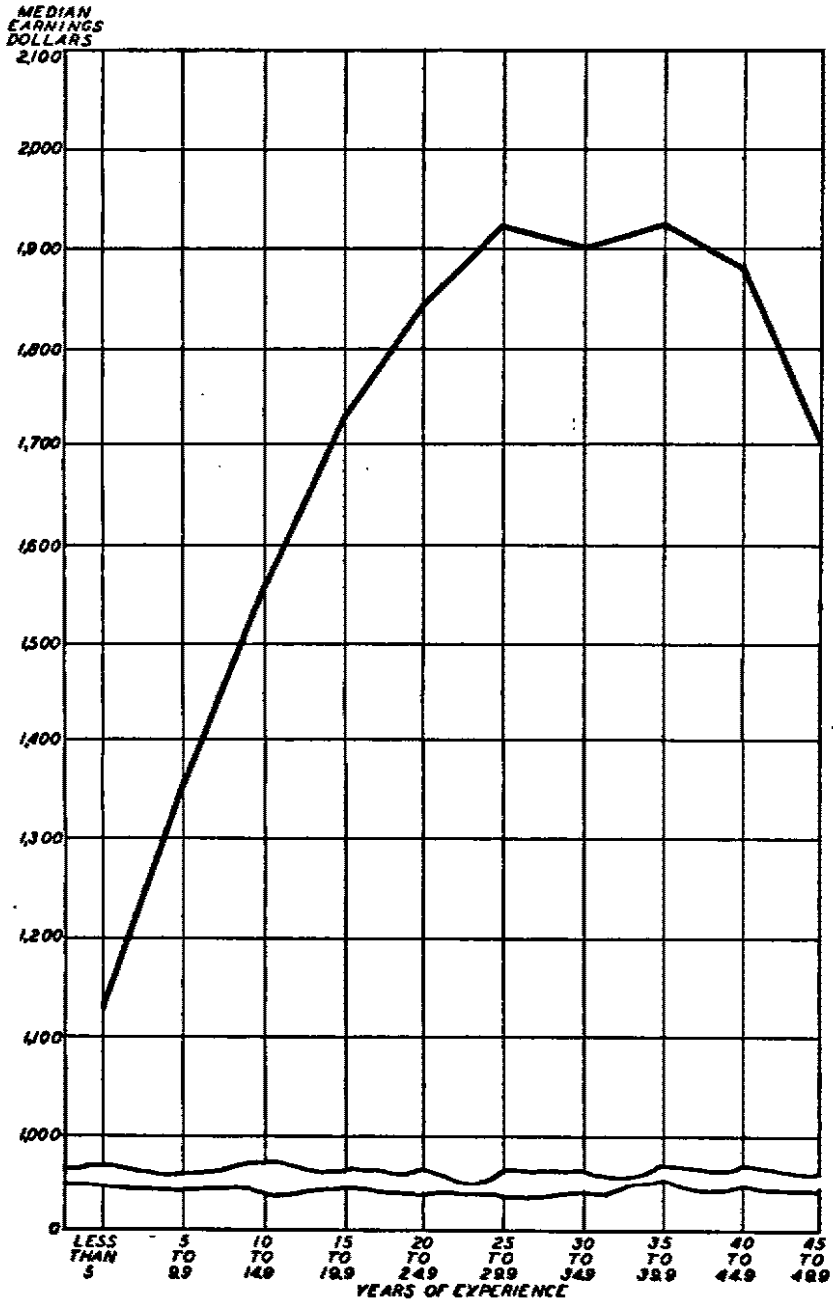


TABLE 12—VARIATION IN EARNINGS WITH AGE

Age (years)	Number of Women	Earnings ¹		
		Lower Quartile	Median	Upper Quartile
Less than 20	87	\$ 675	\$ 841	\$1,075
20-24.9	1,427	864	1,105	1,347
25-29.9	2,086	1,098	1,341	1,626
30-34.9	2,153	1,271	1,538	1,947
35-39.9	2,310	1,295	1,684	1,991
40-44.9	1,972	1,378	1,791	2,276
45-49.9	1,569	1,359	1,819	2,338
50-54.9	1,161	1,337	1,793	2,350
55-59.9	655	1,326	1,813	2,349
60-64.9	294	1,213	1,569	2,240
65-69.9	105	1,245	1,750	2,479
70 and over	18	783	1,300	2,042
Information missing	236	1,334	1,690	2,223
Total group ²	14,073	\$1,215	\$1,526	\$2,006

¹Calculated on \$200 class intervals. See p. 201 for definitions of median and quartile earnings.

²Median age for the total group is 37.7 years.

which suggests that women who earn more are either more secure in their positions, or have a more sustained earning capacity than women who earn less.

With three exceptions, the general tendency already shown for earnings to increase during the first thirty years of work, decreasing thereafter, appears in each different type of work (Table 13).¹ The three occupational groups which do not conform to this general tendency are *Health, Finance, and Purchasing*. In these groups, earnings continue to rise after thirty years of experience, after a drop in each group for women with twenty-five to thirty years' experience. It is possible that both the intermediate fall and final rise in earnings would disappear if more cases were included. Yet the sustained rise in

¹The number of women in these occupational groups who have had thirty or more years of experience is too small to show the plateau which appears in the earnings curve for the total group between thirty and forty years of experience. It would almost certainly appear in most of the groups if the number of cases were increased.

EARNINGS OF WOMEN

CHART 4—VARIATION IN EARNINGS WITH AGE

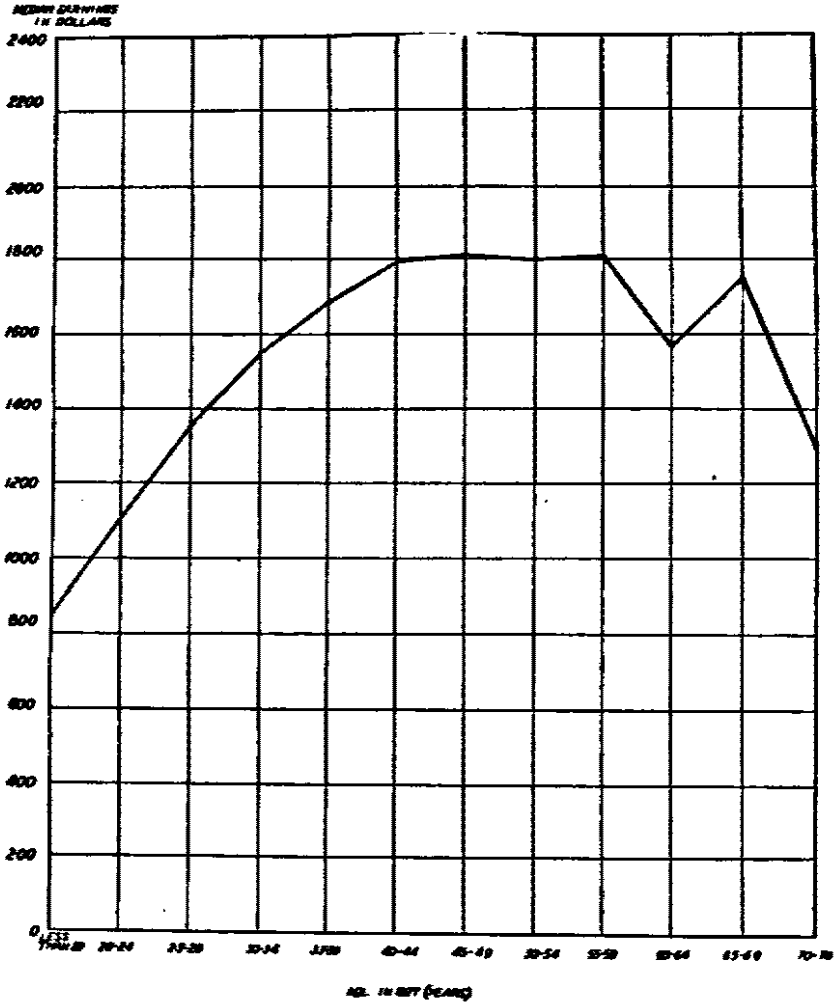


TABLE 13—VARIATION IN EARNINGS WITH EXPERIENCE IN DIFFERENT TYPES OF WORK

Type of Work	Experience (years)									
	Less than 5		5-9.9		10-14.9		15-19.9		20-24.9	
	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹
Clerical	800	\$1,040	1,472	\$1,318	1,118	\$1,480	867	\$1,606	657	\$1,707
Teaching	328	1,220	582	1,357	528	1,570	403	1,711	283	1,846
Sales and publicity	108	938	237	1,257	235	1,478	223	1,643	197	1,825
Health	91	1,564	179	1,759	197	1,833	125	1,994	102	2,102
Finance	27	1,425	109	1,377	109	1,871	116	1,956	101	2,190
Production and planning	34	800	76	1,115	77	1,247	64	1,347	57	1,717
Food, housing, and personal service	58	1,433	70	1,800	71	2,200	59	1,975	50	2,125
Welfare	23	1,862	54	1,900	67	1,980	63	2,080	47	2,000
Library	14	1,060	36	1,438	38	1,875	30	1,700	26	1,875
Legal and protective	17	1,500	35	1,525	36	1,925	31	1,820	20	1,600
Editorial	21	1,300	32	1,312	33	1,480	26	1,740	11	2,562
Purchasing	6	....	18	1,250	15	1,367	33	1,475	25	1,500
Research	15	1,900	23	1,917	16	1,925	8	....	7	....
Personnel	4	....	12	2,050	16	2,167	12	2,375	11	2,312
Not elsewhere classified	7	....	19	....	21	....	20	....	17	....
Information missing	6	....	7	....	8	....	5	....	7	....
Total group	1,559	\$1,133	2,961	\$1,350	2,585	\$1,553	2,085	\$1,726	1,618	\$1,843

¹Calculated on \$200 class intervals.

TABLE 13 (Continued)

Type of Work	Experience (years)							
	25-29.9		30 and Over		Information Missing		Total Group	
	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹
Clerical	392	\$1,849	331	\$1,825	225	\$1,354	5,862	\$1,434
Teaching	222	1,933	238	1,877	105	1,573	2,689	1,552
Sales and publicity	134	2,076	147	1,933	188	1,254	1,469	1,490
Health	57	1,942	46	2,450	97	1,775	894	1,858
Finance	61	2,025	56	2,458	30	1,900	609	1,904
Production and planning	37	1,700	42	1,535	76	1,450	463	1,321
Food, housing, and personal service	27	2,083	30	1,900	53	1,450	418	1,883
Welfare	24	2,500	24	1,960	13	1,833	315	1,968
Library	24	2,036	22	1,867	15	1,375	205	1,631
Legal and protective	21	2,450	15	2,333	7	....	182	1,882
Editorial	10	....	18	1,900	17	1,300	168	1,538
Purchasing	12	1,467	12	1,800	20	1,250	141	1,374
Research	5	....	4	....	2	....	80	1,960
Personnel	6	....	10	2,333	4	....	75	2,174
Not elsewhere classified	5	....	16	....	13	....	118	....
Information missing	8	....	10	....	334	....	385	1,478
Total group	1,045	\$1,920	1,021	\$1,904	1,199	\$1,435	14,073	\$1,526

¹Calculated on \$200 class intervals.

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earnings may also be due to the fact that these particular groups include a higher proportion of women in occupations which demand specialized abilities, such as hospital superintendents, treasurers, and department store buyers. For executive positions of this sort, training and experience are important.

It would seem from this analysis of the relation of age and experience to earnings that although earnings rise and then fall with age and years of work experience, other important influences must be at work to account for the differences in earnings already noted in each experience and age group.² Among these possible causal factors is the size of the community in which the work is carried on.

SIZE OF COMMUNITY AND EARNINGS

Median earnings for the group studied vary directly with the size of the community in which the women are working. They vary anywhere from \$1,252 in small communities with a population of less than twenty-five hundred to \$3,068 in urban centers with a million or more inhabitants (Table 14). Furthermore, the range of earnings of the middle 50 per cent of the 14,073 cases increases from \$638 for women in population centers of less than twenty-five hundred to \$1,863 for those living in cities with a population of a million or over. The obvious inference is that these variations in earnings are due to differ-

²This situation is reflected in the correlation ratio and Pearsonian coefficient of correlation, which measure the degree of correspondence between experience and earnings and also age and earnings. The correlation ratio is the appropriate measure of correspondence when the relationship between two variables is curvilinear, as in the case of age and earnings, or experience and earnings (Charts 3 and 4). The correlation coefficient is used when there is a straight-line relationship between the variables, such as exists between earnings and age up to forty-five years. The correlation ratio for age and earnings is $+0.286$; or, if all cases of persons over fifty years of age are omitted to secure a linear relationship, the resulting correlation coefficient is $+0.297$. Similarly the correlation ratio for years of experience and earnings is $+0.313$; or, if all cases of thirty or more years' experience are omitted, the correlation coefficient is $+0.301$. If there were perfect correspondence between age and earnings, or experience and earnings, the above ratios and coefficients would in every case be $+1.000$. These relatively low correlations further suggest that other influences than age and experience are important in determining earnings. For more complete definitions of coefficient of correlation and correlation ratio, see p. 202.

TABLE 14—VARIATION IN EARNINGS WITH SIZE OF COMMUNITY

Population	Number of Women	Earnings ¹		
		Lower Quartile	Median	Upper Quartile
Less than 2,500	1,055	\$ 940	\$1,252	\$1,578
2,500-4,999	1,853	983	1,295	1,622
5,000-9,999	2,484	1,063	1,345	1,778
10,000-24,999	3,219	1,222	1,486	1,904
25,000-49,999	1,969	1,364	1,748	2,194
50,000-99,999	1,454	1,419	1,824	2,267
100,000-249,999	1,121	1,514	1,935	2,435
250,000-499,999	594	1,539	2,003	2,496
500,000-999,999	210	1,832	2,307	3,345
1,000,000 and over	109	2,215	3,068	4,078
Information missing	5	....	....	....
Total group	14,073	\$1,215	\$1,526	\$2,006

¹Calculated on \$200 class intervals.

ences in cost of living in large and small communities. Yet too much significance should not be attached to these figures for two reasons—first, they are based on relatively few cases at the higher population levels, and, second, there is reason to believe that the groups are not homogeneous in other respects than the size of the community where the work is carried on.

It is clear, in the first place, that the relationship between earnings and the size of the work community is not close. Otherwise there would not be such wide variations in earnings within each of the population groups in Table 14. The difference in quartile earnings ranges from \$638 in communities of less than twenty-five hundred to \$1,863 in cities of a million or over.¹ There is moreover substantial evidence that our sampling of cases from large cities includes a much larger proportion of experienced women holding responsible positions than is the case for small communities. This is first apparent from a comparison of the work experience of women living in large cities with

¹This lack of correspondence between earnings and the size of the work community is further apparent from a correlation coefficient of +.235. If there were perfect correspondence between these two variables—earnings and population—the coefficient would, as already shown, be +1.000. See footnote, p. 32.

TABLE 15—VARIATION IN EARNINGS WITH SIZE OF COMMUNITY AND EXPERIENCE

Population	Experience (years)									
	Less than 5		5-9.9		10-14.9		15-19.9		20-24.9	
	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹
Less than 2,500	235	\$ 995	300	\$1,243	183	\$1,388	104	\$1,357	70	\$1,471
2,500-4,999	327	1,085	521	1,253	339	1,367	198	1,503	134	1,468
5,000-9,999	363	1,066	610	1,262	468	1,405	356	1,510	225	1,532
10,000-24,999	392	1,205	735	1,368	643	1,530	481	1,594	341	1,706
25,000-49,999	105	1,288	323	1,461	366	1,721	342	1,854	270	1,920
50,000-99,999	76	1,331	238	1,494	245	1,834	275	1,870	203	1,976
100,000-249,999	28	1,267	128	1,571	188	1,888	185	2,047	199	1,944
250,000 and over	31	1,529	104	1,813	153	1,972	144	2,081	175	2,320
Information missing	2	....	2	....	...	....	...	....	1	....
Total group	1,559	\$1,133	2,961	\$1,350	2,585	\$1,553	2,085	\$1,726	1,618	\$1,843

¹Calculated on \$200 class intervals.

TABLE 15—(Continued)

Population	Experience (years)								
	25-29.9		30 and Over		Information Missing		Total Group		
	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Median Experi- ence (years)
Less than 2,500	39	\$1,800	36	\$1,600	88	\$1,229	1,055	\$1,252	9.1
2,500-4,999	90	1,550	66	1,567	178	1,100	1,853	1,295	9.9
5,000-9,999	130	1,579	120	1,575	212	1,324	2,484	1,345	11.7
10,000-24,999	198	1,795	180	1,761	249	1,377	3,219	1,486	12.8
25,000-49,999	174	1,960	207	1,869	182	1,509	1,969	1,748	16.5
50,000-99,999	156	1,955	146	1,944	115	1,725	1,454	1,824	17.0
100,000-249,999	135	2,176	155	2,098	103	1,850	1,121	1,935	19.5
250,000 and over	123	2,365	111	2,396	72	2,288	913	2,151	19.6
Information missing	...	....	...	....	...	....	5	....	...
Total group	1,045	\$1,920	1,021	\$1,904	1,199	\$1,435	14,073	\$1,526	13.7

¹Calculated on \$200 class intervals.

EARNINGS OF WOMEN

that of women in smaller population centers. Such a comparison shows that median years of work experience increase from 9.1 years for the 1,055 women living in communities with less than twenty-five hundred inhabitants to 19.6 years for the 913 women in cities of two hundred and fifty thousand or more inhabitants (Table 15). It is equally clear from a rough grouping of occupations on the basis of the amount of special training and degree of responsibility involved, that women with special training and also major and minor executives in the group concentrate characteristically in large cities.¹ In view of these facts, it seems fair to conclude that although some of the indicated increase in median earnings between small and large communities is undoubtedly attributable to higher living costs in urban centers, some of it is also due to the fact that the urban group contains a higher proportion of experienced women in positions of responsibility.

It has already been shown that the difference in earnings between large and small communities is in part a reflection of the added years of experience of the women living in large cities. How much of the increment is due to the experience factor can be roughly determined by comparing the range of earnings between small and large communities for the total group, when experience is not held constant, with the corresponding earnings range in groups where work experience is a constant factor (Table 15). A comparison of this sort shows that although the range of median earnings within each experience group is somewhat reduced, yet substantial differences in median earnings

¹An occupational grouping of this sort shows among other things the following: (1) The proportion of routine workers requiring no special training declines from 8.7 per cent of the total number in communities of less than twenty-five hundred to 2.8 per cent of all those in cities of a million or over; (2) the corresponding figures for routine workers requiring special training, such as stenographers, are 26.2 per cent and 3.6 per cent, respectively; (3) the proportion of non-routine workers with special training, such as secretaries and reporters, increases from 7.4 per cent of the total in communities of less than twenty-five hundred inhabitants to 25.7 per cent of all those in cities of a million or more; (4) women in executive positions constitute 14.3 per cent of the total number living in small towns, as against 29.4 per cent of the urban group, as defined above. See Appendix I, Table 5, p. 126.

between small population centers and large cities remain.¹ How much of this residual difference in earnings is due to the variations in occupations included in the different population groups, and how much to other factors, including differences in cost of living, it is impossible to say here. The relation of living costs to earnings is considered in some detail in the last section of the study.²

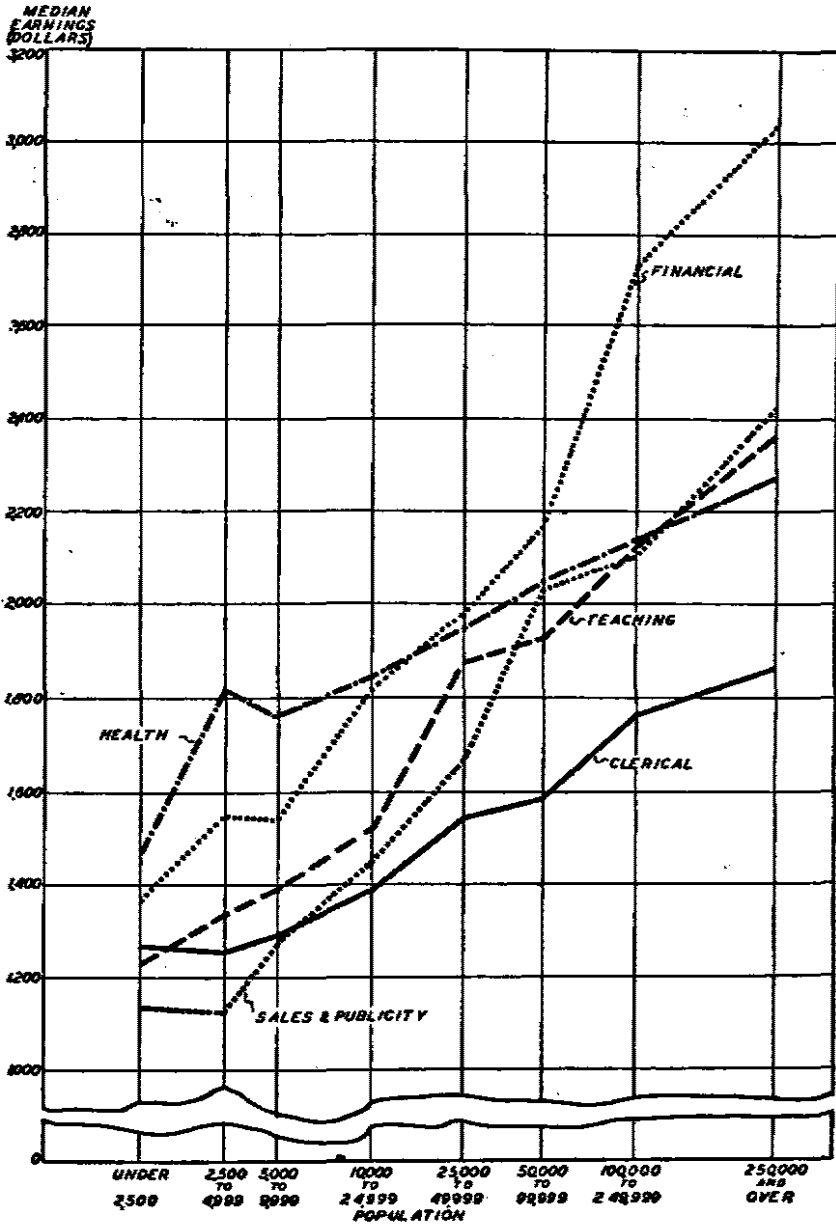
There is, however, one more bit of evidence that higher earnings in urban centers are due in part at least to a difference in work opportunities, measured in kinds of work available. In clerical work, where even the most responsible positions are fairly standardized and routine-like, median earnings vary by only \$612 between communities of less than twenty-five hundred persons and cities with over two hundred and fifty thousand inhabitants, as compared with a range of \$1,281 in sales and publicity work, \$1,667 in finance, and \$1,808 in legal and protective work (Table 16). This relatively limited range of earnings in a type of work where opportunities vary but little according to the size of the community, and comparatively wide earnings range in work like finance and law, in which large cities offer much better chances in the way of specialized, responsible positions, suggests that difference in occupational opportunity is an important cause of the differences in earnings between small and large population centers.

Of the five major occupational groups in this study—clerical work, teaching, sales and publicity, health work, and finance—sales and publicity work and finance show the most spectacular differences in median earnings between small and large communities (Table 16 and Chart 5). In small towns, women in sales work earn less than those in any other of the five groups mentioned, while in large cities they earn more than any group except the women engaged in financial work.

¹Table 15 shows, for instance, that median earnings of all women living in cities of two hundred and fifty thousand or more inhabitants exceed those of women living in communities of less than twenty-five hundred by \$899, while \$660 is the *average* difference in median earnings of women with the same amount of experience living in large cities and small communities as defined above. According to this analysis, approximately \$239 of the \$899 differential in median earnings of women in large cities is attributable to their added years of work experience.

²See p. 111ff.

CHART 5—VARIATION IN EARNINGS WITH SIZE OF COMMUNITY IN DIFFERENT TYPES OF WORK¹



¹Population plotted on logarithmic scale.

This difference in comparative earnings in sales and publicity work is undoubtedly due largely to variations in group composition at the different population levels. Sales clerks predominate in the smaller communities, while sales managers, sales agents for real estate and insurance companies, advertising experts, and the like are relatively numerous in the metropolitan group engaged in sales and publicity work.

Briefly, then, earnings vary directly with the size of the community in which the occupation is carried on. Median earnings rise steadily and rapidly from \$1,252 in communities of less than twenty-five hundred persons to \$3,068 for urban centers of more than a million inhabitants. These figures, however, suggest a degree of correspondence between the size of the work community and earnings which is contrary to fact. This is apparent from the wide range in earnings which one finds within each of the population groups, which shows that other factors are responsible for part of the difference in earnings between large and small communities. Among these influences are the added years of work experience of the women in large cities, as well as the relatively high proportion of women in urban centers who hold positions of responsibility. There is apparently a notable difference in the occupational composition of the group living in small towns and that of the metropolitan group. Doubtless some of this difference is due to the more rigid membership requirements of the city clubs from which our sampling is taken. Yet the evidence is clear that urban centers offer a wider range of opportunity for women, especially in the fields of sales, publicity, and finance.¹

¹So far in our analysis of the effect of age, work experience, and size of the community on earnings, each of these factors has been considered independently. For each, too, it will be recalled that the relationship with earnings is slight, as indicated by a correlation coefficient of +.235 for population and earnings, and coefficients or ratios ranging from +.286 to +.313 for age or experience and earnings. (See footnotes, pp. 32 and 33.) It is also apparent that there is relatively little difference in the median earnings of clerical workers in large and small communities, as compared to the corresponding differences in earnings in sales and publicity work. These facts in combination suggested the desirability of measuring the *combined* influence of age, work experience, and size of community on earnings, first, for a fairly homogeneous occupational group, such as stenographers, where work is similar and differences in ability and education are relatively unimportant, and, second, for a heterogeneous group like proprietors of sales

TABLE 16—VARIATION IN EARNINGS IN DIFFERENT TYPES OF WORK WITH SIZE OF COMMUNITY

Type of Work	Population									
	Less than 2,500		2,500-4,999		5,000-9,999		10,000-24,999		25,000-49,999	
	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹
Clerical	357	\$1,263	705	\$1,253	1,114	\$1,295	1,377	\$1,397	769	\$1,544
Teaching	306	1,235	423	1,335	434	1,399	651	1,519	402	1,878
Sales and publicity	147	1,136	236	1,122	274	1,281	293	1,456	166	1,633
Health	44	1,450	95	1,804	164	1,767	220	1,818	149	1,922
Finance	38	1,378	68	1,553	82	1,540	139	1,807	98	1,968
Production and planning	34	775	84	1,045	88	1,222	76	1,300	45	1,540
Food, housing, and personal service	40	1,167	69	1,457	92	1,780	84	1,917	45	1,900
Welfare	3	....	7	....	26	1,800	82	1,938	72	1,924
Library	8	....	24	1,200	42	1,288	51	1,531	41	1,900
Legal and protective	15	1,380	24	1,900	28	1,425	46	1,825	19	2,000
Editorial	14	1,400	21	1,220	23	1,440	36	1,460	28	1,640
Purchasing	9	....	17	1,033	21	1,300	36	1,308	19	1,300
Research	2	....	4	....	12	1,600	23	1,917	18	1,940
Personnel	0	....	1	....	..	....	9	....	12	2,188
Not elsewhere classified or information missing	38	....	75	....	84	....	96	....	86	....
Total	1,055	....	1,853	....	2,484	....	3,219	....	1,969	....

¹Calculated on \$200 class intervals.

TABLE 16--(Continued)

Type of Work	Population									
	50,000-99,999		100,000-249,999		250,000 and Over		Information Missing		Total Group	
	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹
Clerical	656	\$1,586	501	\$1,779	381	\$1,875	2	....	5,862	\$1,434
Teaching	219	1,904	152	2,132	102	2,384	...	....	2,689	1,552
Sales and publicity	147	2,018	100	2,117	106	2,417	...	....	1,469	1,490
Health	93	2,029	74	2,133	54	2,281	1	....	894	1,858
Finance	74	2,167	58	2,725	51	3,045	1	....	609	1,904
Production and planning	49	1,560	43	1,920	43	2,100	1	....	463	1,321
Food, housing, and personal service	36	2,438	30	2,417	22	2,292	...	....	418	1,883
Welfare	55	1,969	43	1,992	27	2,464	...	....	315	1,968
Library	14	2,417	14	2,125	11	2,583	...	....	205	1,631
Legal and protective	17	1,925	17	2,667	16	3,188	...	....	182	1,882
Editorial	11	1,550	16	1,700	19	2,679	...	....	168	1,538
Purchasing	17	1,833	13	2,375	9	....	...	....	141	1,374
Research	7	....	6	....	8	....	...	....	80	1,960
Personnel	13	1,967	9	....	31	2,306	...	....	75	2,174
Not elsewhere classified or information missing	46	45	33	503
Total	1,454	1,121	913	5	14,073	\$1,526

¹Calculated on \$200 class intervals.

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TABLE 17—VARIATION IN EARNINGS WITH MARITAL STATUS

Marital Status	Number of Women	Earnings ¹			Median Experience (years)
		Lower Quartile	Median	Upper Quartile	
Single	9,499	\$1,223	\$1,535	\$1,999	13.7
Married	2,018	1,190	1,429	1,950	13.3
Widowed	999	1,240	1,578	2,493	14.1
Divorced	649	1,241	1,536	2,019	13.5
Separated	125	1,216	1,512	2,008	12.9
Information missing	783	1,231	1,570	2,101	14.9
Total group	14,073	\$1,215	\$1,526	\$2,006	13.7

¹Calculated on \$200 class intervals.

MARITAL STATUS AND EARNINGS

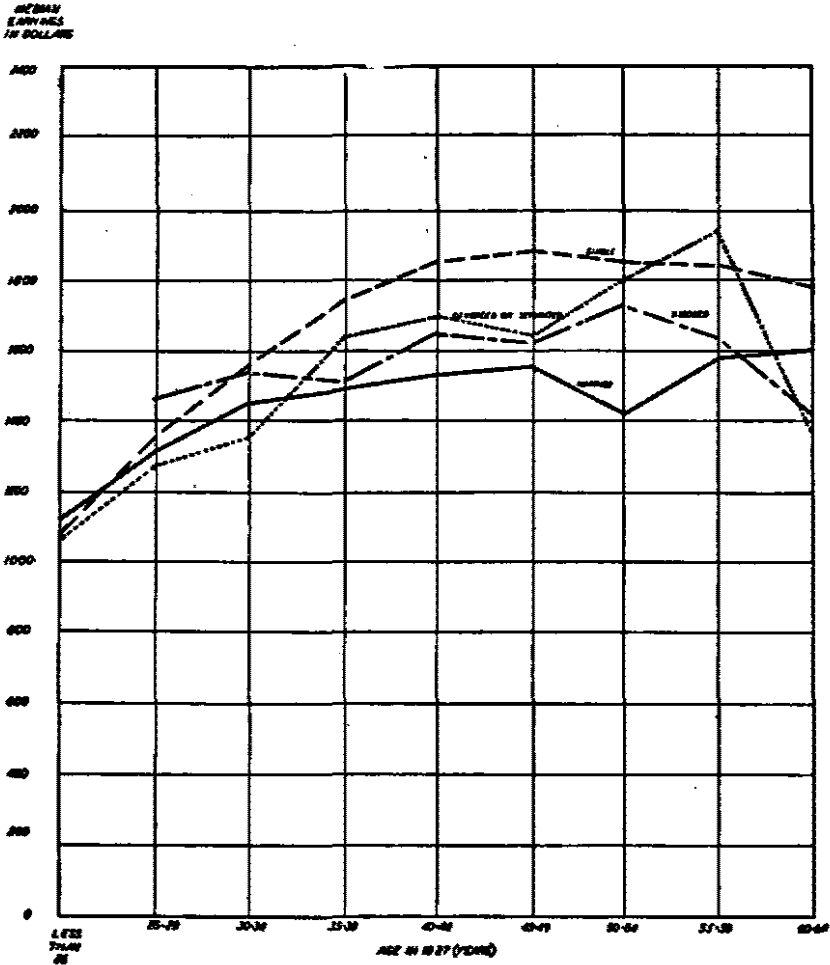
Are married women as effective workers as single women? The question is as perennial as the answers are various. Some say that married women are "clock-watchers." Others maintain that women show diminished interest in their work after marriage, while there are organizations, where there are great differences in individual ability, kind of work, training, and elements of chance to account for differences in earnings.

Accordingly two samples of 50 cases each were selected from the 1,046 stenographers and also from the 324 proprietors of sales organizations included in the study. For each of these four samples of 50 cases, a multiple correlation index was calculated by Bean's graphic method for multiple curvilinear correlation, in order to measure the combined relationship of age, experience, and size of community to earnings. The indexes for the two groups of stenographers are +.83 and +.86, respectively, while for one group of sales proprietors the index is +.30 and for the other a zero correlation, signifying complete independence between the variables.

This seems to indicate that for occupational groups in which differences in education, ability, and the kind of work performed are comparatively slight, age, experience, and the size of the work community together have an important effect on earnings. But on the other hand, where ability, work opportunities, and the work itself vary widely, as in the case of proprietors of sales organizations, these same factors—age, experience, and the size of the work community—when taken in combination have virtually no effect on earnings.

For a description of Bean's graphic method of calculating multiple curvilinear correlation, see the *Journal of the American Statistical Association*, XXIV, New Series, No. 168, p. 386.

CHART 6—VARIATION IN EARNINGS WITH MARITAL STATUS AND AGE



some who claim that marriage has no influence whatsoever on the quality of a woman's work.²

Here earnings are our sole criterion of effectiveness. Here, too, the same caution must be exercised in interpreting the data as was necessary in relating the size of the community to earnings. A casual

²D. D. Bromley, "Are Women a Success in Business?" *Harper's Magazine*, February, 1928, p. 299.

TABLE 18—VARIATION IN EARNINGS WITH MARITAL STATUS, EXPERIENCE, AND AGE

Experience (years)	Marital Status															Total Group		
	Single			Married			Widowed			Divorced and Separated			Information Missing					
	Number of Women	Median Earnings ¹	Median Age (years)	Number of Women	Median Earnings ¹	Median Age (years)	Number of Women	Median Earnings ¹	Median Age (years)	Number of Women	Median Earnings ¹	Median Age (years)	Number of Women	Median Earnings ¹	Median Age (years)	Number of Women	Median Earnings ¹	Median Age (years)
Less than 5	1,209	\$1,103	23.3	158	\$1,206	29.8	67	\$1,489	39.0	64	\$1,215	32.1	61	\$1,114	24.0	1,559	\$1,133	23.9
5-9.9	2,019	1,351	28.1	457	1,304	29.7	169	1,395	44.0	166	1,393	34.4	150	1,347	27.8	2,961	1,350	28.2
10-14.9	1,673	1,575	33.6	436	1,413	34.9	183	1,561	44.2	168	1,588	38.0	125	1,545	35.7	2,585	1,553	34.4
15-19.9	1,388	1,755	38.3	310	1,564	39.1	139	1,736	47.9	136	1,667	41.2	112	1,738	38.7	2,085	1,726	38.8
20-24.9	1,132	1,861	43.1	171	1,622	43.3	124	1,771	49.9	91	1,717	45.4	100	1,910	44.6	1,618	1,843	43.6
25-29.9	761	1,939	47.7	111	1,945	47.7	71	1,688	49.8	42	1,911	49.4	60	1,850	48.7	1,045	1,920	47.9
30 and over	742	1,904	54.7	109	1,740	51.2	89	1,991	58.6	21	1,900	56.7	60	1,925	54.4	1,021	1,904	54.8
Information missing	575	1,464	43.1	266	1,350	45.1	157	1,383	53.6	86	1,350	45.1	115	1,591	49.4	1,199	1,435	45.7
Total group	9,499	\$1,535	35.8	2,018	\$1,429	38.4	999	\$1,578	48.9	774	\$1,532	40.3	783	\$1,570	39.0	14,071	\$1,526	37.5

¹Calculated on \$200 class intervals.

TABLE 19--VARIATION IN EARNINGS WITH MARITAL STATUS AND AGE

Age in 1927 (years)	Marital Status										Total Group	
	Single		Married		Widowed		Divorced and Separated		Information Missing			
	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹
Less than 25	1,307	\$1,084	104	\$1,119	4	....	25	\$1,075	74	\$1,118	1,514	\$1,090
25-29.9	1,576	1,348	296	1,315	26	\$1,450	78	1,286	110	1,331	2,086	1,340
30-34.9	1,549	1,568	351	1,454	47	1,536	118	1,356	88	1,517	2,153	1,538
35-39.9	1,548	1,741	362	1,482	123	1,506	146	1,645	131	1,788	2,310	1,684
40-44.9	1,266	1,842	292	1,519	145	1,650	153	1,700	116	1,738	1,972	1,791
45-49.9	915	1,877	256	1,536	177	1,629	120	1,642	101	1,867	1,569	1,819
50-54.9	654	1,859	190	1,426	181	1,782	64	1,800	72	1,575	1,161	1,793
55-59.9	342	1,841	93	1,557	136	1,632	44	1,956	40	1,925	655	1,812
60-64.9	144	1,775	38	1,600	80	1,414	16	1,367	16	1,532	294	1,569
65-69.9	51	1,900	11	....	37	1,500	2	....	4	....	105	1,750
70 and over	7	....	..	....	11	1,300	..	....	..	....	18	1,300
Information missing	140	1,816	25	1,850	32	1,500	8	....	31	1,517	236	1,690
Total group	9,499	\$1,535	2,018	\$1,429	999	\$1,576	774	\$1,532	783	\$1,570	14,073	\$1,526

¹Calculated in \$200 class intervals.

EARNINGS OF WOMEN

glance at Table 17, for instance, would suggest "economic incentive" as an altogether logical explanation for the indicated differences in earnings. Widows—so the argument might run—earn most, for they have not only themselves but dependents to provide for; divorced and single women earn slightly less—probably because the problem of dependency is less acute. Earnings of women who are separated from their husbands are a little below those of single women; but they are a less experienced group, and include relatively few women. Married women, who supposedly have other means of support, earn considerably less than any of the other groups. Nor can this be explained on the basis of lack of experience, for their experience median is almost identical with that of the single and divorced women, and above that of women who are separated from their husbands.

Such an analysis is plausible enough, yet in fact it is unsound. The higher median earnings of widows, which appear in Table 17, disappear partially when experience is controlled, and entirely when differences in age are removed (Chart 6). Tables 18 and 19 seem quite definitely to establish the fact that earnings of single women tend to exceed not only those of married women of the same age and experience, but also those of widows and women who are divorced or separated from their husbands. For although median earnings of single women are below those of other women in the lower experience groups in Table 18, yet these single women are apparently much younger. In some groups, for instance, the median age of single women is sixteen years less than that of widows who have had the same amount of work experience. As soon as this age differential disappears, the median earnings of single women again exceed those of all other women with the same amount of experience. Finally, Table 19 shows even more clearly that single women earn consistently more than married women, and also more than widows and women divorced or separated from their husbands.¹

¹The two exceptions to this statement are (1) median earnings of married women under twenty-five years of age, and (2) median earnings of women between fifty-five and sixty who are divorced or separated from their husbands. Only in these two instances do the earnings of single women fall below those of others of the same age.

It may be argued that the number of cases in some of the age and experience

It would be hazardous indeed to venture any conclusions from this analysis as to the relative effectiveness of single and married women workers. We do know that, given the same age and work experience, single women earn most and married women least of the different groups of women classified by marital status. But to what extent the relatively low earnings of married women are due to lack of incentive, or to divided allegiance to home and job, or to a more limited range in occupational opportunity, it is impossible to say at this time. A more detailed study, now in process, of the two thousand married women included here, will, it is hoped, throw some light on these long-debated questions.¹

RESPONSIBILITY FOR DEPENDENTS AND EARNINGS

Low earnings of women who work are sometimes attributed in part to the fact that they are "pin-money" workers, living at home without financial responsibility either for themselves or others. Recent studies, however, show that at least for wage-earning women, problems of family support are fairly common. Of 31,482 women breadwinners included in a survey by the Women's Bureau of the United States Department of Labor, 27 per cent lived in families with no male wage earners, and 21 per cent were the sole breadwinners of the family.² According to another study by the same Bureau, 68 per cent of the women included in the investigation who were living at home contributed their entire earnings to the support of the family.³

groups in Tables 18 and 19 is too small to permit generalizations; yet the consistency shown wherever the number of cases is large leads one to believe that an increase in the number of cases, especially of widows and women who are divorced or separated from their husbands, would not substantially alter the general tendency for earnings of single women to exceed those of all other groups, and those of married women to fall below all others.

¹For further information on the relation of marital status to earnings in this study, see Tables 22 and 46.

²*Women Workers and Family Support* (Washington: United States Government Printing Office, 1925), Bulletin No. 49, p. 12.

³*Share of Wage-Earning Women in Family Support* (Washington: United States Government Printing Office, 1923) Bulletin No. 30, p. 12. See also *Women Workers and Family Support*, *Loc. cit.*

These figures are of course for wage-earning women. Comparatively little is known of the extent to which women at the higher occupational levels are responsible for the support of others, although it is assumed—perhaps too readily—that the financial burden of dependents decreases for women as their occupational status improves. Presumably this belief rests on the assumption that a woman who has the necessary ability and training for specialized, responsible work belongs in all probability to a family which is less likely to need her financial assistance. The assumption is logical enough, but is it borne out in fact?

TABLE 20—VARIATION IN EARNINGS WITH NUMBER OF DEPENDENTS

Number of Dependents (total or partial)	Number of Women	Per Cent of Total	Median Earnings ¹
None	8,445	60.9	\$1,492
One	3,172	22.9	1,636
Two	1,397	10.1	1,648
Three	460	3.3	1,692
Four	221	1.6	1,656
Five or more	161	1.2	1,828
Information missing	217	..	1,535
Total group	14,073	100.0	\$1,548

¹Calculated on \$100 class intervals.

Although the information on dependency contained in the questionnaires is somewhat circumscribed, it is nevertheless clear that financial responsibility for dependents is not limited to wage-earning women.¹ Of the 13,856 women who state the number of persons totally or

¹In the questionnaire, women were asked to report (1) number of persons totally or partially dependent on them, and (2) the proportion of their income devoted to the support of others. It is regrettable that the second question—"What percentage of your income goes for support of dependents?"—failed to give sufficiently reliable returns to be used here. Accurate dependency data, however, can only be secured through careful definitions of terms and detailed questions to be used in checking the reliability of the facts reported. It was impossible in this study to give the space necessary to adequate treatment of this topic. See p. 205 for the questions on dependency which were included.

partially dependent on them, 60.9 per cent are without dependents, 22.9 per cent report one dependent, and 16.2 per cent claim two or more. Single women apparently constitute the great majority of the group without dependents. Seventy-seven per cent of those reporting no dependents are single, 13.7 per cent married, 5.1 per cent widows, and 4 per cent divorced or separated from their husbands.

Women without dependents have notably lower earnings than women with dependents, for their earnings median is \$1,492 as against \$1,647 for women who have one or more dependents (Table 20). Again, as in the case of the lower earnings of married women, one is tempted to attribute this difference in earnings to "economic incentive," yet again analysis shows that such a generalization is hasty. For in the first place, earnings apparently vary but little between women with only one dependent and those with two or more (Table 20); and furthermore, part of the difference in earnings for the women with dependents is almost certainly due to the fact that they are an older, and so a more experienced group, since their median age is 39.9 years as compared with 35.5 years for women without dependents.

The incidence of the problem of dependents seems to vary with age, since 52.1 per cent of the women with dependents are between the ages of thirty-five and fifty, whereas 36.0 per cent of all those without dependents are between these ages. These years—from thirty-five to fifty—correspond roughly to the period of women's maximum earning capacity already indicated.¹

EDUCATION AND EARNINGS

General, Technical, and Professional Education and Earnings. Recent studies of the relation of education to earnings are unanimous in their conclusion that earnings tend to increase with education. This has been shown for men by Dean Everett W. Lord of Boston University in an analysis of the education and earnings of a random sampling of 7,396 men scattered throughout the United States.² Dean Lord's figures

¹Table 21. See also the section on the relation of savings and expenditures to earnings, in which savings and expenses of women with dependents are compared with those of women without dependents, pp. 111-120.

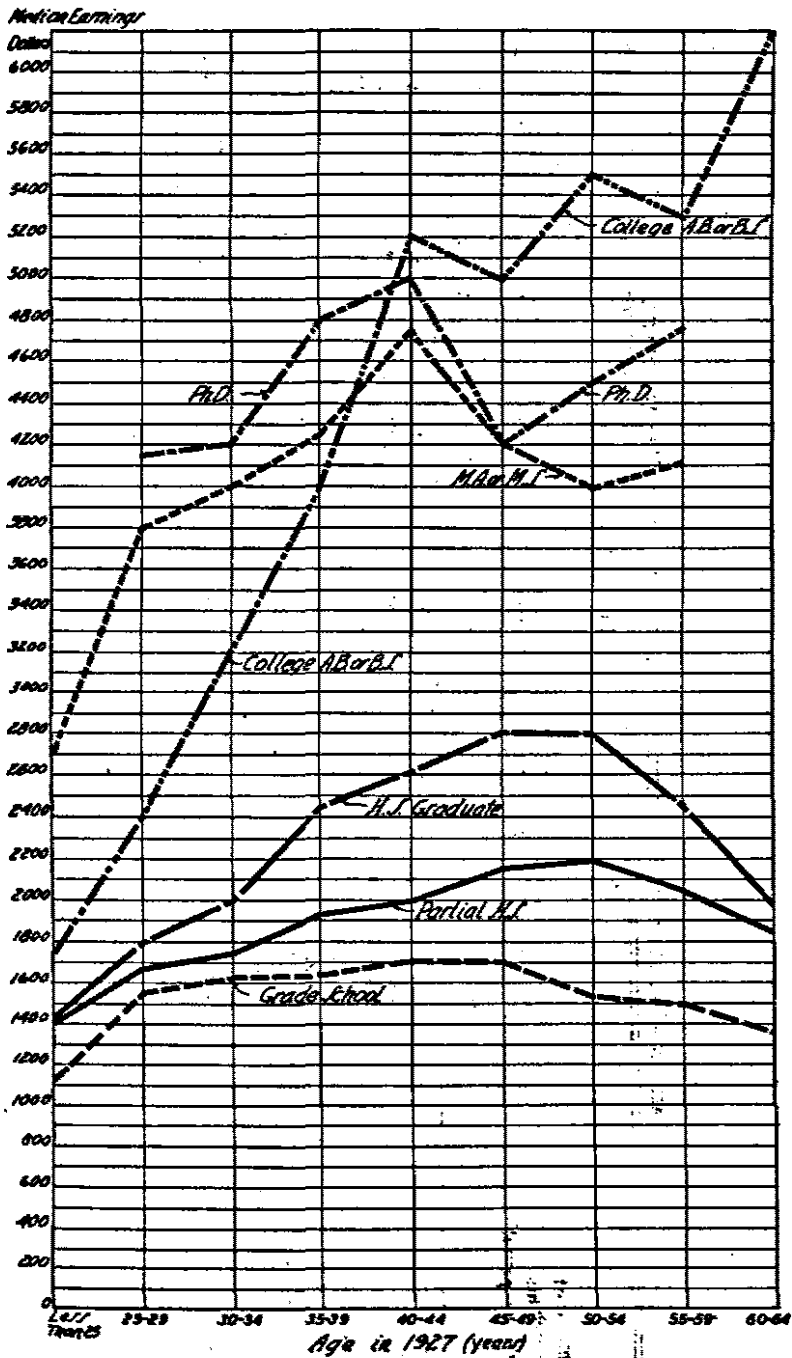
²"The Relation of Education and Income," *Christian Science Monitor*, March 5-17, 1928.

TABLE 21—VARIATION IN RESPONSIBILITY FOR DEPENDENTS WITH AGE

Age in 1927 (years)	Women Without Dependents		Women With Dependents		Information Missing		Total Group	
	Number	Per Cent of Total	Number	Per Cent of Total	Number	Per Cent of Total	Number	Per Cent of Total
Less than 25	1,200	14.4	286	5.4	28	13.9	1,514	10.9
25-29.9	1,491	18.0	566	10.6	29	14.3	2,086	15.1
30-34.9	1,329	16.0	794	14.9	30	14.8	2,153	15.6
35-39.9	1,235	14.9	1,042	19.5	33	16.3	2,310	16.7
40-44.9	960	11.6	985	18.5	27	13.4	1,972	14.3
45-49.9	789	9.5	752	14.1	28	13.9	1,569	11.3
50-54.9	627	7.5	521	9.8	13	6.4	1,161	8.4
55-59.9	405	4.9	244	4.6	6	3.0	655	4.7
60-64.9	184	2.2	106	2.0	4	2.0	294	2.1
65-69.9	72	0.9	30	0.5	3	1.5	105	0.8
70 and over	13	0.1	4	0.1	1	0.5	18	0.1
Information missing	140	..	81	..	15	..	236	..
Total	8,445	100.0	5,411	100.0	217	100.0	14,073	100.0
	Median earnings ¹ \$1,492 Median age 35.5 years		Median earnings ¹ \$1,647 Median age 39.9 years		Median earnings ¹ \$1,535 Median age 37.1 years		Median earnings ¹ \$1,548 Median age 37.5 years	

¹Calculated on \$100 class intervals.

CHART 7—VARIATION IN EARNINGS OF 4,973 MEN WITH EDUCATION AND AGE¹



¹From a study by E. W. Lord of Boston University. See pp. 49, 54, and 65 ff.

TABLE 22—VARIATION IN RESPONSIBILITY FOR DEPENDENTS WITH MARITAL STATUS

Number of Dependents (total or partial)	Marital Status					
	Single		Married		Widowed	
	Number of Women	Per Cent of Total	Number of Women	Per Cent of Total	Number of Women	Per Cent of Total
None	6,109	65.4	1,085	54.5	408	41.1
One	2,088	22.3	446	22.4	265	26.7
Two	766	8.2	250	12.6	186	18.8
Three	312	3.3	110	5.5	74	7.5
Four	99	1.0	57	2.9	32	3.2
Five or more	76	0.8	41	2.1	27	2.7
Information missing	147	....	29	....	6	....
Total	9,497	100.0	2,018	100.0	998	100.0

TABLE 22—(Continued)

Number of Dependents (total or partial)	Marital Status							
	Divorced		Separated		Information Missing		Total Group	
	Number of Women	Per Cent of Total	Number of Women	Per Cent of Total	Number of Women	Per Cent of Total	Number of Women	Per Cent of Total
None	270	41.9	46	37.4	527	69.5	8,445	60.9
One	198	30.8	41	33.3	134	17.7	3,172	22.9
Two	109	16.9	19	15.5	67	8.9	1,397	10.1
Three	37	5.7	11	8.9	16	2.1	460	3.3
Four	21	3.3	5	4.1	7	0.9	221	1.6
Five or more	9	1.4	1	0.8	7	0.9	161	1.2
Information missing	5	2	28	217
Total	649	100.0	125	100.0	786	100.0	14,073	100.0

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are based on "income from occupation in the year 1926." According to his study of men's earnings, the median annual earned income of the high school graduate exceeds that of the grade school graduate by amounts varying with age from \$310 to \$1,280. Similarly the men who hold Bachelor of Arts degrees from a college or university have median earnings from \$320 to \$4,225 above those of high school graduates of the same age (Chart 7 and Table 28); and men with advanced degrees, including lawyers, show higher median earnings than men with A.B. degrees. The only exception is in the case of men of forty or more with A.M. and Ph.D. degrees, most of whom are probably engaged in teaching, a relatively low-paid profession.

These figures seem to indicate that for men added years of education and specialized training have definite commercial value. But is it also true for women? Is it true to the same degree? Are college women in general earning more than high school graduates, and high school graduates more than grade school graduates? Are they earning more in all kinds of work, or only in a few? It is to such questions as these that we shall try to find an answer.

First, however, it may be well to recall a word of caution already expressed, which applies both to the interpretation of Dean Lord's data

TABLE 23—VARIATION IN EARNINGS WITH GENERAL EDUCATION

General Education	Number of Women	Per Cent of Total	Median Earnings ¹	Per Cent Earning \$3,000 and Over	Median Experience (years)
Grade school ²	1,561	11.2	\$1,480	7.6	17.4
High school ²	6,872	49.4	1,463	5.8	13.3
Normal school ²	1,745	12.6	1,506	5.0	14.9
College, non-graduate	1,968	14.2	1,529	7.1	12.5
College graduate ³	1,754	12.6	1,875	10.9	12.5
Information missing	173	...	1,412	...	...
Total group	14,073	100.0	\$1,526	...	13.5

¹Calculated on \$200 class intervals. This explains apparent discrepancies with Table 24.

²Attended or completed.

³Including A.B., graduate work without degree, A.M., Ph.D., and D.Sc.

TABLE 24—VARIATION IN EARNINGS WITH GENERAL EDUCATION

General Education	Number of Women	Per Cent of Total	Earnings ¹			Median Age (years)
			Lower Quartile	Median	Upper Quartile	
Grades 1-4	27	0.2	\$1,160	\$1,530	\$1,975	
Grades 5-8	1,524	11.0	1,078	1,519	1,973	41.7
Grades 9-10	1,604	12.2	1,095	1,541	1,958	39.1
Grades 11-12	5,173	37.2	1,394	1,885	1,881	35.5
Normal school with partial high school	509	3.9	1,226	1,572	1,992	
Normal school beyond high school	1,196	8.7	1,303	1,513	1,871	38.6
College or university, 1-3 years	1,968	14.2	1,226	1,550	2,005	36.4
A.B. or B.S. degree	1,233	8.9	1,457	1,750	2,145	35.2
A.B. and graduate work without degree	268	1.9	1,613	1,930	2,539	37.9
A.M. or M.S. degree	235	1.7	1,908	2,377	2,869	41.8
Ph.D. ² or D.Sc. degree	19	0.1	2,250	3,150	3,650	44.2
Information missing	173	..	1,018	1,433	1,887	47.0
Total group	14,073	100.0	\$1,215	\$1,548	\$2,006	37.5

¹Calculated on \$100 class intervals.

²For information on women with the Ph.D. degree based on more complete data see: Emilio J. Hutchinson, "Women and the Ph.D.," *Journal of the American Association of University Women*, XXII, No. 1 (1928), 19-22; Chase Going Woodhouse, "The Occupations of Members of the American Association of University Women," *ibid.*, XXI, No. 4 (1928), 119-122.

and to the figures presented here. Neither in his study nor in this was information available concerning differences in intelligence of the persons included. It is for this reason impossible to say how much of the apparent variation in earnings is due to education, and how much to native ability which would have been reflected in higher earnings without additional training. The earnings figures in the analysis which follows should therefore be regarded as a measure of the composite effect of education, differences in mental abilities, and differences in economic status which made that added education possible.

Here, as before, earnings are first related to education, disregarding other possible causal factors, such as age or work experience (Tables 23 and 24); then later other influences on earnings are considered in their relation to education and earnings (Tables 25 to 35).

TABLE 25—VARIATION IN EARNINGS WITH TECHNICAL AND PROFESSIONAL TRAINING

Technical and Professional Training	General Education								
	Grade School			High School			Normal School		
	Number of Women	Median Earnings ¹	Median Experience (years)	Number of Women	Median Earnings ¹	Median Experience (years)	Number of Women	Median Earnings ¹	Median Experience (years)
Business college	639	\$1,541	16.7	3,014	\$1,471	13.4	432	\$1,500	14.8
Business college and additional non-diploma courses	108	1,833	19.7	595	1,729	16.0	141	1,675	17.1
M.D. degree	2	....	...	8	....	...	6	....	...
R.N. degree ²	82	1,828	15.8	319	1,897	12.5	59	1,913	16.6
Law degree	3	....	...	16	2,400	16.7	3	....	...
Dental or pharmaceutic degree	...	....	...	2	....	...	2	....	...
D.O. degree	5	....	...	28	2,150	17.5	14	3,750	21.2
Diploma in art, music, library science, or home economics	9	....	...	120	1,650	15.2	34	1,500	17.7
Summer school course	3	....	...	128	1,438	15.3	168	1,575	15.3
Trade and technical course	80	1,500	15.3	187	1,526	13.7	43	1,750	18.2
Extension, correspondence course	53	1,380	19.1	274	1,588	14.2	168	1,535	16.6
None or information missing	577	1,263	18.4	2,181	1,287	11.7	675	1,391	13.3
Total group	1,561	\$1,480	17.5	6,872	\$1,463	13.3	1,745	\$1,506	15.0

¹Calculated on \$200 class intervals.

²See footnote 3 on p. 22 explaining method by which nurses' yearly earnings were calculated.

TABLE 25—(Continued)

Technical and Professional Training	General Education								
	College Non-Graduate			College A.B., A.M., Ph.D.			Total Group ^a		
	Number of Women	Median Earnings ¹	Median Experience (years)	Number of Women	Median Earnings ¹	Median Experience (years)	Number of Women	Median Earnings ¹	Median Experience (years)
Business college	480	\$1,526	12.0	231	\$1,790	12.2	4,835	\$1,500	13.7
Business college and additional non-diploma courses	166	1,665	15.4	65	1,900	14.0	1,078	1,736	16.4
M.D. degree	29	3,125	18.5	44	2,917	16.9	91	2,932	19.0
R.N. degree ²	78	1,932	13.3	30	2,167	12.5	571	1,902	13.4
Law degree	22	2,000	15.0	25	2,750	12.1	69	2,346	14.2
Dental or pharmaceutic degree	7	....	...	1	....	...	12	2,188	12.5
D.O. degree	26	3,062	16.7	7	....	...	82	2,479	17.1
Diploma in art, music, library science, or home economics	68	1,757	12.5	68	2,042	13.2	302	1,769	14.6
Summer school course	91	1,469	16.2	189	1,823	14.2	580	1,660	15.1
Trade and technical course	52	1,800	13.8	39	1,910	12.8	407	1,642	14.3
Extension, correspondence course	231	1,484	13.8	189	1,904	13.5	923	1,580	14.7
None or information missing	718	1,391	10.7	865	1,845	11.7	5,123	1,399	12.4
Total group	1,968	\$1,529	12.5	1,745	\$1,875	12.6	14,073	\$1,525	13.7

¹Calculated on \$200 class intervals.

²See footnote 3 on p. 22 explaining method by which nurses' yearly earnings were calculated.

^aThese figures include 173 cases in which information concerning education was missing.

TABLE 26—VARIATION IN EARNINGS WITH GENERAL EDUCATION AND SIZE OF COMMUNITY

General Education	Population									
	Less than 2,500		2,500-4,999		5,000-9,999		10,000-24,999		25,000-49,999	
	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹
Grade school ²	113	\$1,189	188	\$1,145	245	\$1,262	319	\$1,450	204	\$1,515
High school ²	469	1,241	932	1,248	1,322	1,309	1,517	1,411	935	1,615
Normal school ²	175	1,116	233	1,304	310	1,385	377	1,433	252	1,738
College non-graduate	150	1,227	257	1,272	313	1,311	525	1,508	296	1,836
College graduate ³	141	1,483	224	1,581	259	1,640	444	1,808	259	2,131
Information missing	12	....	19	1,220	35	1,150	37	1,380	23	1,700
Total group	1,050	\$1,252	1,853	\$1,295	2,484	\$1,345	3,219	\$1,485	1,969	\$1,748

¹Calculated on \$200 class intervals.

²Attended or completed.

³Includes A.B., graduate work without degree, A.M., Ph.D., and D.Sc.

TABLE 26--(Continued)

General Education	Population								
	50,000-99,999		100,000-249,999		250,000 and Over		Total Group		
	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Per Cent of Group
Grade school ²	182	\$1,633	168	\$1,865	142	\$2,008	1,561	\$1,480	11.2
High school ²	736	1,750	559	1,867	402	2,038	6,872	1,463	49.4
Normal school ²	179	1,795	120	2,032	99	2,094	1,745	1,506	12.6
College non-graduate	166	1,828	146	2,022	115	2,250	1,968	1,529	14.2
College graduate ³	173	2,107	111	2,224	143	2,631	1,754	1,875	12.6
Information missing	18	1,950	17	1,500	12	1,900	173	1,412	...
Total group	1,454	\$1,823	1,121	\$1,935	913	\$2,155	14,073	\$1,526	100.0

¹Calculated on \$200 class intervals.

²Attended or completed.

³Includes A.B., graduate work without degree, A.M., Ph.D., and D.Sc.

Median earnings of the total group tend to increase with added years of general education.¹ There are, however, surprisingly small differences in median earnings for women attending grade school, high school, normal school, or even college from one to three years. Not until the college graduate group is reached does an appreciable difference in earnings appear (Tables 23 and 25). Exclusive of college graduates, median earnings are lowest for the 6,872 women who attended or graduated from secondary schools, and highest for the 1,968 women who have attended a college or university from one to three years.² But the difference in median earnings of these two groups is only \$66. By contrast, median earnings of the 1,754 women holding A.B. or advanced academic degrees exceed those of the college non-graduates, their nearest competitors in earnings, by \$346.

Tables 23 and 24 relate earnings only to what has been defined as "general education." The earnings of women who have had additional technical or professional training are analyzed in Table 25. With the exception of women who have had business or commercial college training, whose apparently haphazard variations in earnings are later considered in detail,³ it is clear from this table that median earnings of those who have had technical or professional training tend to increase with the amount of general education preceding their special training. This is clearly shown in the case of registered nurses, whose median earnings increase from \$1,828 for those who have attended or graduated from grade school, to \$2,167 for those with college or university degrees, even though the latter group is less experienced.

¹"General education" here includes elementary and secondary schools, normal schools, colleges, and universities, through graduate work leading to A.M. and Ph.D. degrees. Special trade and technical courses and professional training in law, medicine, and dentistry have been tabulated separately (Table 25). Secondary schools presented some difficulty because of lack of standardization among them. For this reason, women attending secondary schools were subdivided into (1) those attending one or two years, and (2) those attending three or four years. Some of the latter group were graduated from high school at the end of three years (Table 24).

²It should be noted, however, that women who have had only grade school education are an older and more experienced group, which, as will appear in Table 27, accounts for their higher median earnings.

³See pp. 81-91 and Tables 34 and 35.

This analysis, however, is based solely on the relationships between different kinds or amounts of education and earnings, ignoring possible differences in group composition other than education. Many minor inconsistencies in Tables 23 and 24 disappear when other factors related to earnings are taken into consideration.

Education, Size of the Community, and Earnings. At each educational level, median earnings increase consistently with the size of the community in which the work is done. This is apparent from Table 26. But it is equally clear from the same table that the spread in median earnings between large and small communities is much greater for college graduates than for women with only elementary or secondary school education. College graduates in cities of a quarter of a million or more inhabitants have median earnings which are \$1,148 above those of college graduates in communities with a population of twenty-five hundred or less. By contrast, the median earnings for women with elementary and secondary school training in cities of a quarter of a million are, respectively, \$819 and \$797 above those of women with the same amount of education in towns of twenty-five hundred or less. In other words, the range in median earnings between large urban centers and small communities is almost half again as great for college graduates as for women with only secondary education or less. Furthermore, their earnings advantage seems to increase fairly consistently with the size of the community. In population centers of twenty-five hundred or less, median earnings of college graduates exceed those of women with grade school education by approximately three hundred dollars, while in cities of a quarter of a million or more the difference is over six hundred dollars.¹ It is reasonable to suppose that this increased earnings advantage of women college graduates in large cities is in part a reflection of the more varied occupational opportunities in urban centers.

¹These figures, however, represent the two extremes in earnings differences. The average difference in median earnings of college graduates and women with only grade school education in the different population groups included in Table 26 is \$437. For the four population groups under twenty-five thousand the average difference is \$366, as against \$518 for the four population groups over twenty-five thousand (Table 26).

TABLE 27—VARIATION IN EARNINGS WITH GENERAL EDUCATION AND AGE

General Education	Age in 1927 (years)											
	Less than 25		25-29.9		30-34.9		35-39.9		40-44.9		45-49.9	
	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹
Grade school	48	\$1,050	135	\$1,174	205	\$1,461	284	\$1,546	278	\$1,597	216	\$1,573
High school 1-2 years	108	1,063	203	1,283	260	1,471	317	1,618	304	1,650	196	1,762
High school 3-4 years	866	1,043	853	1,314	735	1,498	761	1,630	662	1,736	539	1,804
Normal school	153	1,077	231	1,273	270	1,489	288	1,598	237	1,609	200	1,750
College 1-3 years	224	1,212	345	1,333	315	1,478	301	1,615	250	1,903	219	1,817
A.B. or B.S. degree	99	1,377	264	1,544	238	1,792	234	1,892	143	2,031	113	1,956
A.B. and graduate work	10	1,550	31	1,527	55	1,929	60	1,991	43	2,222	26	2,361
A.M. or M.S. degree	2	1,400	13	1,750	41	2,188	46	2,250	35	2,659	37	2,625
Ph.D. or D.Sc. degree	1	....	1	....	3	2,750	2	3,250	3	3,375	2	4,000
Information missing	3	700	10	1,050	11	1,200	17	1,500	17	1,600	21	1,820
Total group	1,514	\$1,089	2,086	\$1,341	2,153	\$1,538	2,310	\$1,684	1,972	\$1,791	1,569	\$1,819

¹Calculated on \$200 class intervals.

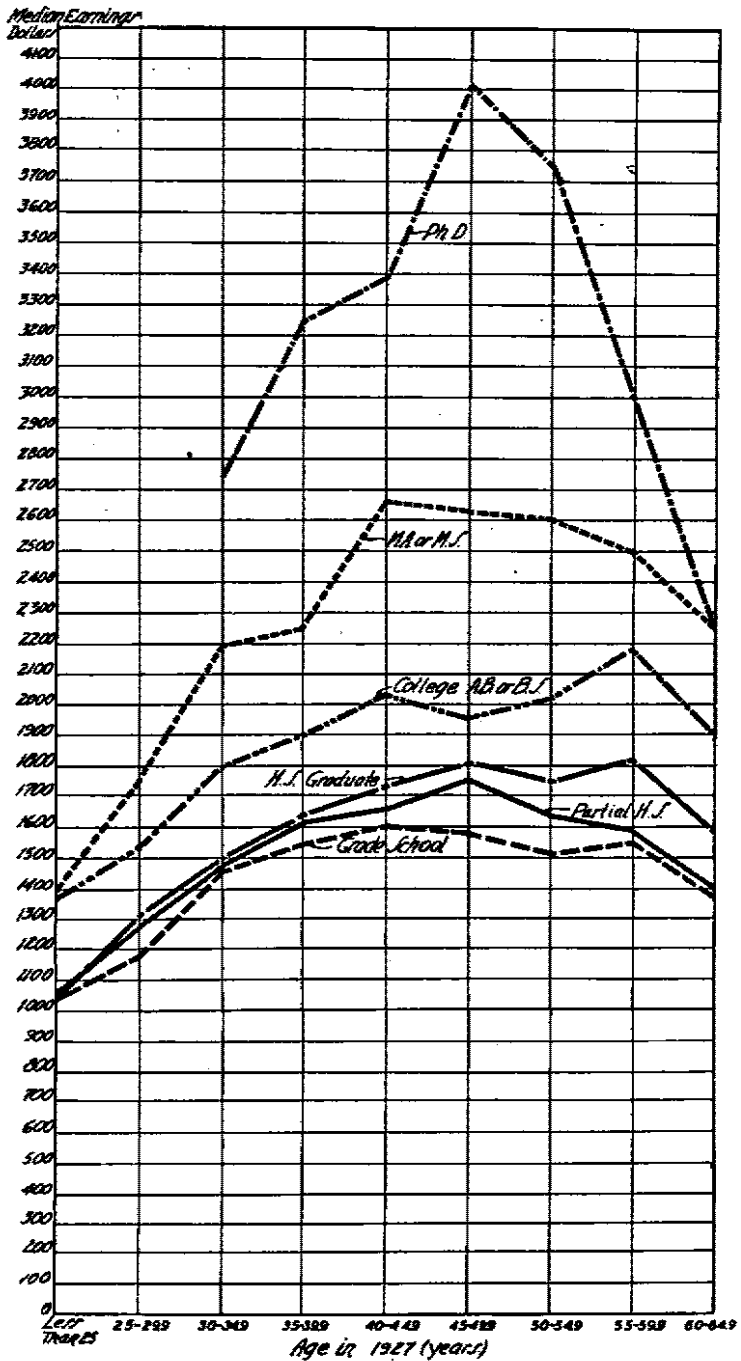
TABLE 27—(Continued)

General Education	Age in 1927 (years)												
	50-54.9		55-59.9		60-64.9		65-69.9		70 and Over		Total Group ^a		
	Number of Women	Median Earn- ings ^b	Number of Women	Median Earn- ings ^b	Number of Women	Median Earn- ings ^b	Number of Women	Median Earn- ings ^b	Number of Women	Median Earn- ings ^b	Number of Women	Median Earn- ings ^b	Per Cent of Total
Grade school	180	\$1,505	113	\$1,550	53	\$1,371	18	\$1,300	4	\$ 900	1,561	\$1,480	11.2
High school 1-2 years	151	1,633	83	1,589	29	1,400	10	1,450	3	1,100	1,694	1,510	12.2
High school 3-4 years	362	1,756	200	1,815	83	1,586	24	1,433	5	2,250	5,178	1,446	37.2
Normal school	194	1,781	86	1,692	47	1,840	16	1,700	1	1,500	1,745	1,506	12.6
College 1-3 years	147	1,895	74	1,800	43	1,700	20	2,250	2	1,600	1,968	1,529	14.2
A.B. or B.S. degree	67	2,015	46	2,171	11	1,900	7	2,500	..	....	1,232	1,758	8.9
A.B. and graduate work	221	1,986	13	2,375	3	3,750	..	....	..	....	268	1,970	1.9
A.M. or M.S. degree	26	2,600	18	2,500	7	2,250	4	4,250	1	....	235	2,340	1.7
Ph.D. or D.Sc. degree	2	3,750	4	3,000	1	2,250	..	....	..	....	19	3,167	0.1
Information missing	11	1,450	18	1,550	17	1,300	6	1,900	2	1,300	173	1,412	..
Total group	1,161	\$1,793	655	\$1,813	294	\$1,569	105	\$1,750	18	\$1,300	14,073	\$1,526	100.0

^aCalculated on \$200 class intervals.^bThese figures include 236 cases in which information concerning age was missing.

EARNINGS OF WOMEN

CHART 8—VARIATION IN EARNINGS OF REPORTING GROUP WITH EDUCATION AND AGE

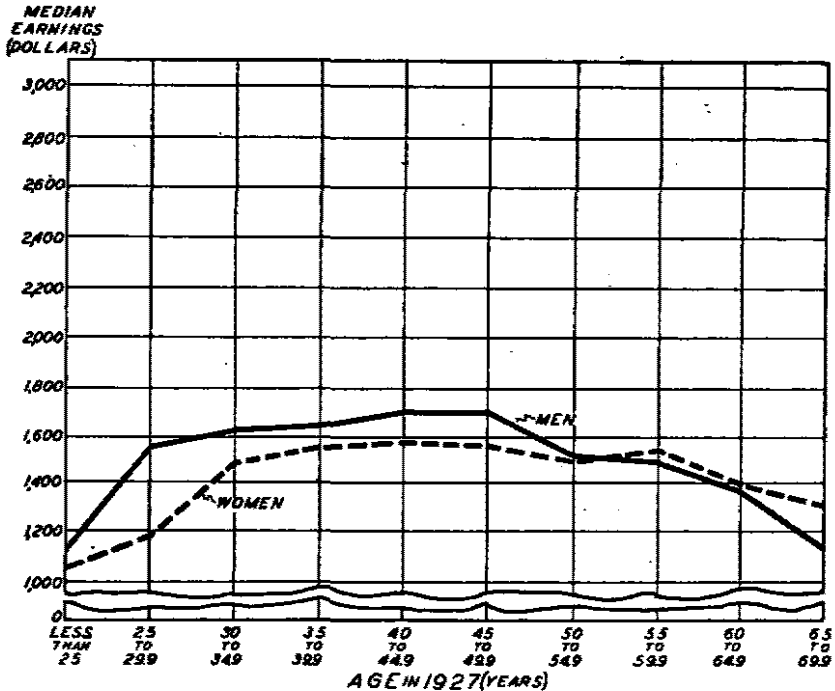


Age, Education, and Earnings. From the preceding analysis it seems that earnings of the total group tend to increase with education, though appreciable differences are not apparent until the college or university level is reached. This is true not only for the entire group, but also for all women of the same age. In each of the age groups in Table 27, earnings increase fairly consistently with education, though marked differences in median earnings are exceptional until the college or university women are included. Furthermore, the greater the difference in educational opportunity, the greater the earnings differential becomes with age. For example, the women with A.B. degrees have practically no greater earnings advantage over the high school graduates at fifty-five to sixty years of age than under twenty-five years,¹ while their advantage over the women with only grade school training at these ages increases from \$327 to \$621. It may be noted further that for the same age groups—those under twenty-five, and fifty-five to sixty—the difference in median earnings between women with A.M. degrees and those with grade school education increases from \$350 to \$950. Apparently, then, the earnings advantage of better educated women increases with age (Chart 8).

There is in Table 27 and Chart 8 some rather scant evidence that a decline in earnings sets in earlier for less educated women. Median earnings for women with grade school education reach their peak between forty and forty-five years of age, while for the high school graduates there are two nearly identical peaks, between forty-five and fifty and again between fifty-five and sixty. Highest median earnings for women with A.B. degrees occur between the ages of fifty-five and sixty.² This is in contrast to the women with higher academic degrees, who apparently reach an early maximum between the ages of forty and fifty. The same is true for the relatively few cases of men with higher degrees in Dean Lord's study of men's earnings. Doubtless both groups are largely composed of teachers. Yet it is probably a mistake to

¹ The difference in median earnings between women with A.B. degrees and high school graduates is \$334 for those below twenty-five years of age and \$356 for those between fifty-five and sixty.

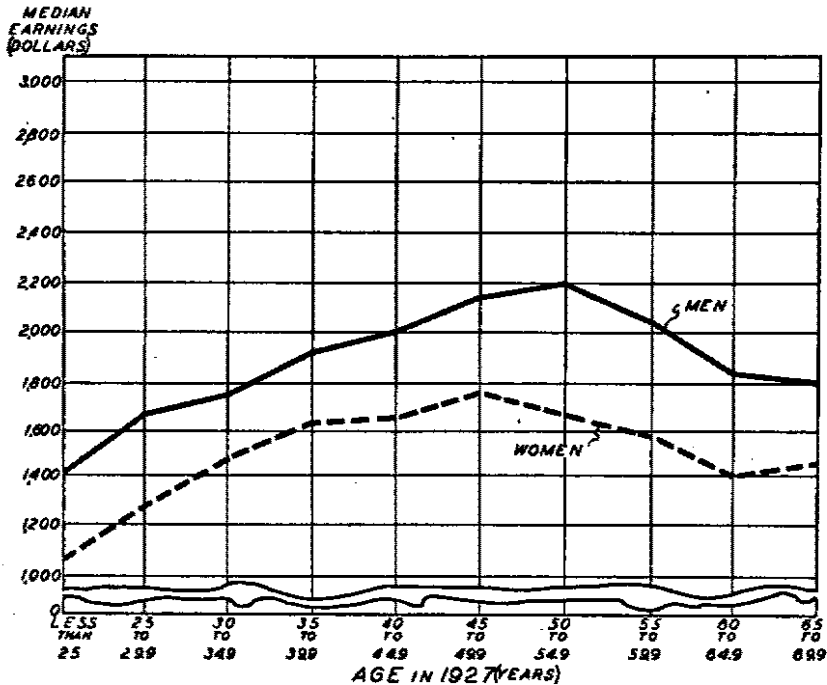
² Apparently earnings drop after sixty years of age regardless of education, although the number of cases is too small to afford conclusive evidence.

CHART 9—COMPARISON OF EARNINGS OF MEN AND WOMEN WITH GRADE SCHOOL EDUCATION BY AGE GROUPS¹

¹Earnings data for 1,262 men from a study by E. W. Lord. See p. 49.

conclude that men and women in teaching are confronted with the prospect of an early decline in earnings; for even if there were enough cases to show definite tendencies, which is very doubtful, the reasonable explanation of what appear to be declining earnings after the age of forty or forty-five lies in the recent increase in teaching salaries. If this is true, then younger men and women in teaching have benefited more from the increase than those already established in academic work, and between the ages of forty and fifty they will be earning more than persons of that age who report earnings in these two studies.¹

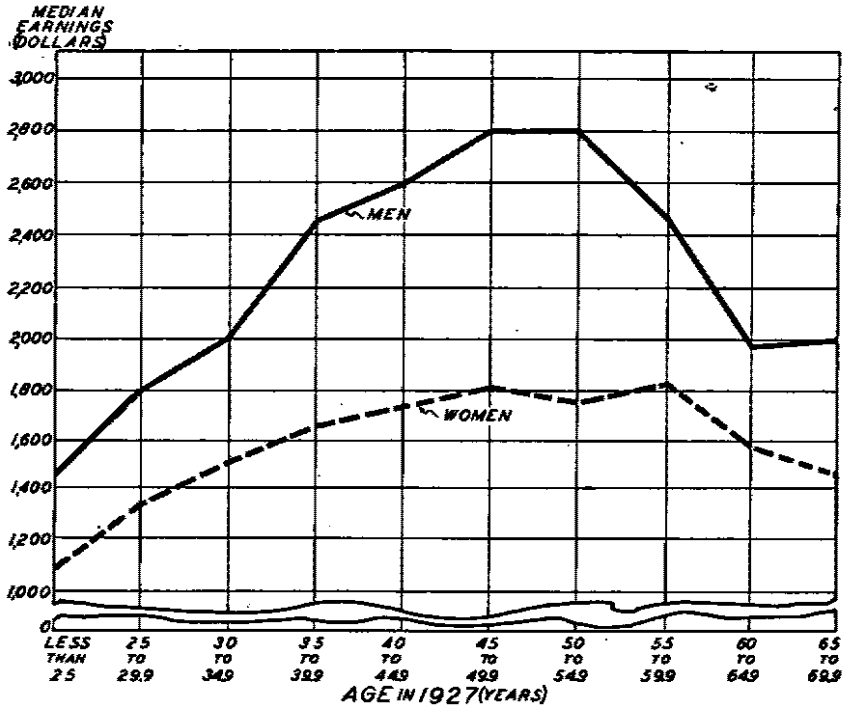
¹This reasoning is applicable to the analysis of earnings according to age throughout the study. The figures show only the variations in earnings for different age groups in 1927. Clearly one cannot infer from them that women of thirty in 1927 will in 1937 be earning what women of forty earned in 1927. Predictions concerning the actual amount of future earnings on the basis of figures given here by age groups are not possible.

CHART 10—COMPARISON OF EARNINGS OF MEN AND WOMEN WITH PARTIAL HIGH SCHOOL EDUCATION BY AGE GROUPS¹

¹Earnings data for 1,295 men from a study by E. W. Lord.

For women, advanced academic degrees are to be associated with consistently higher earnings. The woman with an A.M. degree earns more than the woman of the same age with an A.B., and in most cases considerably more (Table 27). Similarly, median earnings of the 19 women holding Ph.D. degrees are well above those with A.M. degrees, though obviously the number of cases is too small for safe generalization.¹

¹A recent study of nearly fourteen hundred Radcliffe College alumnae tends to support the conclusion that women with higher academic degrees earn more than women with only A.B. degrees. "The median salary of an even hundred Ph.D.'s who reported to Radcliffe what they are earning is \$2,900 a year, while that for 408 A.M.'s is \$2,500. The 722 holders of the A.B. degree have a \$2,000 median salary, while the median for the special students is only \$1,900." *New*

CHART II—COMPARISON OF EARNINGS OF MEN AND WOMEN WITH HIGH SCHOOL EDUCATION BY AGE GROUPS¹

¹Earnings data for 1,772 men from a study by E. W. Lord.

A comparison of Dean Lord's earnings data for men with those for the women in this study affords many interesting contrasts.¹

York Times, October 22, 1928. Note that the corresponding medians for groups included in this study are as follows: Ph.D., \$3,167; A.M., \$2,349; A.B., \$1,758.

It is unfortunate that Dean Lord's study does not include more men with the degrees of A.M. and Ph.D.; but if one may judge by the 89 cases included, the earnings of men with advanced academic degrees do not, as in the case of women, exceed those of men with A.B. degrees. On the contrary they earn, after forty years of age, conspicuously less than those with the A.B. degree. Probably this is because the majority of women holding A.B. degrees, as well as those with the A.M. and Ph.D., are engaged in teaching, while the men with the A.B. degree are predominantly a non-teaching group.

¹Although Dean Lord's study includes 7,396 men, only 4,973 belong in the educational groups in Table 28. It should also be noted that "Information missing" cases are omitted in Table 28, which accounts for differences in group totals in Tables 27 and 28.

Apparently the difference between men's and women's earnings varies directly with the amount of education received. Given, for instance, college men and women of the same age, the difference in their median earnings will presumably be much greater than that existing between a group of high school men and women of the same age; and in turn the earnings differential in this second case will exceed that of grade school men and women of the same age. The difference in median earnings of Dean Lord's 1,262 men with grade school education and the 1,530 grade school women included here is almost negligible (Chart 9). For both groups, there is a sharp increase in earnings between the ages of twenty-five and thirty-five, with no very marked change after fifty.¹

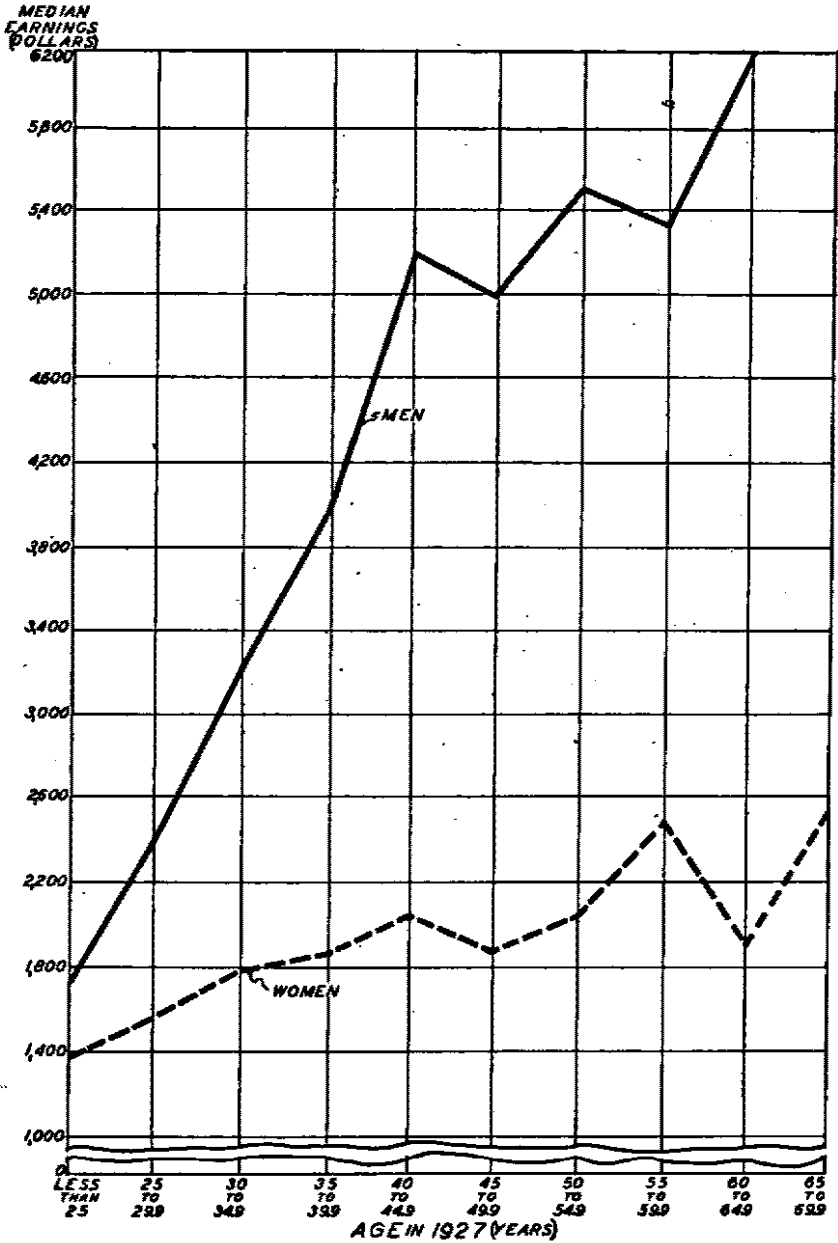
There is still a striking similarity in contour of the earnings curves of those men and women who have had partial high school education (Chart 10). At the same time, the disparity in median earnings between the sexes is perceptibly greater than for the grade school group; and also the period during which earnings tend to increase is noticeably longer.² For this partial high school group, the period of declining earnings sets in five years earlier for women than for men.

At the high school level, the earnings curve for women conforms less closely to the men's (Chart 11). The women's earnings vary but little from those of the partial high school group. Median earnings for the men, however, increase much more rapidly until between the ages of forty-five and fifty they exceed the women's by almost a thousand dollars. Maximum earnings for both men and women are apparently

¹The maximum difference in earnings for men and women with grade school education in the two groups is \$376, between twenty-five and thirty years of age; and between fifty-five and seventy, median earnings of the women are above those of the men. The average amount by which the men's earnings in the different age groups exceed the women's at the grade school level is \$100. Compare this with an average difference of \$391 for the men and women with partial high school education, \$681 for the high school graduates, and \$2,319 for those having A.B. or higher degrees.

²A slight difference in the educational composition of the men's and women's groups may account for some of the differences in median earnings. Dean Lord includes in his "partial" high school group all men who did not complete four years of high school work, while the corresponding group for women includes those who have attended high school one to two years.

CHART 12—COMPARISON OF EARNINGS OF MEN AND WOMEN WITH A.B. DEGREES BY AGE GROUPS¹



¹Earnings data for 555 men from a study by E. W. Lord.

reached between forty-five and fifty, and both show an appreciable drop in earnings thereafter.

The disparity between men's and women's earnings is at a maximum at the college level (Chart 12). This might well be expected. But it is surprising—and disconcerting—to discover that men with high school training in Dean Lord's study earn consistently more than the women with A.B. degrees reporting here. Nor are the differences in earnings between these two groups slight. They vary anywhere from \$53 for men and women under twenty-five to \$844 for those between forty-five and fifty (Table 28).

For college men and women of the same age, the difference in median earnings increases consistently with age from \$373 for those under twenty-five to \$4,300 for a very few cases between sixty and sixty-five. The differences are admittedly great. Yet in considering the significance of these figures, we should remind ourselves that they cannot be taken as a measure of the difference in earnings of college men and women in the same kind of work. The occupational composition of Dean Lord's group of men with A.B. degrees is not known, though probably it is made up largely of business men, since earnings of men with medical and law degrees are analyzed independently. By contrast, the majority of women college graduates included here are engaged in teaching. It is therefore impossible to say how much of the indicated differences in earnings of men and women with A.B. degrees is due to the kinds of work represented in the two groups, and how much to differences in the earnings of men and women engaged in the same work.

Of the combined relationship of age and education to earnings of women, one may say in general that the earnings advantage of better educated women increases with age. For women, too, advanced academic degrees are to be associated with consistently higher earnings, which is not the case for the 89 men with A.M. and Ph.D. degrees studied by Dean Lord. After forty, earnings of the men with Ph.D. degrees drop below those of men with A.B. degrees.

When the earnings of men and women of the same age and education are compared, it is clear that the disparity in earnings increases steadily from almost negligible differences at the grade school level to

TABLE 28—EARNINGS OF REPORTING GROUP COMPARED WITH EARNINGS OF MEN¹ OF THE SAME AGE AND GENERAL EDUCATION

Age (years)	General Education											
	Grade School				Partial High School				High School Graduate			
	Number of Men	Median Earnings	Number of Women	Median Earnings	Number of Men	Median Earnings	Number of Women	Median Earnings	Number of Men	Median Earnings	Number of Women	Median Earnings
Less than 25 years	142	\$1,120	48	\$1,050	....	\$1,400	108	\$1,063	225	\$1,430	866	\$1,043
25-29.9	185	1,550	135	1,174	....	1,675	203	1,283	243	1,800	853	1,314
30-34.9	212	1,625	205	1,461	....	1,742	260	1,471	277	2,000	755	1,498
35-39.9	262	1,634	284	1,546	....	1,920	317	1,618	211	2,450	761	1,630
40-44.9	178	1,700	278	1,597	....	2,000	304	1,650	228	2,600	662	1,736
45-49.9	133	1,700	216	1,573	....	2,150	196	1,762	193	2,800	539	1,804
50-54.9	92	1,528	180	1,505	....	2,200	151	1,633	167	2,800	362	1,756
55-59.9	36	1,500	113	1,550	....	2,050	83	1,589	109	2,460	200	1,815
60-64.9	14	1,365	53	1,371	....	1,850	20	1,400	98	1,975	83	1,588
65-69.9	8	1,120	18	1,300	....	1,800	10	1,450	21	2,000	24	1,413
Total group ²	1,262	....	1,530	\$1,480	1,295	....	1,661	\$1,510	1,772	....	5,105	\$1,446

¹From a study by E. W. Lord. See footnote, p. 49.

²Omitting cases where desired information was missing. This explains lack of agreement with totals in Table 27.

TABLE 28—(Continued)

Age (years)	General Education											
	College A.B., B.S. Degree				A.M., M.S. Degree				Ph.D. Degree			
	Number of Men	Median Earnings	Number of Women	Median Earnings	Number of Men	Median Earnings	Number of Women	Median Earnings	Number of Men	Median Earnings	Number of Women	Median Earnings
Less than 25 years	62	\$1,750	99	\$1,377	4	\$2,700	2	\$1,400	2	....	1	....
25-29.9	74	2,400	264	1,544	6	3,800	13	1,750	9	\$4,150	1	....
30-34.9	102	3,700	238	1,792	4	4,000	41	2,188	7	4,200	3	\$2,750
35-39.9	111	4,000	234	1,892	8	4,250	46	2,250	8	4,800	2	3,250
40-44.9	83	5,200	143	2,031	4	4,750	35	2,659	6	5,000	3	3,375
45-49.9	61	5,000	113	1,956	7	4,200	37	2,625	7	4,200	2	4,000
50-54.9	34	5,500	67	2,015	6	4,000	26	2,600	5	4,500	2	3,750
55-59.9	19	5,300	46	2,171	3	4,100	18	2,500	3	4,750	4	3,000
60-64.9	7	6,200	11	1,900	..	....	7	2,250	..	....	1	2,250
65-69.9	2	....	7	2,500	..	....	4	4,250	..	....	..	....
Total group ²	555	....	1,222	\$1,758	42	....	229	\$2,349	47	....	19	\$3,167

²Omitting cases where desired information was missing. This explains lack of agreement with totals in Table 27.

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sums as large as \$4,300 for men and women holding A.B. degrees. These earnings differences at the college or university level, however, are due in part to the kinds of work engaged in by men and women, and should not be taken as an indication of earnings differences between the sexes in the same occupations.

Education and Earnings in Different Types of Work. Earnings of women, like those of men, increase with education. But is it because more educated women, wittingly or unwittingly, are engaging in the kinds of work in which financial rewards are greatest? Is there at each educational level a characteristic occupational concentration which may in part account for differences in earnings? Or does the better educated woman have higher earnings in all kinds of work? If so, is she making the most of her advantage by selecting more lucrative vocations? Such questions as these are of immediate interest.

The proportion of women in different fields of employment seems to vary considerably in the different educational groups (Table 29).¹ If for instance we take the proportion of the total group in each of the different fields of employment in Table 29 as a measure of representative concentration, then more women with elementary and secondary school education than might be expected are engaged in *Commerce, Manufacture, and Transportation*, while those with normal school and college training tend to concentrate in *Education*.

If, on the other hand, occupations are classified according to the nature of the job itself, similar tendencies for women at the different educational levels to concentrate in certain kinds of work are apparent (Table 30). Women with only grade school education are found in more than representative proportions in production, sales, purchasing, and also food, housing, and personal service. These four types of work, moreover, have the lowest median earnings of any of the occupational groups at that educational level (Table 31). Similarly, women who have attended high school concentrate characteristically, compared to

¹It will be recalled that occupations have been classified in two ways—first, by “fields of employment”—that is, according to the kind of business, industry, or organization in which the job is carried on; and second, by “types of work,” or on the basis of the nature of the job itself. For a more detailed description of this dual scheme of classification, see pp. 15-17.

TABLE 20—DISTRIBUTION OF REPORTING GROUP BY EDUCATION AND FIELDS OF EMPLOYMENT

Field of Employment ¹	General Education													
	Grade School		High School		Normal School		College Non-Graduate		College A.B., A.M., Ph.D		Information Missing		Total Group	
	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total
Commerce	751	52.7	2,900	44.6	408	24.6	419	22.4	200	11.7	65	46.7	4,743	35.7
Education	51	3.6	473	7.3	787	47.4	723	38.6	1,040	60.8	14	10.1	3,088	23.2
Manufacture	255	17.8	1,246	19.2	142	8.6	186	9.9	79	4.6	14	10.1	1,922	14.4
Government	108	7.6	631	9.7	120	7.2	197	10.5	123	7.2	15	10.8	1,194	9.0
Professional	103	7.2	553	8.5	91	5.5	173	9.2	85	5.0	16	11.5	1,021	7.7
Semi-public	70	5.0	375	5.8	70	4.2	140	7.5	169	9.9	7	5.0	831	6.2
Transportation	80	5.6	290	4.5	34	2.0	28	1.5	8	0.5	8	5.8	448	3.4
Primary production	8	0.5	26	0.4	8	0.5	8	0.4	5	0.3	0	0.0	55	0.4
Information missing	135	...	378	...	85	...	94	...	45	...	34	...	721	...
Total	1,561	100.0	6,872	100.0	1,745	100.0	1,968	100.0	1,754	100.0	173	100.0	14,073	100.0

¹For explanation of this classification, see p. 15.

TABLE 30—DISTRIBUTION OF REPORTING GROUP BY EDUCATION AND TYPES OF WORK

Type of Work	General Education													
	Grade School		High School		Normal School		College Non-Graduate		College A.B., A.M., Ph.D.		Information Missing		Total Group	
	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total
Clerical	648	43.5	3,887	58.0	478	28.0	597	30.9	204	11.9	48	32.0	5,862	42.8
Teaching	34	2.3	293	4.5	747	43.7	647	33.6	957	55.3	11	7.3	2,689	19.7
Sales and publicity	306	20.6	735	11.0	160	9.4	157	8.2	84	4.9	27	18.0	1,469	10.8
Health	110	7.4	439	6.6	96	5.6	152	7.9	82	4.7	15	10.0	894	6.5
Finance	62	4.2	394	5.8	51	3.0	65	3.4	32	1.8	5	3.3	609	4.5
Production and planning	139	9.4	245	3.7	26	1.5	29	1.5	11	0.6	13	8.7	463	3.4
Food, housing, and personal service	80	5.4	179	2.7	38	2.2	53	2.8	59	3.4	9	6.0	418	3.1
Welfare	17	1.1	108	1.6	21	1.2	57	3.0	109	5.3	3	2.0	315	2.3
Library	6	0.4	62	0.9	24	1.4	41	2.1	66	3.8	6	4.0	205	1.5
Legal and protective	15	1.0	84	1.3	16	0.9	36	1.9	29	1.7	2	1.3	182	1.3
Editorial	15	1.0	65	1.0	22	1.3	36	1.9	28	1.6	2	1.3	168	1.2
Purchasing	37	2.5	79	1.2	9	0.5	6	0.3	6	0.3	4	2.7	141	1.0
Research	4	0.3	26	0.4	6	0.4	13	0.7	80	1.7	1	0.7	80	0.6
Personnel	4	0.3	34	0.5	8	0.5	8	0.4	21	1.2	0	..	75	0.5
Not elsewhere classified	9	0.6	60	0.8	6	0.4	26	1.4	13	0.8	4	2.7	118	0.8
Information missing	75	..	182	..	37	..	45	..	23	..	23	..	385	..
Total	1,561	100.0	6,872	100.0	1,745	100.0	1,968	100.0	1,754	100.0	173	100.0	14,073	100.0

TABLE 31—VARIATION IN EARNINGS IN DIFFERENT TYPES OF WORK WITH EDUCATION

Type of Work	General Education																	
	Grade School			High School			Normal School			College Non-Graduate			College A.B., A.M., Ph.D.			Total Group ²		
	Number of Women	Median Earnings ¹	Median Experience (years)	Number of Women	Median Earnings ¹	Median Experience (years)	Number of Women	Median Earnings ¹	Median Experience (years)	Number of Women	Median Earnings ¹	Median Experience (years)	Number of Women	Median Earnings ¹	Median Experience (years)	Number of Women	Median Earnings ¹	Median Experience (years)
Clerical	648	\$1,501	16.3	3,887	\$1,403	12.0	478	\$1,490	14.2	597	\$1,454	10.3	204	\$1,621	10.6	5,862	\$1,434	12.4
Teaching	34	1,560	20.9	293	1,436	16.6	747	1,424	14.2	647	1,394	12.8	957	1,773	12.8	2,689	1,552	13.6
Sales and publicity	306	1,306	19.1	735	1,467	16.0	160	1,460	16.5	157	1,876	13.9	84	1,962	15.5	1,469	1,490	16.4
Health	110	1,552	14.2	439	1,793	12.1	96	1,938	17.5	152	2,000	13.4	82	2,483	13.0	894	1,858	13.3
Finance	62	1,955	20.6	394	1,900	17.1	51	1,583	15.0	65	1,943	15.7	32	2,000	13.6	609	1,904	16.9
Production and planning	139	1,280	18.3	245	1,303	13.8	26	1,600	19.0	29	1,867	15.5	11	2,500	12.5	463	1,321	15.5
Food, housing, and personal service	80	1,356	14.6	179	1,547	13.0	38	1,740	16.4	53	2,300	15.0	59	2,297	12.5	418	1,883	13.8
Welfare	17	1,875	20.4	108	1,897	17.6	21	1,912	19.0	57	1,992	16.0	109	2,119	12.7	315	1,968	15.6
Library	6	....	...	62	1,533	17.2	24	1,400	18.1	41	1,420	18.0	66	1,893	13.3	205	1,631	16.2
Legal and protective	15	1,533	20.0	84	1,847	16.1	16	1,950	15.8	36	1,867	12.9	29	2,214	12.5	182	1,882	14.9
Editorial	15	1,850	21.2	65	1,444	14.0	22	1,650	15.0	36	1,471	12.0	28	1,950	10.4	168	1,538	13.4
Purchasing	37	1,400	22.5	79	1,293	15.6	9	....	...	6	....	...	6	....	...	141	1,374	18.3
Research	4	....	...	26	1,900	11.4	6	....	...	13	2,125	10.0	30	1,983	8.8	80	1,660	10.3
Personnel	4	....	...	34	2,167	18.8	8	....	...	8	....	...	21	2,450	12.9	75	2,174	16.5
Not elsewhere classified	9	....	...	60	....	...	6	....	...	26	....	...	13	....	...	118	....	...
Information missing	75	1,600	26.7	182	1,391	14.4	37	1,514	17.5	45	1,520	20.0	23	1,950	...	385	1,478	19.5
Total group	1,561	\$1,480	17.5	6,872	\$1,463	13.3	1,745	\$1,506	15.0	1,968	\$1,529	12.5	1,754	\$1,876	12.6	14,073	\$1,526	13.7

¹Calculated on \$200 class intervals.

²Totals include "information missing" cases.

total group proportions, in clerical work and finance, though purchasing and production also claim slightly more than their representative share. With the exception of financial work, in which median earnings are \$1,900, earnings for these groups are lowest of all at the high school level.¹

More women with normal school education or one to three years of college training enter teaching than one might expect from the figures for the total group. Here, too, low earnings are apparently to be associated with occupational concentration, for with the exception of a few normal school women in library work, teaching is the lowest paid group of any at these educational levels.

The relation between group concentration and low earnings, which so far has been consistently observed for each educational group, at first seems less apparent for college graduates. College women concentrate in more than representative proportions in teaching, welfare, library work, research, and personnel work, and of these groups all except teaching have relatively high median earnings. Yet none of these last high-earnings groups is large, and altogether they include only about one-eighth of the college graduates, whereas teaching alone claims more than half of them. In teaching, moreover, median earnings at the college level are lower than in any other group with the exception of clerical work. On the whole, therefore, the experience of the college graduate seems to confirm rather than disprove the relationship existing between low earnings and numerical concentration at other educational levels.

If this analysis is correct—if, that is, low earnings for any educational group may be expected in those occupations in which women with that amount of training tend to concentrate—it lends further support to the theory that earnings in any occupation depend primarily on the supply of qualified workers. If plenty of workers are available, earnings are low; if they are scarce, earnings are high. Yet it may well be that numbers are not alone responsible for the differences in earnings. Selective factors may also be important in the situation. For

¹Analysis of the occupational histories of women now engaged in financial work shows that a considerable proportion of them have been advanced from clerical positions.

women at each educational level there are some occupations to which entrance is easy. Probably the more acquiescent and less able women follow the easy, traditional occupational routes, while the more aggressive and competent workers find their way into work which is less usual at that educational level. The result is on the one hand a numerical concentration of less carefully selected workers in the customary, easily available occupations, and on the other, relatively few women, selected on the basis of initiative and probably also ability, who have ventured into occupations which usually recruit from more educated groups. It is not possible to say how important these selective factors are in their effect on earnings. Probably, however, their influence is slight in comparison to the fundamental factor of supply of qualified workers.

Yet whatever the relative importance of numbers and selection in their effect on earnings, two things are apparent from this analysis—first, that women with the same amount of education tend to concentrate in certain occupational groups, and second, that in those groups, earnings are relatively low. This does not, however, explain the fact that median earnings of better educated women are consistently higher than those with less education. This is apparent for two reasons. In the first place, a large proportion of women at the higher educational levels are engaged in teaching, where salaries are relatively low. Four per cent of all the women included in the study who are engaged in teaching earn \$3,000 or more. The only occupational group showing a lower percentage are the clerical workers, of whom 2.6 per cent earn this amount (Table 32). Second, and perhaps even more significant, is the fact that in every field of work, the woman college graduate is earning more than the less educated woman, in spite of the fact that she is on the whole less experienced.¹

Where college women venture they seem to succeed. But as yet they have not ventured to any extent into the "newer" occupations for

¹Two minor exceptions to this general statement may be found in Table 31—first, a \$3 difference in median earnings in *Food, housing, and personal service*, to the advantage of the college non-graduate; and, second, median earnings of \$2,125 for the latter in *Research*, compared with \$1,983 for the college graduate. These last figures are based on too few cases to make the difference a significant one.

TABLE 32—VARIATION IN THE PROPORTION OF WOMEN EARNING \$3,000 OR OVER WITH GENERAL EDUCATION AND TYPE OF WORK

Type of Work	General Education													
	Grade School		High School		Normal School		College Non-Graduate		College A. B., A. M., Ph. D.		Information Missing		Total Group	
	Number of Women	Per Cent Earning \$3,000 or Over	Number of Women	Per Cent Earning \$3,000 or Over	Number of Women	Per Cent Earning \$3,000 or Over	Number of Women	Per Cent Earning \$3,000 or Over	Number of Women	Per Cent Earning \$3,000 or Over	Number of Women	Per Cent Earning \$3,000 or Over	Number of Women	Per Cent Earning \$3,000 or Over
Clerical	648	2.5	3,887	2.3	478	3.0	597	2.8	204	6.1	48	..	5,862	2.6
Teaching	34	3.0	293	4.4	747	1.9	647	1.9	957	6.9	11	..	2,689	4.0
Sales and publicity	306	13.1	735	14.4	160	14.6	157	17.3	84	29.3	27	..	1,469	15.2
Health	110	5.9	439	8.3	96	15.9	152	24.3	82	37.0	15	..	894	14.1
Finance	62	25.4	394	16.0	51	12.0	65	20.0	32	28.1	5	..	609	17.7
Production and planning	139	4.2	245	7.0	26	10.0	29	26.9	11	37.5	13	..	463	8.3
Food, housing, and personal service	80	11.7	179	13.0	38	10.3	53	16.0	59	16.4	9	..	418	13.7
Welfare	17	20.0	108	6.5	21	0.0	57	5.2	109	8.3	3	..	315	7.0
Library	6	16.7	62	6.7	24	4.2	41	2.4	66	6.3	6	..	205	5.5
Legal and protective	15	21.4	84	13.6	16	13.3	36	23.3	29	28.6	2	..	182	18.2
Editorial	15	0.0	65	4.8	22	4.8	36	9.1	28	20.8	2	..	168	7.7
Purchasing	17	11.1	79	1.3	9	22.2	6	0.0	6	16.7	4	..	141	5.8
Research	4	25.0	26	8.0	6	0.0	13	0.0	30	3.4	1	..	80	5.1
Personnel	4	0.0	34	26.5	8	0.0	8	0.0	21	33.3	..	..	75	21.6
Not elsewhere classified	9	..	60	..	6	..	26	..	13	..	4	..	118	..
Information missing	75	..	182	..	37	..	45	..	23	..	23	..	385	10.8
Total	1,561	..	6,872	..	1,745	..	1,968	..	1,754	..	173	..	14,073	6.7

women. More than half of the college group studied are engaged in teaching, and teaching and clerical work together claim two-thirds of all women holding A.B. or advanced degrees. Yet these two fields of work have the lowest median earnings of any at the college level. Not only are median earnings low in these two groups, but cases of high earnings are comparatively rare. Six per cent of the college graduates in clerical work and teaching earn \$3,000 or over, as against 37.5 per cent in production and health work, 29.3 per cent in sales, and 28.1 per cent in finance. Yet none of these occupational groups contains its representative share of college women. There are relatively less than one-fifth as many college graduates in production and planning as are in the total group, two-thirds as many in health work, one-half as many in sales and publicity work, and little more than one-half as many in finance.

If, therefore, our group of 1,754 college graduates may be taken as a fair sampling—and there seems no reason to believe otherwise—we are forced to conclude that college women are not taking full advantage of their opportunities, measured in terms of possible earnings. For although in every field of work that they have entered they show earnings above those of women with less education, they do not tend to select occupations where chances of high financial rewards are best.

Seventy per cent of these college women are in the employ of educational, social, or welfare organizations. Why? Is it because the college woman can afford to overlook questions of earnings? Are the inherent satisfactions of the work itself more important to her than financial returns? May it be that teaching and welfare work seem to the college woman more socially approved ways of earning a livelihood? Or is she unaware of the opportunities in these newer fields of work? Perhaps the true answer would be a composite one; and certainly it would vary between individuals. In any case, the reason why college women are not entering the more highly paid fields of work deserves consideration.

Commercial or Business College Training and Earnings. There are two fairly typical attitudes toward secretarial training for women. First there are those who believe that any woman, regardless of educational

TABLE 33—VARIATION IN EARNINGS WITH GENERAL EDUCATION IN DIFFERENT FIELDS OF EMPLOYMENT

Field of Employment ¹	General Education																	
	Grade School			High School			Normal School			College Non-Graduate			College A.B., A.M., Ph.D.			Total Group ³		
	Number of Women	Median Earnings ²	Median Experience (years)	Number of Women	Median Earnings ²	Median Experience (years)	Number of Women	Median Earnings ²	Median Experience (years)	Number of Women	Median Earnings ²	Median Experience (years)	Number of Women	Median Earnings ²	Median Experience (years)	Number of Women	Median Earnings ²	Median Experience (years)
Commerce	751	\$1,403	17.6	2,900	\$1,387	13.0	408	\$1,409	15.3	419	\$1,525	11.8	200	\$1,862	12.1	4,743	\$1,416	13.7
Education	51	1,512	20.0	473	1,437	14.0	787	1,427	14.0	723	1,400	12.4	1,040	1,793	12.7	3,088	1,551	13.3
Manufacture	255	1,615	18.9	1,246	1,493	13.9	142	1,823	16.4	186	1,530	11.6	79	1,980	11.7	1,922	1,536	14.4
Government	108	1,640	17.3	631	1,702	14.7	120	1,838	16.8	197	1,854	13.7	123	1,982	12.9	1,194	1,805	14.8
Professional	102	1,432	14.2	553	1,442	11.5	91	1,600	15.5	173	1,800	12.0	85	2,375	12.6	1,021	1,525	12.5
Semi-public	70	1,780	17.0	375	1,834	14.1	70	1,882	17.5	140	1,906	16.5	169	2,058	12.1	831	1,886	14.6
Transportation	80	1,420	16.7	290	1,415	11.7	34	1,467	13.4	28	1,440	12.8	8	1,700	...	448	1,419	12.8
Primary production	8	....	...	26	1,500	13.3	8	....	...	8	....	...	5	....	...	55	1,733	13.2
Information missing	135	1,511	15.4	378	1,379	13.1	85	1,446	16.2	94	1,464	11.7	45	1,886	13.0	771	1,438	13.8
Total group	1,561	\$1,480	17.5	6,872	\$1,463	13.3	1,745	\$1,506	15.0	1,968	\$1,520	12.5	1,754	\$1,876	12.6	14,073	\$1,526	13.7

¹For explanation of this classification see p. 15.

²Calculated on \$200 class intervals.

³Totals include 173 cases where information was missing.

background or vocational interest, should equip herself with a knowledge of bookkeeping, typing, and stenography. Their argument is plausible enough. Clerical positions are relatively easy to secure, and serve as stepping-stones to executive work. In some organizations, moreover, they are the only positions open to women, except by promotion from within. It is probably for such reasons as these that college placement bureaus frequently advise their women graduates to take business college training if they do not wish to go into educational work.

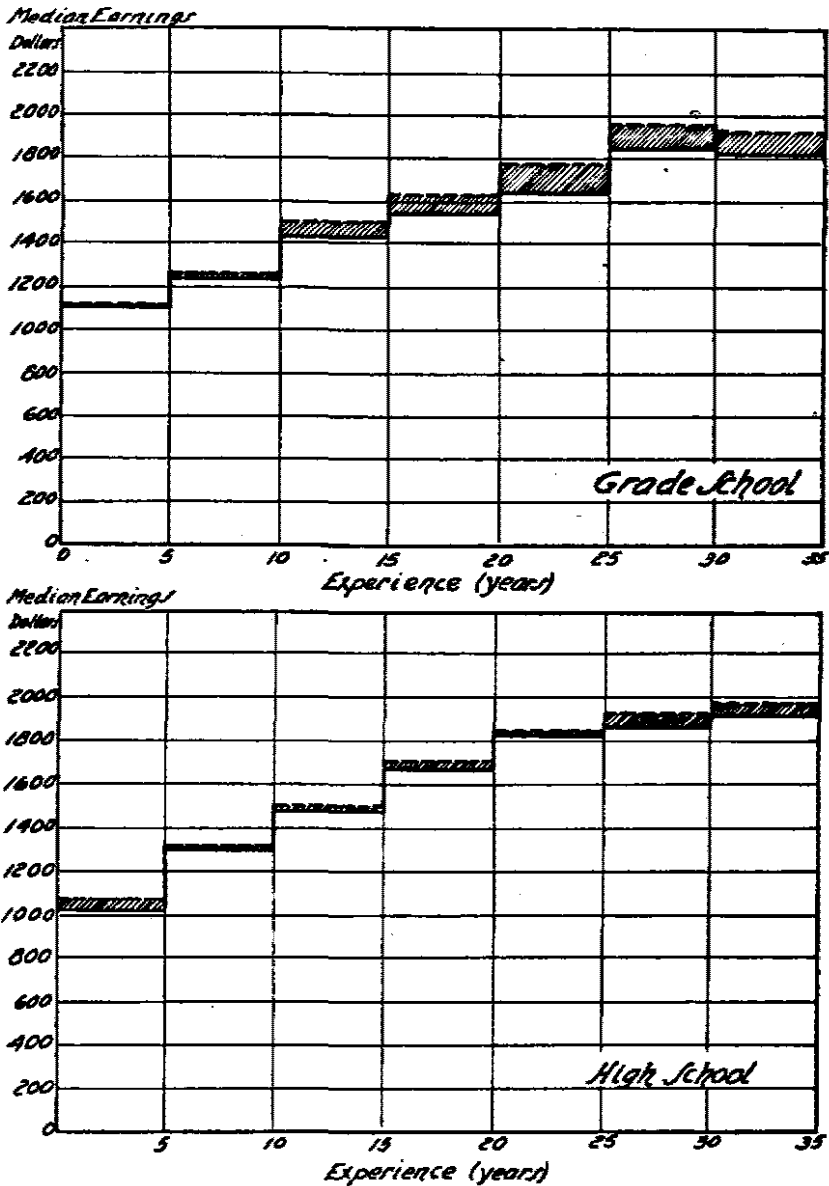
Then there is a dissenting minority of persons who view this wholesale endorsement of business college training for women with some concern. Although they admit it provides an easy way of securing employment in organizations which are reluctant to employ women in other than clerical positions, yet its advantages may end right there. The chances of promotion from clerical or secretarial work to either technical or executive positions in any organization are scant. In all probability, a competent secretary will remain a secretary; and a college woman, whose goal is specialized work in the field of advertising, or sales, or publishing, may well think twice before she accepts a secretarial position as an approach to such work.

Tables 34 and 35, and also Charts 13 and 14, throw some light on this controversy concerning the desirability of business college training.¹ In them, the earnings of 5,871 women at different educational levels who have had business or commercial college training are compared with the earnings of the total group.² If earnings may be taken as a measure of benefit, then women with grade school education have profited most from their commercial school training, although even here the advantage is slight. Their median earnings are \$84 above those of all grade school women. At the other extreme are the 296 college graduates with business college training, whose median earnings are \$56 below those of the total group of college graduates. Between these two extremes,

¹The question of the likelihood of advancement from clerical to other kinds of work will be considered in detail in a later monograph based on the complete occupational histories contained in the questionnaires.

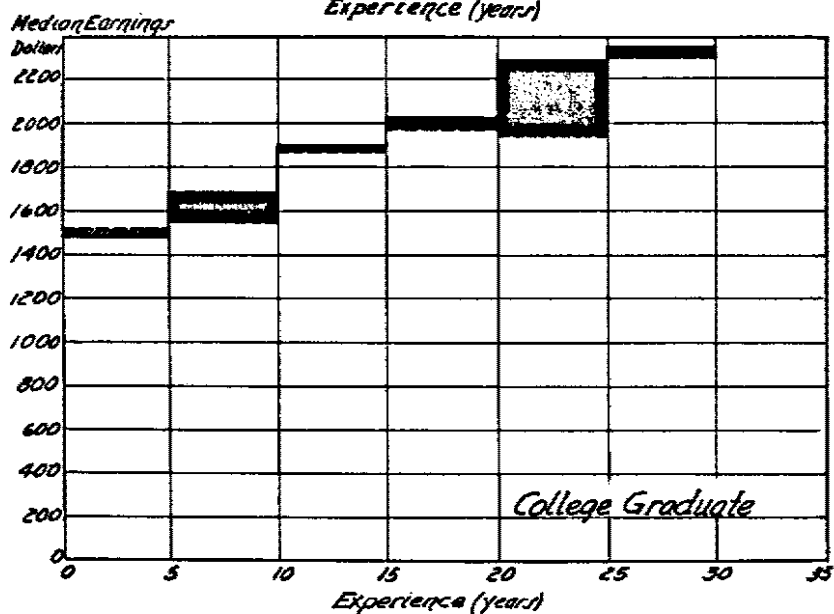
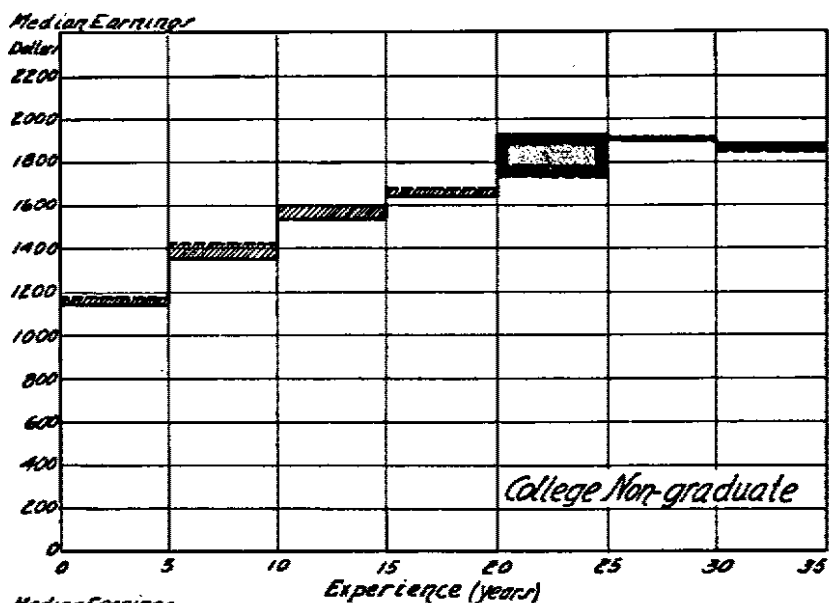
²The figures for the total group include, of course, the 5,871 women with business college training. For this reason differences in earnings will be less than they would have been if the comparison were between the 5,871 women with commercial college training and the 8,202 who have not had it.

CHART 13—EARNINGS OF GRADE SCHOOL AND HIGH SCHOOL WOMEN WITH BUSINESS COLLEGE TRAINING COMPARED WITH EARNINGS OF ALL GRADE SCHOOL AND HIGH SCHOOL WOMEN IN REPORTING GROUP BY YEARS OF EXPERIENCE¹



¹Oblique shading indicates the amount by which median earnings of women with business college training exceed those of the total group. Solid black shading indicates the amount by which the median earnings of the total group exceed those of women who have had business college training. See Table 34.

CHART 14—EARNINGS OF COLLEGE NON-GRADUATES AND COLLEGE GRADUATES WITH BUSINESS COLLEGE TRAINING COMPARED WITH EARNINGS OF ALL COLLEGE NON-GRADUATES AND COLLEGE GRADUATES IN REPORTING GROUP BY YEARS OF EXPERIENCE¹



¹Oblique shading indicates the amount by which median earnings of women with business college training exceed those of total group. Solid black shading indicates the amount by which the median earnings of the total group exceed those of women who have had business college training. See Table 34.

TABLE 34—COMPARISON OF EARNINGS OF WOMEN WITH BUSINESS COLLEGE TRAINING
WITH EARNINGS OF TOTAL GROUP BY YEARS OF EXPERIENCE

Experience (years)	General Education											
	Grade School				High School				Normal School			
	With Business College Training		Total Group		With Business College Training		Total Group		With Business College Training		Total Group	
	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹
Less than 5	36	\$1,117	69	\$1,112	396	\$1,093	830	\$1,020	34	\$ 933	142	\$1,030
5-9.9	124	1,265	224	1,242	811	1,326	1,515	1,313	98	1,327	325	1,270
10-14.9	122	1,505	250	1,430	650	1,519	1,220	1,494	131	1,513	349	1,518
15-19.9	132	1,640	244	1,549	582	1,707	973	1,678	104	1,683	290	1,672
20-24.9	130	1,792	232	1,656	476	1,826	790	1,813	74	1,614	201	1,688
25-29.9	81	1,982	146	1,847	293	1,929	497	1,889	53	2,018	157	1,877
30 and over	57	1,950	162	1,806	210	1,982	460	1,903	49	1,788	166	1,796
Information missing	65	1,067	234	1,358	191	1,570	587	1,391	30	1,543	115	1,540
Total group	747	\$1,564	1,561	\$1,480	3,609	\$1,503	6,872	\$1,463	573	\$1,537	1,745	\$1,506

¹Calculated on \$200 class intervals.

TABLE 34—(Continued)

Experience (years)	General Education											
	College Non-Graduate				College A.B., A.M., Ph.D.				Total Group ^a			
	With Business College Training		Total Group		With Business College Training		Total Group		With Business College Training		Total Group	
	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹
Less than 5	68	\$1,188	253	\$1,150	35	\$1,508	255	\$1,477	569	\$1,122	1,559	\$1,133
5-9.9	169	1,421	487	1,364	68	1,553	390	1,689	1,270	1,343	2,961	1,350
10-14.9	129	1,600	366	1,541	82	1,880	387	1,916	1,114	1,541	2,585	1,553
15-19.9	106	1,688	290	1,638	44	1,983	271	2,034	968	1,713	2,085	1,726
20-24.9	43	1,733	200	1,930	33	1,940	179	2,286	756	1,808	1,618	1,843
25-29.9	74	1,915	126	1,912	18	2,312	112	2,353	519	1,948	1,045	1,920
30 and over	29	1,862	121	1,900	9	....	94	2,400	354	1,940	1,021	1,904
Information missing	28	1,820	125	1,555	7	....	66	1,800	321	1,562	1,199	1,435
Total group	646	\$1,553	1,968	\$1,530	296	\$1,820	1,754	\$1,876	5,871	\$1,531	14,073	\$1,526

¹Calculated on \$200 class intervals.^aTotals include 173 cases where information was missing.

EARNINGS OF WOMEN

TABLE 35—EARNINGS OF WOMEN WITH BUSINESS COLLEGE TRAINING COMPARED WITH EARNINGS OF TOTAL GROUP BY SIZE OF COMMUNITY

Population	General Education											
	Grade School				High School				Normal School			
	With Business College Training		Total Group		With Business College Training		Total Group		With Business College Training		Total Group	
	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹
Less than 2,500	43	\$1,300	113	\$1,189	194	\$1,320	469	\$1,241	35	\$1,300	175	\$1,116
2,500-4,999	63	1,330	188	1,145	407	1,315	932	1,248	64	1,294	233	1,304
5,000-9,999	103	1,300	245	1,262	659	1,343	1,322	1,309	102	1,400	310	1,385
10,000-24,999	164	1,481	319	1,450	841	1,438	1,517	1,411	135	1,504	377	1,433
25,000-49,999	97	1,529	204	1,515	513	1,652	935	1,615	79	1,608	252	1,738
50,000-99,999	102	1,818	182	1,633	411	1,766	736	1,750	68	1,738	179	1,795
100,000-249,999	79	1,836	168	1,865	328	1,874	559	1,867	45	1,920	120	2,032
250,000 and over	96	2,125	142	2,008	256	1,968	402	2,038	45	2,000	99	2,094
Total group	747	\$1,564	1,561	\$1,480	3,609	\$1,503	6,872	\$1,463	573	\$1,537	1,745	\$1,506

¹Calculated on \$200 class intervals.

TABLE 35—(Continued)

Population	General Education											
	College Non-Graduate				College A.B., A.M., Ph.D.				Total Group ²			
	With Business College Training		Total Group		With Business College Training		Total Group		With Business College Training		Total Group	
	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹
Less than 2,500	38	\$1,317	150	\$1,227	17	\$1,500	141	\$1,483	327	\$1,227	1,060	\$1,252
2,500-4,999	66	1,383	257	1,272	35	1,612	224	1,581	635	1,336	1,852	1,295
5,000-9,999	96	1,331	313	1,311	38	1,600	259	1,640	998	1,350	2,483	1,345
10,000-24,999	182	1,522	525	1,503	73	1,662	444	1,808	1,395	1,473	3,219	1,485
25,000-49,999	85	1,750	296	1,836	49	1,636	259	2,131	823	1,660	1,969	1,748
50,000-99,999	75	1,757	166	1,828	25	1,980	173	2,107	681	1,787	1,452	1,824
100,000-249,999	60	1,957	146	2,022	24	1,914	111	2,224	536	1,882	1,117	1,924
250,000 and over	44	1,962	115	2,250	35	2,444	143	2,631	476	2,032	921	2,148
Total group	646	\$1,553	1,968	\$1,529	296	\$1,820	1,754	\$1,875	5,871	\$1,531	14,073	\$1,526

¹Calculated on \$200 class intervals.²Totals include 173 cases where information was missing.

EARNINGS OF WOMEN

the difference in median earnings in favor of the woman with business college training decreases steadily from \$40 for women with a high school education to \$23 for the women who attended college but did not graduate.

The value of business college training varies not only with the amount of previous education, but also with the number of years of work experience (Table 34). Take for instance the 747 women who attended grade school and then business college. For the first five years of work, their median earnings are almost identical with those of the total group of 1,561 grade school women. From then on, however, their earnings advantage increases steadily with experience until those who have worked anywhere from twenty to twenty-five years have an earnings median \$136 above that of the total grade school group with the same amount of experience. From then on the earnings differential of the grade school woman with business college training remains fairly constant.

The 3,609 women who took commercial college training after attending high school have an earnings median only \$40 above that of the high school group. Thus their earnings advantage is less than the grade school woman with commercial college training. This may be in part because the median of the total high school group is raised by including women who took commercial and secretarial courses in high school. But in any case, the women who supplemented their high school training with a business college course start with a \$73 advantage in median earnings in the first five years of work which they fail to maintain with added experience (Table 34). Similarly, up to twenty years of work experience, the women who after one to three years of college work took commercial college training have a slight earnings advantage over all those who attended college but did not graduate.

Of the 1,754 college graduates included in the study, 296 have had business college training. If the experience of these 296 women is typical, then secretarial training is a doubtful asset for the college woman. For although the women who have commercial school training have a slight earnings advantage over the total college group during the first five years of work, they soon lose it, and apparently do not regain it with further experience. Admittedly, the number of cases is too

small for conclusive proof. Yet the consistency with which earnings vary with experience at each educational level as well as between educational groups suggests that more cases of women college graduates with business college training would further substantiate the general conclusion that commercial value of business college training decreases as general education increases.

The value of such training apparently varies also with the size of the community where one is to work. In communities of less than five thousand inhabitants, where the number and range of occupations is limited, women who have had commercial college training seem to have an earnings advantage (Table 35). For the woman with grade school education, this advantage is, with minor exceptions, maintained in large cities. But at the high school level, the earnings advantage of those women who have had business college training decreases steadily from \$79 in communities of less than twenty-five hundred inhabitants until in cities of over a quarter of a million they earn \$70 less than the total high school group.

In smaller communities the normal school and college women, both non-graduates and graduates, who are equipped with secretarial training earn more than the total group at each of these educational levels; but they are at a considerable disadvantage, measured in earnings, in larger cities. Forty-three per cent of the women included in the normal school, college non-graduate, and college graduate groups are engaged in teaching. This suggests that teaching salaries in small communities are generally low in comparison to salaries in clerical work, but that in city school systems they are well above them.

Conclusions as to the commercial value of business college training for women cannot be drawn from this analysis. Yet it rather definitely indicates that the advantage of such training varies inversely, first, with the amount of previous education, and second, with the size of the community in which the job is carried on.

OCCUPATIONAL STABILITY AND EARNINGS¹

Women's low earnings are often explained in part by occupational instability. Not only are women "birds of passage," in the sense that they work only between school years and marriage, but—so the argument runs—they quit their jobs on slight provocation² because, being free from the responsibilities of a home and family, they can take the chances involved in changing positions, which a man cannot afford to take.

It can hardly be said that the women included in this study are transient workers, since their median age, as previously stated, is 37.7 years and their median years of work experience 13.7. But is it true that they shift jobs frequently? If so, is this to their advantage or disadvantage?

There are three measures of occupational stability which can be applied here—first, the number of different types of work in which each woman has been engaged; second, the number of positions which each has held; and third, the number of years which each one has been working for her present employer. The first of these measures of stability—the number of types of work engaged in—is at best a rough one. In some cases the change of work is no more than a normal promotional sequence, which in no way represents instability. In others, as for example shifting from teaching to clerical work—a more frequent change than one might expect—it represents a radical readjustment. Then, too, the occupations included in a group like sales or welfare work are so diverse that one might have an extraordinarily varied occupational history which nevertheless fell quite within the limits of a single group, and so have no recorded change in type of work.²

Yet, admitting its limitations, if we apply this test of occupational stability, it seems to reveal relatively little tendency to shift between occupational groups. Seventy-seven per cent of the women who have

¹The analysis in this section of the study is far from being exhaustive. A later bulletin, now in preparation, which is to be devoted entirely to a study of the occupational histories of the group, will contain additional data on occupational stability.

²For the range of occupations included in each type of work see Appendix III, Table 2, p. 133 ff.

had less than five years' experience are still in the kind of work in which they began, while only 4 per cent have changed more than twice. Moreover, 43 per cent of the women who have had thirty or more years' experience are still in the type of work in which they began, and 37 per cent have made but one change (Table 36).

TABLE 36—PERCENTAGE DISTRIBUTION OF REPORTING GROUP BY NUMBER OF TYPES OF WORK¹ ENGAGED IN AND BY YEARS OF EXPERIENCE

Experience (years)	Number of Types of Work				Total Group
	One	Two	Three	Four or More	
Less than 5	77%	19%	3%	1%	100%
5-9.9	63	29	7	1	100
10-14.9	51	34	12	3	100
15-19.9	48	35	12	5	100
20-24.9	46	35	15	4	100
25-29.9	44	34	17	5	100
30 and over	43	37	14	6	100
Total group	55%	32%	10%	3%	100%

¹See classification on p. 16. It will be recalled that occupations were classified by "types of work," on the basis of the kind of work performed, such as clerical work, teaching, etc. A stenographer who becomes a secretary changes her occupation, but not her type of work, whereas a grade school teacher who becomes a stenographer changes both her occupation and the type of work she is engaged in.

Our second measure of stability is the number of different jobs which each woman has held. In applying this test, it must be remembered that normal promotions are not differentiated from other shifts in occupation. In view of this fact, the proportion of women at each experience level who have changed jobs is surprisingly small. Even in the case of women with thirty or more years of experience, only about one in four has had four or more different jobs. Nine per cent have held the same position for thirty years or more (Table 37).

The third test for occupational stability is the number of years spent in the service of the present employer. Measured by this standard, the group still gives no indication of instability. Thirty-nine per cent of the women who have worked less than five years have been with

TABLE 37—PERCENTAGE DISTRIBUTION OF REPORTING GROUP BY NUMBER OF CHANGES IN OCCUPATION¹ AND BY YEARS OF EXPERIENCE

Experience (years)	Number of Changes in Occupation						Total Group
	None	One	Two	Three	Four	Five or More	
Less than 5	52%	32%	10%	4%	1%	1%	100%
5-9.9	26	34	22	11	4	3	100
10-14.9	16	27	26	16	9	6	100
15-19.9	12	26	25	17	10	10	100
20-24.9	11	21	25	19	11	13	100
25-29.9	8	22	25	20	11	14	100
30 and over	9	21	24	18	12	16	100
Total group	20%	28%	23%	15%	8%	6%	100%

¹It will be recalled that occupations were classified by "types of work," on the basis of the kind of work performed, such as clerical work, teaching, etc. A stenographer who becomes a secretary changes her occupation, but not her type of work, whereas a grade school teacher who becomes a stenographer changes both her occupation and the type of work she is engaged in. See description of classification on p. 16.

their present employer less than two. This proportion drops rapidly as experience increases, until only 5 per cent of those with thirty or more years' experience have been with their present employer less than two years, while 44 per cent of them have worked for the same company or individual for eighteen years or more.

On the whole, therefore, the group we are studying seems to be exonerated from the charge, which is commonly preferred against women, of shifting more or less heedlessly from job to job. But is it to their advantage or disadvantage? Are those who have held a variety of positions or who have worked for several different employers better or worse off, measured in earnings, than those who have continued in the same work, or in the employ of the same organization or individual?

Apparently it pays to change jobs. Within each five-year experience group in Table 39, the women who have held two or more positions have consistently higher median earnings than those who have continued in their first position. Nor can it be argued that these differences in earnings are entirely due to a concentration of the more experienced women within each five-year experience interval in the groups which

TABLE 38—PERCENTAGE DISTRIBUTION OF REPORTING GROUP BY YEARS OF SERVICE TO PRESENT EMPLOYER AND BY YEARS OF EXPERIENCE

Experience (years)	Number of Years with Present Employer										Total Group
	Less than 2	2-3.9	4-5.9	6-7.9	8-9.9	10-11.9	12-13.9	14-15.9	16-17.9	18 and over	
Less than 5	39%	47%	24%	....	....	....	....	....	....	....	100%
5-9.9	18	27	24	19%	12%	....	....	....	....	....	100
10-14.9	14	20	20	15	11	13%	5%	2%	....	....	100
15-19.9	10	15	15	16	12	8	5	8	6%	5%	100
20-24.9	8	14	12	12	10	8	5	7	4	20	100
25-29.9	7	10	10	9	12	6	5	6	5	30	100
30 and over	5	9	8	8	8	5	4	4	5	44	100
Total group	15%	22%	17%	12%	10%	6%	3%	4%	2%	9%	100%

have made more job shifts. Else why is it that in each experience group in Table 39 the one-job women have consistently lower median earnings than the women in the next lower experience group who have held six or more different positions?¹

¹A comparison of Tables 39 and 40 shows even more conclusively that the increase in median earnings with number of jobs held, which is apparent in each five-year experience group in Table 39, is not entirely due to a concentration of the more experienced and so more highly paid women in the groups which have made more job shifts. That is, the 811 women with less than five years' experience who have had only one occupation may, and probably do, have a lower experience median than the 58 women, also with less than five years' experience, who have had four different jobs. Yet even admitting this, only part of the differences in earnings within each experience group in Table 39 can be accounted for by added experience. Especially is this true for those women who have had ten or more years' experience. Suppose, for instance, that in Table 39 all 410 women with ten to fifteen years' experience who have during that time had only one position are among the 595 cases in Table 40 who have had ten to eleven years' experience. This concentration is of course highly improbable; yet even if it were true, the median earnings for these 595 women are \$1,538 as compared to \$1,440 for the 410 cases who have had only one occupation during their ten to fifteen years of work. Thus the 185 remaining women in the group of 595, who must have held more than one job, must also have considerably higher median earnings than the 410 who had only one job in order to bring the earnings median for the total group up to \$1,538.

Similar analysis of the more experienced groups in Table 39 gives the same general results, showing that the single-job group in each five-year experience interval has lower median earnings than even the least experienced group in Table

TABLE 39—VARIATION IN EARNINGS WITH YEARS OF EXPERIENCE AND NUMBER OF CHANGES IN OCCUPATION

Number of Occupations	Experience (years)									
	Less than 5		5-9.9		10-14.9		15-19.9		20-24.9	
	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹
One	811	\$1,114	760	\$1,294	410	\$1,440	248	\$1,488	184	\$1,611
Two	496	1,139	1,016	1,328	698	1,500	535	1,645	347	1,775
Three	154	1,129	651	1,362	665	1,571	523	1,808	405	1,836
Four	58	1,218	332	1,520	427	1,663	368	1,769	296	1,847
Five	17	1,233	123	1,461	232	1,589	204	1,732	181	1,910
Six	11	1,500	42	1,511	83	1,918	108	1,953	105	1,979
Seven	1	....	18	1,425	34	1,800	41	1,933	54	2,308
Eight	1	....	4	....	13	1,700	21	1,950	11	1,900
Nine	1	....	....	....	3	....	8	....	7	....
Ten or more	....	....	1	....	1	....	5	....	6	....
Information missing	9	1,700	14	1,500	19	1,467	24	1,773	22	1,867
Total group	1,559	\$1,133	2,961	\$1,350	2,585	\$1,553	2,085	\$1,725	1,618	\$1,843

¹Calculated on \$200 class intervals.

TABLE 39—(Continued)

Number of Occupations	Experience (years)							
	25-29.9		30 and Over		Information Missing		Total Group	
	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹	Number of Women	Median Earnings ¹
One	88	\$1,771	98	\$1,558	197	....	2,796	\$1,292
Two	230	1,890	218	1,876	174	....	3,714	1,501
Three	259	1,831	250	1,933	148	....	3,055	1,588
Four	211	1,997	184	1,912	74	....	1,950	1,718
Five	116	1,950	125	1,979	38	....	1,036	1,780
Six	60	2,179	73	1,911	16	....	498	1,883
Seven	27	2,250	22	2,150	8	....	205	2,050
Eight	17	2,500	14	2,150	4	....	85	1,888
Nine	8	....	6	....	1	....	34	1,900
Ten or more	8	....	3	....	1	....	25	2,150
Information missing	21	1,900	28	1,733	538	....	675	1,570
Total group	1,045	\$1,920	1,021	\$1,904	1,199	\$1,435	14,073	\$1,525

¹Calculated on \$200 class intervals.

EARNINGS OF WOMEN

TABLE 40—VARIATION IN EARNINGS WITH YEARS OF EXPERIENCE

Experience (years)	Number of Women	Median Earnings ¹	Experience (years)	*Number of Women	Median Earnings ¹
Less than 1	10	....	25-25.9	277	\$1,864
1-1.9	191	\$ 965	26-26.9	247	1,840
2-2.9	379	1,062	27-27.9	216	1,877
3-3.9	434	1,079	28-28.9	161	1,967
4-4.9	545	1,230	29-29.9	144	1,886
5-5.9	524	1,258	30-30.9	148	1,896
6-6.9	490	1,290	31-31.9	115	1,829
7-7.9	579	1,323	32-32.9	119	1,950
8-8.9	660	1,374	33-33.9	123	1,843
9-9.9	708	1,511	34-34.9	85	1,850
10-10.9	595	1,538	35-35.9	85	1,892
11-11.9	504	1,545	36-36.9	46	1,883
12-12.9	531	1,554	37-37.9	67	1,767
13-13.9	497	1,582	38-38.9	58	1,850
14-14.9	458	1,632	39-39.9	40	2,250
15-15.9	511	1,627	40-40.9	27	1,875
16-16.9	377	1,665	41-41.9	22	1,825
17-17.9	419	1,823	42-42.9	19	1,750
18-18.9	389	1,740	43-43.9	14	2,050
19-19.9	389	1,704	44-44.9	21	1,575
20-20.9	392	1,711	45-45.9	32	1,950
21-21.9	344	1,849			
22-22.9	330	1,869			
23-23.9	290	1,835			
24-24.9	262	1,835			
			Total group	14,073	\$1,548

¹Calculated on \$100 class intervals.

Selective factors may, of course, account for the change in occupation in the one case, and failure to shift in the other. In the single-job group there may be a preponderance of less able and aggressive women who have not deserved promotions, or have made no effort to shift to more interesting or better-paid positions. Whatever the reason, the women who have continued in their first occupation are at an earnings disadvantage which cannot be accounted for by lack of experience.

40 which falls within that five-year interval. It is therefore apparent that the earnings advantage of the women who have shifted jobs over those in the same five-year experience group who have had only one occupation is not wholly attributable to added experience.

Women who have changed their occupations seem to have profited by it. But have they gained or lost by continued service to one employer, whether a firm or an individual? Is it better, judging from the experience of the present group, to "grow up" in an organization, or to change from one employer to another, thereby gaining more varied experience? The question is an important one, especially as it involves the much-debated problem of the older woman confronted with the necessity of finding new work. There is, however, no clear and simple answer. From the evidence contained in Table 41, it looks as if women who change employers during the first ten years of work have profited temporarily by the shift; but that in the long run it is better to work up in the service of one organization or individual. In any case, the older woman who shifts employers faces the prospect of a substantial decrease in earnings.

The supporting evidence for this statement is found in a comparison of Tables 40 and 41. The immediate gain from shifting employers during the first ten working years is seen in the fact that the 213 women who have worked from four to five years, and always for the same employer, have an earnings median of \$1,158 (Table 41) as against \$1,230 for all 545 women with the same amount of experience, of whom 213 have had but one employer, and 332 have had two or more (Table 40). The latter group therefore must have higher median earnings than the 213 with only one employer, in order to bring the median for the total group of 545 up to \$1,230.¹

In the long run, however, women who have remained longest with their present employers seem to have a clear advantage in earnings.²

¹A similar analysis of the five to ten year experience group also shows that the women who have worked for more than one employer have higher median earnings than those who have served only one. Within this experience group, the 342 women who have been from eight to ten years with their present employer have median earnings of \$1,387, while the 1,368 women in Table 40 with eight to ten years' experience, of whom 1,026 must have had at least two different employers, have an earnings median approximately midway between \$1,374 and \$1,511. Thus the 1,026 women who, with the same experience, have had two or more employers, must have higher median earnings than the 342 having only one, in order to give a total group median about midway between \$1,374 and \$1,511.

²It may be argued here, as before, that selective factors are important in determining this earnings advantage. The more able women have been retained

TABLE 41—VARIATION IN EARNINGS WITH YEARS OF EXPERIENCE AND YEARS OF SERVICE TO PRESENT EMPLOYER

Number of Years with Present Employer	Experience (years)									
	Less than 5		5-9.9		10-14.9		15-19.9		20-24.9	
	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹
Less than 2	607	\$1,093	539	\$1,327	347	\$1,498	200	\$1,552	126	\$1,590
2-3.9	718	1,153	791	1,374	504	1,564	303	1,662	218	1,788
4-5.9	213	1,158	704	1,336	506	1,563	305	1,706	193	1,855
6-7.9	...	....	540	1,341	379	1,581	312	1,738	187	1,837
8-9.9	...	....	342	1,387	276	1,603	254	1,774	166	1,763
10-11.9	...	....	....	....	323	1,527	169	1,846	126	1,875
12-13.9	...	....	....	....	144	1,410	107	1,794	75	1,862
14-15.9	...	....	....	....	58	1,775	170	1,727	102	1,873
16-17.9	...	....	....	....	....	....	129	1,863	65	1,964
18 and over	...	....	....	....	....	....	104	1,722	320	1,947
Information missing	21	1,500	45	1,238	48	1,357	32	1,850	40	1,514
Total group	1,559	\$1,133	2,961	\$1,350	2,585	\$1,553	2,085	\$1,726	1,618	\$1,843

¹Calculated on \$200 class intervals.

TABLE 41—(Continued)

Number of Years with Present Employer	Experience (years)							
	25-29.9		30 and Over		Information Missing		Total Group	
	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹	Number of Women	Median Earn- ings ¹
Less than 2	75	\$1,640	50	\$1,562	32	....	1,976	\$1,340
2-3.0	99	1,771	91	1,887	37	....	2,761	1,423
4-5.9	105	1,846	80	1,900	43	....	2,149	1,479
6-7.9	87	1,910	76	1,833	32	....	1,613	1,545
8-9.9	118	1,947	74	1,900	21	....	1,251	1,637
10-11.9	60	1,857	50	1,800	28	....	756	1,715
12-13.9	47	2,042	40	1,940	7	....	420	1,752
14-15.9	65	2,125	39	2,159	16	....	450	1,877
16-17.9	57	2,191	51	2,000	20	....	322	1,954
18 and over	305	1,941	420	1,972	39	....	1,188	1,937
Information missing	27	1,700	50	1,575	924	....	1,187	1,494
Total group	1,045	\$1,920	1,021	\$1,904	1,199	\$1,435	14,073	\$1,526

¹Calculated on \$200 class intervals.

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For example, the 58 women in Table 41 who have spent all of their fourteen to fifteen working years in the service of one employer have an earnings median of \$1,775 in contrast to \$1,632 for all 458 women (Table 40) who have had the same number of years' experience, but of whom 400 have had more than one employer during that time. These 400 women must have a lower earnings median than the 58 who had only one employer, in order to reduce the median earnings for the total group from \$1,775 to \$1,632. The situation is, therefore, exactly reverse of that existing in the lower experience groups.

The older woman who voluntarily or involuntarily changes to a new employer quite definitely faces the prospect of lower earnings. A rough measure of the penalty which may be hers is obtained by comparing median earnings of women in each of the higher experience groups in Table 41 who have been less than two years with their present employers, with the earnings of women in the next lower experience group who have spent their entire working life in the service of the same firm or individual. For example, women with between twenty-five and thirty years of experience who have changed employers within two years have median earnings of \$1,640 in contrast to \$1,947 for women in the next lower experience group—twenty to twenty-five years—who have worked eighteen years or more for their present employer. A similar penalty is apparent in all the experience groups above fifteen years.

Two conclusions may be drawn with reasonable certainty from this analysis. First, the charge of occupational instability, which is often preferred against women in partial explanation of their low earnings, does not apply to the group included in this study. Second, the dilemma of the middle-aged woman confronted with the necessity of changing employers is no myth, if the experience of this group of women may be taken as representative. In the long run, women are probably better off in the continued service of the same employer; but if shifting is to be done at all, it may best be done during the first ten or perhaps fifteen years of work.

and promoted by the same employer, while the less efficient have either been dismissed or have left voluntarily when they failed to advance either in rank or pay.

Part III

SOME EFFECTS OF EARNINGS ON SOCIO-ECONOMIC STATUS

SUPPLEMENTARY INCOME AND EARNINGS

Earnings, as previously defined, have referred here to income from a woman's chief occupation, whether in the form of salary or net business earnings. Earned or unearned income from any source other than the chief occupation has so far not been included in the earnings data. Yet clearly the sources and amount of supplementary income are important in a complete analysis of the economic status of the group. Three different sources of income other than earnings in a woman's chief occupation have been considered here, income from "special or evening work," from inheritance or gifts, and from invested savings.¹

Eleven per cent of the total group report some earned income in addition to their earnings in their chief occupation. For this number, median supplementary earnings are \$202 for 1927. Only 15.7 per cent state definitely that they have none, though probably most of those who left blank the space in the questionnaire designated for this information should be included with those who report "none." The proportion reporting supplementary earned income varies but little with earnings in the main occupation. It ranges between 11 and 16 per cent of each earnings group (Table 42).

Invested savings are a more common but less fruitful source of income than "special or evening work." Thirty-six per cent of the group, or more than three times as many women as report supplementary earnings, indicate that they have some income from savings. Yet

¹See copy of questionnaire, p. 204 ff. The data for each of these income sources have been analyzed separately. Unfortunately, the size of the Hollerith card imposed such severe limitations on the amount of information that could be transferred to it that figures for total income, earned and unearned, had to be omitted. Nor do we know how many of the group have supplementary incomes from all three sources, how many from two, or from only one. On the whole, however, independent analyses of these different sources of income seem to have been justified.

TABLE 42—VARIATION IN SUPPLEMENTARY EARNED INCOME WITH EARNINGS IN CHIEF OCCUPATION

Earnings ¹ (dollars)	Reporting Extra Earned Income		Reporting No Extra Earned Income		Information Missing		Total Group		Median Extra Earnings	Ratio Extra Earned Income to Earnings
	Number of Women	Per Cent of Total Group	Number of Women	Per Cent of Total Group	Number of Women	Per Cent of Total Group	Number of Women	Per Cent of Total Group		
Less than 600	33	14.5	28	12.3	167	73.2	228	100.0	\$167	0.33
600-799	74	12.1	59	9.7	477	78.2	610	100.0	155	0.22
800-999	114	11.5	133	13.4	747	75.1	994	100.0	148	0.16
1,000-1,199	162	12.5	169	13.1	964	74.4	1,295	100.0	197	0.18
1,200-1,399	242	10.8	336	15.0	1,652	74.2	2,240	100.0	175	0.13
1,400-1,599	222	11.4	324	16.6	1,409	72.0	1,955	100.0	180	0.12
1,600-1,799	114	11.3	176	17.5	716	71.2	1,006	100.0	183	0.11
1,800-1,999	197	12.8	287	18.6	1,061	68.6	1,545	100.0	216	0.11
2,000-2,199	120	11.2	236	22.0	716	66.8	1,072	100.0	215	0.10
2,200-2,399	37	10.8	58	16.9	248	72.3	343	100.0	275	0.12
2,400-2,599	77	12.2	100	15.8	455	72.0	632	100.0	282	0.11
2,600-2,799	37	13.1	57	20.2	188	66.7	282	100.0	310	0.11
2,800-2,999	17	16.0	14	13.2	75	70.8	106	100.0	410	0.14
3,000 and over	101	11.4	158	17.8	628	70.8	887	100.0	581	0.15
Information missing	21	2.4	78	8.9	779	88.7	878	100.0	350	...
Total group	1,568	11.1	2,213	15.7	10,292	73.2	14,073	100.0	\$202	0.13

¹Earnings, as already defined, refer to income from chief occupation. See p. 13.

the median sum from this source is \$156 as against \$202 from extra work. Assuming a 5 per cent return on the sum invested, the average income-bearing savings of these 5,068 women is approximately \$3,000. These figures do not include savings in the form of life insurance and annuities not yet matured, which are probably common forms of saving for this group. Even so, \$3,000 is a small figure for average savings, exclusive of insurance, when one reflects that these 5,068 women doubtless include the more mature members of a group 50 per cent of whom are over 37.7 years of age.

Median income from savings and also the proportion of women reporting income from savings vary directly with earnings in the chief occupation. This is to be expected, not only because of the larger annual earnings from which savings might be set aside, but also because the women at the higher earnings levels are more experienced, and so have had a longer time in which to accumulate savings. The proportion of women indicating that they receive income from this source varies from 12 per cent of the group earning less than \$600 in their chief occupation to more than half of all those earning \$3,000 and over (Table 43).

The median income from gifts or inheritance for 1,425 women reporting income from this source is \$203, a figure almost identical with median supplementary earnings. Only 2,193 women state definitely that they receive no income of this sort, though again it is probably safe to assume that most of the 74 per cent who left blank the space for this information in the questionnaire should be included with those who report "none." Like supplementary earnings and savings, income from gifts or inheritance tends to increase with earnings from the chief occupation. Furthermore, the proportion reporting income from this source increases fairly consistently with earnings. This is perhaps in part because a larger proportion of women with higher earnings belong to well-to-do families. It may be, too, that higher earnings simply indicate a more mature group of workers, more of whom have presumably inherited money from relatives than is the case among younger women.

From this analysis of supplementary income, it is apparent that the great majority of the group studied have no important source of

TABLE 43—VARIATION IN INCOME FROM SAVINGS WITH EARNINGS IN CHIEF OCCUPATION

Earnings ¹ (dollars)	Reporting Income from Savings		Reporting No Income from Savings		Information Missing		Total Group		Median Income from Savings	Ratio Income from Savings to Earnings
	Number of Women	Per Cent of Total Group	Number of Women	Per Cent of Total Group	Number of Women	Per Cent of Total Group	Number of Women	Per Cent of Total Group		
Less than 600	28	12.3	18	7.9	182	79.8	228	100.0	\$82	0.16
600-799	101	16.6	43	7.0	466	76.4	610	100.0	81	0.12
800-999	222	22.3	89	9.0	683	68.7	994	100.0	91	0.10
1,000-1,199	353	27.3	93	7.2	849	65.5	1,295	100.0	94	0.09
1,200-1,399	731	32.6	166	7.4	1,343	60.0	2,240	100.0	105	0.08
1,400-1,599	713	36.5	164	8.4	1,078	55.1	1,955	100.0	126	0.08
1,600-1,799	439	43.6	63	6.3	504	50.1	1,006	100.0	138	0.08
1,800-1,999	690	44.7	90	5.8	765	49.5	1,545	100.0	161	0.08
2,000-2,199	498	46.5	76	7.0	498	46.5	1,072	100.0	180	0.09
2,200-2,399	184	53.6	20	5.8	139	40.6	343	100.0	209	0.09
2,400-2,599	319	50.5	33	5.2	280	44.3	632	100.0	231	0.09
2,600-2,799	148	52.5	12	4.3	122	43.2	282	100.0	182	0.07
2,800-2,999	65	61.3	2	1.9	39	36.8	106	100.0	272	0.09
3,000 and over	460	51.9	28	3.1	399	45.0	887	100.0	385	0.11
Information missing	117	13.3	38	4.3	723	82.4	878	100.0	176	...
Total group	5,068	36.0	935	6.6	8,070	57.4	14,073	100.0	\$156	0.10

¹Earnings, as already defined, refer to income from chief occupation. See p. 13.

TABLE 44—VARIATION IN INCOME FROM INHERITANCE OR GIFTS WITH EARNINGS IN CHIEF OCCUPATION

Earnings ¹ (dollars)	Reporting Income from Inheritance or Gifts		Reporting No Income from Inheritance or Gifts		Information Missing		Total Group		Median Income from Inheritance or Gifts	Ratio of Income from Inheritance or Gifts to Earnings
	Number of Women	Per Cent of Total Group	Number of Women	Per Cent of Total Group	Number of Women	Per Cent of Total Group	Number of Women	Per Cent of Total Group		
Less than 600	17	7.5	27	11.8	184	80.7	228	100.0	\$117	0.23
600-799	55	9.0	61	10.0	494	81.0	610	100.0	179	0.26
800-999	83	8.3	131	13.2	780	78.5	994	100.0	138	0.15
1,000-1,199	113	8.7	168	13.0	1,014	78.3	1,295	100.0	192	0.17
1,200-1,399	244	10.9	333	14.9	1,664	74.2	2,240	100.0	196	0.15
1,400-1,599	201	10.3	322	16.5	1,432	73.2	1,955	100.0	197	0.13
1,600-1,799	103	10.2	177	17.6	726	72.2	1,006	100.0	173	0.12
1,800-1,999	172	11.1	273	17.7	1,100	71.2	1,545	100.0	189	0.10
2,000-2,199	124	11.6	230	21.4	718	67.0	1,072	100.0	200	0.10
2,200-2,399	37	10.7	63	18.4	243	70.8	343	100.0	254	0.11
2,400-2,599	82	13.0	100	15.8	450	71.2	632	100.0	292	0.12
2,600-2,799	38	13.5	53	18.8	191	67.7	282	100.0	220	0.08
2,800-2,999	12	11.3	13	12.3	81	76.4	105	100.0	200	0.07
3,000 and over	99	11.2	168	18.9	620	69.9	887	100.0	315	0.09
Information missing	45	5.1	75	8.5	758	86.4	878	100.0	325	...
Total group	1,425	10.1	2,193	15.6	10,455	74.3	14,073	100.0	\$203	0.13

¹Earnings, as already defined, refer to income from chief occupation. See p. 13.

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income other than their main occupation. Approximately one in ten reports some supplementary earnings, for which the median is \$202 a year. A similar proportion of the group receives some income from gifts or inheritance, with \$203 as the median amount in 1927. Slightly more than one in three of the group reports some income from savings, although the median sum from this source is only \$156. The amount of income from each of these sources varies directly with earnings in the main occupation. Clearly, supplementary incomes do not tend to equate total incomes, but rather to increase the inequalities already existing between earnings in chief occupations.

MODE OF LIVING AND EARNINGS

Not infrequently in the past, women who work have been referred to as "pin-money workers." This rather unflattering charge rests on the assumption that they are supported by relatives with whom they live, and that whatever they earn themselves goes for the purchase of non-essentials. The charge, however, has been shown to lack factual support in the case of wage-earning women. According to recent studies by the Women's Bureau of the Department of Labor at Washington, the great majority of wage-earning women are working because of economic necessity, and nine-tenths of them contribute part or all of their earnings to the support of the family. In the summary results of twenty-three studies, which cover the period from 1888 to 1923, and include 61,679 women wage-earners, it is shown that 53.2 per cent of these women gave all their earnings to their families, while 37.5 per cent more contributed part of their earnings. Only 9.3 per cent gave nothing toward the support of their families.¹

But these are wage-earning women; it is altogether possible that at higher occupational levels women are not only free from responsibility for the support of others, but are themselves accepting financial assistance in one form or another from relatives. Yet clearly this is not the case in the group we are studying. Not only are the great majority of these women economically independent, but many of them are totally or partially responsible for the support of others. This is apparent from

¹*What the Wage-Earning Woman Contributes to Family Support*, pp. 12 and 13. For further references, see p. 47 and footnote 1 p. 110.

several sets of facts. In the first place, only 10.2 per cent of the total group live with parents or relatives without paying for their board. These are, moreover, the relatively young workers, with median experience five years below that of the total group.¹ The rest of the 13,425 women in the group who report their mode of living either pay board to their parents or relatives, have houses or apartments, or live in lodgings (Table 45).

TABLE 45—VARIATION IN MODE OF LIVING WITH EARNINGS

Mode of Living	Number of Women	Per Cent of Total	Median Earnings ¹	Median Experience (years)
Live with parents or relatives and pay board	4,104	30.6	\$1,487	12.9
Live with parents or relatives and pay no board	1,372	10.2	1,178	8.0
Have a house, meals in	2,498	18.6	1,582	17.0
Have a house, meals out	131	1.0	1,775	16.3
Have a house, some meals in, some meals out	744	5.5	1,681	18.0
Have an apartment, meals in	1,148	8.5	1,743	15.0
Have an apartment, meals out	215	1.6	1,894	16.9
Have an apartment, some meals in, some meals out	717	5.3	1,886	17.9
Have a room, light housekeeping	249	1.9	1,429	13.4
Have a room, meals out or board in the house	2,257	16.8	1,595	12.3
Not elsewhere classified and information missing	638	...	....	...
Total group	14,073	100.0	\$1,548	13.7

¹Calculated on \$100 class intervals.

As further proof of the economic independence of our group, it will be recalled that 39.1 per cent of those indicating number of dependents report that they are either totally responsible for or contribute toward the support of one or more persons (Table 20). It will also be remembered that only one in ten of the total group has any supplementary income from gifts or inheritance, and even for these women the median amount, \$203, is not large. In view of these facts,

¹Doubtless, some of these women pay room rent or contribute toward the maintenance of the home, although the questionnaire did not differentiate this group from those who pay only for meals.

it would seem that the great majority of the group are not only economically independent, but that more than one in three is assisting in the support of others. Such women can hardly be described as "pin-money workers."

Of the total number reporting mode of living, 40.8 per cent are living with parents or relatives, 25.1 per cent have houses, 18.7 per cent live in rented rooms, and 15.4 per cent have apartments (Table 45). If, however, the group is subdivided on the basis of marital status, certain well-defined differences in mode of living appear. Fifty per cent of the single women live either with parents or relatives, and of these, approximately three-fourths pay board. Twenty-two per cent of the single women live in lodgings—that is, they rent rooms and either board in the same house, or go out for meals—while 28.1 per cent maintain, either singly or with others, houses or apartments.¹ Among the 1,888 married women who report their mode of living, the situation is almost reversed. Eighty-three per cent maintain either houses or apartments, while 12.2 per cent live in lodgings or with parents or relatives. Quite definitely, domestic demands are heavier for the married women in the group than for the single women. How far this goes to explain the lower median earnings of the married women is a question to which there is at present no answer.²

¹The corresponding figures for 17,364 women breadwinners, most of whom were doubtless wage-earners, included in a recent study by the Women's Bureau of the Department of Labor are as follows: Living with parents or relatives, 75.3 per cent; living in lodgings, 18.0 per cent; maintaining a home, 6.7 per cent. The differences between the two groups are pronounced. In that study, relatively half again as many women are living with relatives as is the case in our group, while only one-fourth as many maintain homes. About the same proportion in each group are living in lodgings. It should be noted that the percentages for the Women's Bureau study have been recalculated to omit unclassified cases, thus making them comparable to our figures. *What the Wage-Earning Woman Contributes to Family Support*, p. 14.

²Among the interesting facts obtained from the questionnaire, which have to be omitted here because of lack of space on the Hollerith card, are the number of hours a week devoted to housekeeping, and the amount of paid and unpaid assistance in housekeeping. This information will be included in a later study.

LIVING EXPENSES, SAVINGS, AND EARNINGS

Detailed analysis of the personal finances of the group is quite beyond the scope of the present study. Expenditures and savings have not been itemized beyond single totals for savings from earned income and "living expenses," which were defined to include day-to-day expenditures for room, board, domestic service, laundry, and transportation to and from work.¹ The lack of more detailed budgetary information is regrettable. Yet interesting relationships between expenses, savings, and earnings are apparent even from the limited data available.

In all, there are 10,013 women, including single, widowed, divorced, and those separated from their husbands, who report their living expenses. Of this number, 3,977 have one or more persons totally or partially dependent upon them, and 6,036 are without dependents. As might readily be expected, the women with dependents have considerably heavier living expenses than those who have no dependents. Their median monthly expenditure for food, shelter, domestic service, laundry, and transportation to and from work is \$76, as against \$54 for women without dependents. Only 20.1 per cent of the latter spend more than \$75 a month for these items. At the same time, however, the women with dependents have median earnings of \$1,690, as compared with \$1,507 for those without dependents. Part of this earnings advantage is probably attributable to the fact that the women with dependents are an older and so more experienced group.²

¹These definitions should be kept in mind in the analysis that follows. We should perhaps also remind ourselves of certain attributes of the group we are studying. First, it is a sampling of a total group of whom 40.8 per cent are living with parents or relatives. Second, this sampling, like the total group, concentrates characteristically in medium-sized communities (Table 52 and Appendix I, Table 2, p. 123). Third, married women are excluded from this analysis of expenses and savings, although widows, and also women divorced or separated from their husbands, are included. Fourth, all women who report one or more persons totally or partially dependent on them for support are included in the group "with dependents," which means that it includes women with widely varying degrees of responsibility for others.

²The median age of all women with dependents is 39.9 years, while the corresponding figure for women without dependents is 35.5 years.

TABLE 46—VARIATION IN MODE OF LIVING WITH MARITAL STATUS

Mode of Living	Marital Status													
	Single		Married		Widowed		Divorced		Separated		Information Missing		Total Group	
	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total	Number of Women	PerCent of Total
Live with parents or relatives and pay board	3,387	37.0	111	5.9	161	17.2	167	26.8	40	32.5	238	33.1	4,104	30.6
Live with parents or relatives and pay no board	1,177	12.9	36	1.9	40	4.3	45	7.2	6	4.9	68	9.4	1,372	10.2
Have a house, meals in	993	10.8	981	51.9	281	30.1	119	19.1	23	18.7	101	14.0	2,498	18.6
Have a house, meals out	52	0.6	49	2.6	16	1.7	7	1.1	2	1.6	5	0.7	131	1.0
Have a house, some meals in, some meals out	282	3.1	271	14.3	102	10.9	45	7.2	5	4.1	39	5.4	744	5.5
Have an apartment, meals in	675	7.4	215	11.4	102	10.9	81	13.0	15	12.2	60	8.3	1,148	8.5
Have an apartment, meals out	134	1.5	30	1.6	24	2.6	9	1.4	4	3.2	14	2.0	215	1.6
Have an apartment, some meals in, some meals out	435	4.7	113	6.0	72	7.7	53	8.5	8	6.3	36	5.0	717	5.3
Have a room, light housekeeping	171	1.9	26	1.4	23	2.5	8	1.3	5	4.1	16	2.2	249	1.9
Have a room, meals out or board in house	1,840	20.1	56	3.0	113	12.1	90	14.4	15	12.2	143	19.9	2,257	16.8
Not elsewhere classified and information missing	353	...	130	...	65	...	25	...	2	...	63	...	638	...
Total	9,499	100.0	2,018	100.0	999	100.0	649	100.0	125	100.0	720	100.0	14,073	100.0

No less than 728 women, or 7.3 per cent of all those who report their living expenses, claim to spend less than \$25 a month for food, shelter, domestic service, laundry, and transportation—an incredibly low figure unless they are among the 1,372 women who are living with parents or relatives without paying for their board, and perhaps not for their room (Tables 45 and 47). Seventy per cent of the women without dependents who report monthly living expenses are paying from \$25 to \$75 for them. This means that 79.9 per cent of the 6,036 women without dependents are spending less than \$75 a month, or not more than \$18 a week on day-to-day living expenses, exclusive of clothes, and also recreation, health, education, savings, and other items included under "sundries," in standard budgets.

When monthly living expenses are converted into yearly totals by multiplying the monthly figures by twelve, significant relationships between expenses and earnings are apparent (Table 48). Living expenses, as might well be expected, increase with earnings. For women

TABLE 47—LIVING EXPENSES¹

Monthly Living Expenses (dollars)	Women with Dependents ²			Women without Dependents ²		
	Number of Women	Per Cent of Total	Median Earnings	Number of Women	Per Cent of Total	Median Earnings
Less than 25	118	3.0	\$1,212	610	10.1	\$1,071
25-49	641	16.1	1,285	2,071	34.3	1,300
50-74	1,194	30.0	1,551	2,145	35.5	1,624
75-99	821	20.6	1,722	714	11.8	1,986
100-124	611	15.4	1,968	260	4.3	2,158
125-149	244	6.1	2,210	90	1.5	2,475
150-174	158	4.0	2,468	81	1.3	2,800
175-199	50	1.2	3,040	33	0.6	2,417
200-224	66	1.7	2,775	22	0.4	2,600
225 and over	74	1.9	3,600	10	0.2	6,800
Total group ³	3,977	100.0	\$1,690	6,036	100.0	\$1,507

¹"Living Expenses" cover only food, rent, service, laundry, and transportation to and from work. See definition, p. 201.

²Omitting married women, and also those who did not give information concerning dependents and living expenses.

³Median monthly living expenses are \$76 for women with dependents, and \$54 for women without dependents.

TABLE 48—VARIATION IN LIVING EXPENSES¹ WITH EARNINGS

Earnings (dollars)	Women with Dependents ²			Women without Dependents ²		
	Number of Women	Median Yearly Living Expenses	Ratio Living Ex- penses to Earnings	Number of Women	Median Yearly Living Expenses	Ratio Living Ex- penses to Earnings ²
Less than 600	23	\$ 516	1.000	64	\$ 259	0.520
600-799	94	540	0.771	242	354	0.506
800-999	223	599	0.666	446	433	0.481
1,000-1,199	304	685	0.623	612	494	0.449
1,200-1,399	534	788	0.606	1,089	545	0.419
1,400-1,599	610	834	0.556	903	651	0.434
1,600-1,799	329	881	0.518	474	688	0.405
1,800-1,999	502	995	0.524	706	745	0.392
2,000-2,499	673	1,129	0.502	782	826	0.367
2,500-2,999	237	1,285	0.467	261	896	0.326
3,000 and over	342	1,702	0.486	293	1,169	0.334
Total group ³	3,871	\$ 913	0.540	5,872	\$ 647	0.429

¹"Living Expenses" cover only food, rent, service, laundry, and transportation to and from work. See definition, p. 201. Figure for yearly living expenses obtained by multiplying monthly expense figure by 12.

²Omitting married women, and also those who did not give information concerning dependents, living expenses, earnings, or size of community.

³Median earnings for women with dependents are \$1,690, and \$1,507 for those without dependents.

with dependents, median yearly expenditures for items included in "living expenses" increase from \$516 for women earning less than \$600 a year, to \$1,702 for those who earn \$3,000 or more. By contrast, median annual expenditures for the same items by women without dependents increase with earnings from \$259 to \$1,169. Median living expenses of all 6,036 women without dependents are \$266 below the median figure for the 3,977 women with dependents.¹

¹In the instructions for filling out the questionnaires, women whose dependents lived with them were told not to attempt to separate their own expenses from their dependents', but to give the total amount spent monthly on the items included in "living expenses."

TABLE 49—VARIATION IN YEARLY LIVING EXPENSES¹ WITH EARNINGS AND SIZE OF COMMUNITY

Population	Women with Dependents ²				Women without Dependents ²			
	Number of Women	Median Earnings	Median Living Expenses	Ratio Living Expenses to Earnings	Number of Women	Median Earnings	Median Living Expenses	Ratio Living Expenses to Earnings
Less than 2,500	215	\$1,326	\$ 754	0.568	427	\$1,262	\$488	0.387
2,500-4,999	448	1,417	812	0.573	701	1,290	532	0.412
5,000-9,999	638	1,446	783	0.542	1,029	1,321	544	0.411
10,000-24,999	877	1,600	874	0.548	1,404	1,460	627	0.429
25,000-49,999	574	1,839	999	0.543	824	1,741	725	0.416
50,000-99,999	442	1,944	1,036	0.533	612	1,804	723	0.400
100,000-249,999	369	1,991	1,152	0.578	471	1,913	806	0.421
250,000 and over	303	2,262	1,178	0.520	404	1,998	878	0.439
Total group	3,871	\$1,690	\$ 913	0.540	5,872	\$1,507	\$647	0.429

¹"Living Expenses" cover only food, rent, service, laundry, and transportation to and from work. See definition, p. 201. Figure for yearly living expenses obtained by multiplying monthly expense figure by 12.

²Omitting married women, and also those who did not give information concerning dependents, living expenses, earnings, or size of community.

Although living expenses increase consistently with earnings, the proportional amount spent on these items decreases as earnings increase (Table 48). If, however, the size of the community in which the work is carried on is taken into consideration, it seems that although both earnings and expenses increase with the size of the community, yet the proportion of earnings which goes for living expenses at each population level is very nearly constant. This is true not only for women with dependents, for whom the proportion of earnings going for living expenses ranges from 52.0 per cent to 57.8 per cent, according to the size of the community, but also for women without dependents, whose living expenses vary from 38.7 per cent to 43.9 per cent of their median earnings, according to the population of the community. Median living expenses of all 3,871 women with dependents are 54.0 per cent of their median earnings, while the corresponding figure for the 5,872 without dependents is 42.9 per cent. This last figure, 42.9 per cent, is almost identical with Dr. Hoyt's estimate of the expenditure for food

TABLE 50—YEARLY SAVINGS FROM EARNED INCOME

Yearly Savings (dollars)	Women with Dependents ¹			Women without Dependents ¹		
	Number of Women	Per Cent of Total	Median Earn- ings	Number of Women	Per Cent of Total	Median Earn- ings
None	275	13.1	\$1,473	316	10.1	\$1,316
1-199	345	16.4	1,368	458	14.6	1,246
200-399	570	27.1	1,583	872	27.8	1,430
400-599	421	20.0	1,849	695	22.2	1,615
600-799	183	8.7	2,046	326	10.4	1,846
800-999	78	3.7	2,175	160	5.1	1,945
1,000-1,199	97	4.6	2,399	176	5.6	2,274
1,200-1,399	24	1.2	3,000	39	1.3	2,354
1,400 and over	108	5.2	3,175	92	2.9	3,110
Total group	2,101	100.0	\$1,710	3,134	100.0	\$1,544

¹Omitting married women, and also those who did not give information concerning dependents and savings.

and shelter of the "typical American independent single woman" with an income of \$1,350.¹

Savings from earned income, like living expenses, increase with earnings; but unlike living expenses, the proportion of income that is saved increases with earnings (Table 51). This is alike true for women with and without dependents, though quite expectedly women without dependents are able to save a higher proportion of their earnings. At first glance, the figures for savings, when compared with the earned income from which the savings have been set aside, seem surprisingly high. Median savings of women with dependents increase from \$67 for 10 women earning less than \$600 to \$1,104 for 216 women earning \$3,000 or over, while for women without dependents they increase with earnings from \$77 to \$1,089, despite an earnings median \$166 below that of women with dependents.

¹The proportions allotted by Dr. Hoyt to the different items in the budget of this "typical" independent woman are as follows: Food, 26 per cent; shelter (including heat and light), 15 per cent; clothing, 19 per cent; sundries, 40 per cent. Doubtless laundry and transportation to and from work, which are included here under "living expenses" were classified with "sundries" by Dr. Hoyt. E. E. Hoyt, *The Consumption of Wealth* (New York: Macmillan Co., 1928), p. 314.

TABLE 51—VARIATION IN YEARLY SAVINGS FROM EARNED INCOME WITH EARNINGS

Earnings (dollars)	Women with Dependents ¹			Women without Dependents ¹		
	Number of Women	Median Yearly Savings	Ratio Yearly Sav- ings to Earnings	Number of Women	Median Yearly Savings	Ratio Yearly Sav- ings to Earnings
Less than 600	10	\$ 67	0.133	32	\$ 77	0.154
600-799	46	88	0.125	122	124	0.177
800-999	105	190	0.211	211	216	0.241
1,000-1,199	166	211	0.192	298	269	0.245
1,200-1,399	290	230	0.177	546	299	0.230
1,400-1,599	334	279	0.186	496	368	0.246
1,600-1,799	181	338	0.199	292	389	0.229
1,800-1,999	258	360	0.190	383	489	0.258
2,000-2,499	371	481	0.214	435	560	0.249
2,500-2,999	124	583	0.212	143	649	0.253
3,000 and over	216	1,104	0.304	176	1,089	0.315
Total group ²	2,101	\$ 351	0.205	3,134	\$ 382	0.247

¹Omitting married women, and also those who did not give information concerning dependents, savings, earnings, and size of community.

²Median earnings for women with dependents are \$1,710, and \$1,544 for those without dependents.

For all 2,101 women with dependents who report savings, median savings are \$351, or 20.5 per cent of their median earnings; and this in spite of the fact that 13.1 per cent of them report that they saved nothing that year. The situation is much the same for the 3,134 women without dependents, whose median savings are \$382, or 24.7 per cent of their median earnings, although 10.1 per cent of the group report no savings. Savings figures such as these suggest rigid economies. Yet one must not overlook the fact that only 43.4 per cent of the total group, exclusive of married women, report their savings from earnings, and these probably represent the thriftier members of the group. If data for the other 56.6 per cent were available, the savings figure would presumably be lower.¹

¹Though not necessarily lower, if we accept Dr. Hoyt's estimate of expenditures for main budget items of a "typical American independent single woman"

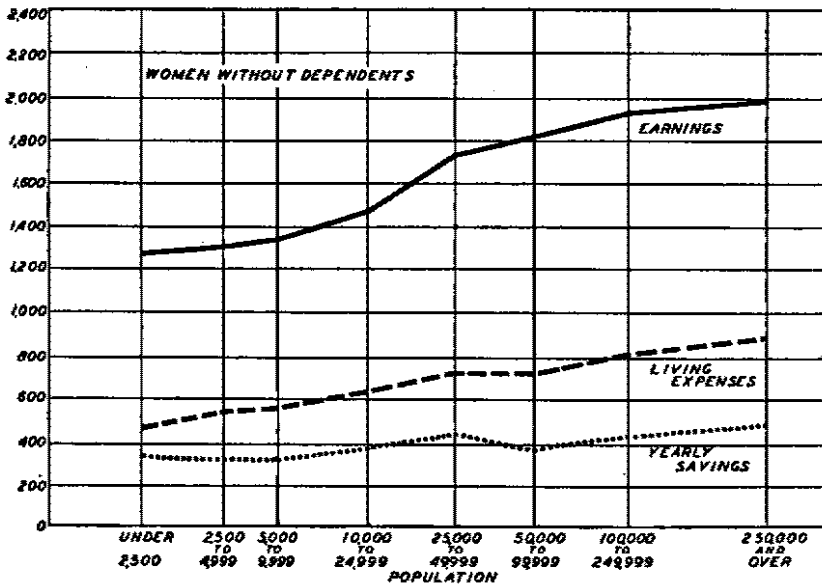
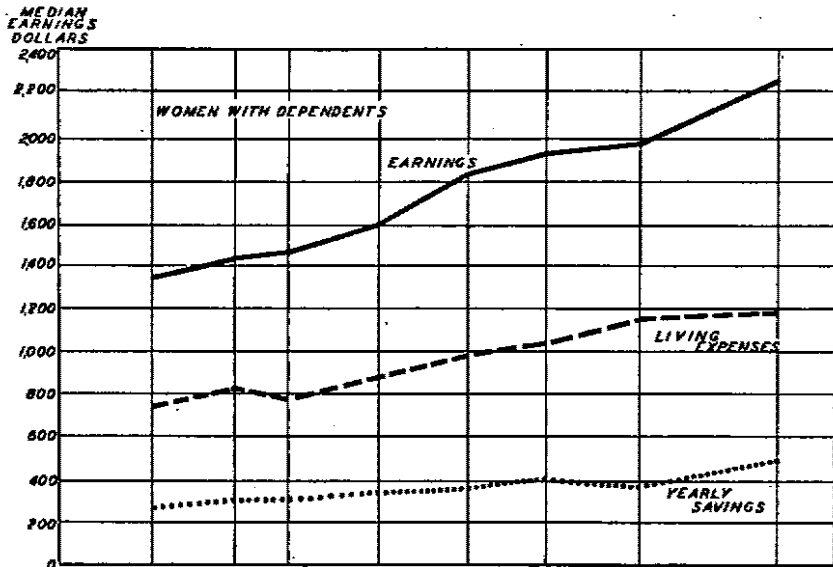
Savings, like living expenses and earnings, increase in amount with the size of the work community (Table 52). It would be strange if it were otherwise. Yet it is unexpected to find that savings, like living expenses, are an almost constant proportion of earnings at each successive population level. This is especially true of women with dependents, for whom the proportion of earnings saved varies with the size of the community only between 19.2 per cent and 21.1 per cent. For women without dependents there is a slightly greater variation, though hardly enough to be significant (Table 52).

Earnings increase with the size of the community; so do living expenses, and so do savings. Yet both expenses and savings bear a constant ratio to earnings at each population level. Why should this be? In how far is the increased expenditure in large cities merely a

with an income of \$1,350. Dr. Hoyt's figures are compared with ours in the table below. She estimates that 19 per cent is spent for clothes, and 40 per cent for "sundries," including savings. According to our figures, 31.8 per cent of the median earnings of women without dependents, excluding married women, go for clothing and "sundries," exclusive of savings, laundry, domestic service, and carfare to and from work. If, then, our group spent the estimated 19 per cent for clothing, this leaves 12.8 per cent for recreation, health, education, and other items included in "sundries." This is a not unreasonable proportion. *Loc. cit.*

Dr. Hoyt's "Typical Independent Woman"		3,134 Women without Dependents	
Budget Item	Per Cent of Earnings	Budget Item	Per Cent of Earnings
Food	26	Food, shelter, laundry, domestic service, transportation to and from work	42.9
Shelter (including heat and light)	15	Savings	25.3
Clothing	19	Clothing and sundries (exclusive of items above)	31.8
Sundries	40	Total	100.0
Total	100	Total	100.0

CHART 15—VARIATION IN LIVING EXPENSES AND YEARLY SAVINGS FROM EARNED INCOME WITH EARNINGS BY SIZE OF COMMUNITY¹



¹"Living Expenses" include only expenditures for food, shelter, domestic service, and transportation to and from work. Note that population is plotted on a logarithmic scale.

TABLE 52—VARIATION IN YEARLY SAVINGS FROM EARNED INCOME WITH EARNINGS AND SIZE OF COMMUNITY

Population	Women with Dependents ¹				Women without Dependents ¹			
	Number of Women	Median Earnings	Median Yearly Savings	Ratio Savings to Earnings	Number of Women	Median Earnings	Median Yearly Savings	Ratio Savings to Earnings
Less than 2,500	106	\$1,426	\$286	0.200	203	\$1,285	\$346	0.269
2,500-4,999	239	1,429	301	0.211	346	1,209	338	0.261
5,000-9,999	351	1,452	305	0.210	539	1,341	325	0.242
10,000-24,999	473	1,592	336	0.211	767	1,495	398	0.267
25,000-49,999	318	1,819	366	0.201	467	1,779	434	0.244
50,000-99,999	257	2,010	405	0.202	336	1,723	387	0.224
100,000-249,999	191	1,991	382	0.192	246	1,943	420	0.216
250,000 and over	166	2,408	500	0.208	230	2,057	445	0.217
Total group	2,101	\$1,710	\$351	0.205	3,134	\$1,507	\$382	0.253

¹Omitting married women, and also those who did not give information concerning dependents, savings, earnings, and size of community.

reflection of increased living costs, and to what extent is it due to higher living standards? The questions are as intriguing as they are baffling. Nor is there at present any answer to them.¹ Imponderable factors in the situation are too numerous and too closely interwoven with ponderable ones to justify one in doing more at this time than to call attention to the way in which earnings tend to vary under certain known conditions.

¹A rough measure of the degree of correspondence between expenses, savings, earnings, and the size of the community may be secured from the following correlation ratios, calculated for the 2,101 women, exclusive of married women, who report dependents. In every case, the correlation ratio was at least a little higher than the correlation coefficient, and for savings and size of community, it was more than double the coefficient. It would, however, require considerable temerity to draw any definite conclusions from these figures.

Related Variables	Correlation Ratio
Earnings and size of community	+ .365
Monthly living expenses and size of community	+ .282
Savings and size of community	+ .365
Savings and earnings	+ .589
Living expenses and earnings	
(1) Total group, disregarding size of community	+ .555
(2) Women in cities of 50,000-99,999	+ .485

APPENDIX I

SUPPLEMENTARY TABLES

TABLE I—GEOGRAPHIC DISTRIBUTION OF REPORTING GROUP, TOTAL MEMBERSHIP OF
FEDERATION OF BUSINESS AND PROFESSIONAL WOMEN'S CLUBS, AND TOTAL
GAINFULLY EMPLOYED WHITE WOMEN TEN YEARS OF AGE
AND OVER IN THE UNITED STATES IN 1920¹

Geographic Division and State	Per Cent of Gainfully Employed White Women in U. S. in 1920	Per Cent of National Federation B.P.W.C. Membership June, 1927	Per Cent of Reporting Group
NEW ENGLAND	12.3	7.5	6.4
Maine	0.9	3.4	2.8
New Hampshire	0.7	0.5	0.6
Vermont	0.4	0.7	0.6
Massachusetts	7.1	1.4	1.1
Rhode Island	1.1	..	..
Connecticut	2.1	1.5	1.3
MIDDLE ATLANTIC	28.7	6.2	5.9
New York	15.6	1.3	1.1
New Jersey	3.9	1.0	0.9
Pennsylvania	9.2	3.9	3.9
EAST NORTH CENTRAL	21.4	24.8	27.8
Ohio	5.5	5.9	4.6
Indiana	2.5	7.0	8.0
Illinois	7.4	6.8	8.2
Michigan	3.4	3.2	5.1
Wisconsin	2.6	1.9	1.9
WEST NORTH CENTRAL	10.5	22.7	25.2
Minnesota	2.4	2.6	2.2
Iowa	2.0	3.6	5.4
Missouri	3.1	3.4	3.5
North Dakota	0.4	0.8	1.3
South Dakota	0.4	0.8	1.1
Nebraska	1.0	2.5	3.7
Kansas	1.2	9.0	8.0
SOUTH ATLANTIC	8.7	10.0	9.6
Delaware	0.2	0.2	0.1
Maryland	1.4	0.4	0.2
District of Columbia	0.9	..	..
Virginia	1.1	2.0	2.6
West Virginia	0.7	1.2	1.4
North Carolina	1.5	1.9	1.7
South Carolina	0.9	0.3	0.3
Georgia	1.5	0.7	0.6
Florida	0.5	3.3	2.7

¹U. S. Census of 1920, Vol. IV.

MICHIGAN BUSINESS STUDIES

TABLE 1--(CONTINUED)

Geographic Division and State	Per Cent of Gainfully Employed White Women in U. S. in 1920	Per Cent of National Federation B.P.W.C. Membership June, 1927	Per Cent of Reporting Group
EAST SOUTH CENTRAL	4.4	5.8	5.1
Kentucky	1.4	2.4	2.2
Tennessee	1.2	1.6	1.6
Alabama	1.1	1.0	0.9
Mississippi	0.7	0.8	0.4
WEST SOUTH CENTRAL	5.6	8.5	7.2
Arkansas	0.8	1.9	2.1
Louisiana	0.8	1.0	0.6
Oklahoma	1.1	3.4	2.6
Texas	2.9	2.2	1.9
MOUNTAIN	2.4	7.9	7.4
Montana	0.4	0.6	0.3
Idaho	0.2	1.3	1.5
Wyoming	0.1	0.8	0.7
Colorado	0.9	2.4	2.2
New Mexico	0.2	0.6	0.6
Arizona	0.2	1.0	0.8
Utah	0.3	1.1	1.3
Nevada	0.1	0.1	—
PACIFIC	6.0	6.4	5.3
Washington	1.3	3.0	3.1
Oregon	0.8	1.7	1.0
California	3.9	1.7	1.2
HAWAII	..	0.2	0.1
Total per cent	100.0	100.0	100.1
Total number	6,962,246	46,700	14,073

TABLE 2—GEOGRAPHIC DISTRIBUTION OF REPORTING GROUP BY SIZE OF COMMUNITY COMPARED WITH THAT OF TOTAL WHITE FEMALE POPULATION IN THE UNITED STATES IN 1920

Geographic Division	Percentage in Communities with Population of												Per Cent of Total in U. S.	Per Cent of Total Reporting Group
	Less than 2,500		2,500 to 10,000		10,000 to 25,000		25,000 to 100,000		100,000 to 500,000		500,000 and Over			
	U. S.	Reporting Group	U. S.	Reporting Group	U. S.	Reporting Group	U. S.	Reporting Group	U. S.	Reporting Group	U. S.	Reporting Group		
New England	20.2	2.9	12.4	23.4	14.4	12.6	23.3	43.9	19.6	17.2	10.1	0.0	7.9	6.4
Middle Atlantic	24.8	0.0	9.4	15.5	7.7	11.8	10.7	41.5	9.2	15.4	38.2	15.8	23.3	5.9
East North Central	39.3	1.1	9.9	25.8	7.4	22.3	12.5	34.9	10.5	13.6	20.4	2.3	22.0	27.8
West North Central	61.8	14.0	9.6	38.2	5.7	26.0	6.0	12.8	10.9	8.8	6.0	0.2	12.8	25.2
South Atlantic	66.0	12.1	7.0	25.5	4.0	25.5	8.1	29.1	8.2	4.2	6.7	2.6	10.2	9.6
East South Central	76.9	3.5	7.0	31.8	3.7	25.9	4.5	16.0	7.9	22.8	...	...	6.8	5.1
West South Central	69.4	3.9	9.4	39.1	5.2	29.9	6.3	15.4	9.7	11.7	...	...	8.4	7.2
Mountain	61.1	14.0	13.9	47.9	7.3	23.6	5.6	6.4	12.1	8.1	...	...	3.2	7.4
Pacific	35.0	14.1	10.7	22.2	6.0	18.3	11.6	18.1	16.6	19.9	20.1	7.4	5.4	5.3
Hawaii	...	...	...	...	...	...	5.3	...	94.7	...	...	...	...	0.1
Total females in U. S. in 1920	Number	21,143,803	4,454,524		3,220,117		4,790,888		5,038,194		7,742,734		16,390,260	
	Per cent	45.6	9.6		6.9		10.3		10.9		16.7		100.0	
Total reporting group	Number	1,060	4,337		3,219		3,423		1,715		319		14,073	
	Per cent	7.5	30.8		22.9		24.3		12.2		2.3		100.0	

EARNINGS OF WOMEN

TABLE 3—PROPORTION OF NON-MANUAL WOMEN WORKERS¹ IN THE REPORTING GROUP, IN THE NATIONAL FEDERATION OF BUSINESS AND PROFESSIONAL WOMEN'S CLUBS, AND IN THE UNITED STATES IN 1920 ENGAGED IN DIFFERENT TYPES OF WORK

Type of Work ²	Per Cent of Non-Manual Women Workers		
	Reporting Group	National Federation B. P. W. C.	U. S. in 1920
Clerical	43.0	39.5	32.5
Teaching	19.7	17.0	16.9
Sales, publicity, purchasing, and personnel	12.4	17.0	15.1
Health	6.6	6.7	4.1
Finance	4.5	0.3	2.9
Production and planning	3.1	4.4	15.9
Food, housing, and personal service	3.0	5.7	12.4
Welfare and religious	2.4	1.8	0.9
Library	1.5	1.2	0.3
Legal and protective	1.3	1.0	0.1
Editorial	1.2	1.2	0.2
Not elsewhere classified	1.3	1.6	1.3
Information missing	...	...	...
Total per cent	100.0	100.0	100.0
Total number	14,022	39,666	4,285,455

¹"Non-manual workers" as defined here exclude factory workers, agricultural and other laborers, and domestic servants, but include skilled needle-workers and other skilled manual workers not in factories, such as arts and crafts workers. It was necessary to exclude factory workers, agricultural and other laborers, and domestic servants in making this comparison, since only 51 of the reporting group are engaged in these occupations, as against approximately fifty per cent of all gainfully employed women in the country.

²Because of the census practice of giving a single total for several occupations, some of which according to the classification used here belong in one group, and some in another, there is unavoidable error in the regrouping of the federal census figures, but not enough to invalidate general conclusions. For the same reason, minor changes in the classification used throughout the study were necessary in this table.

EARNINGS OF WOMEN

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TABLE 4—AGE OF REPORTING GROUP AND EARNINGS

Age in 1927 (years)	Number of Women	Median Earnings ¹	Age in 1927 (years)	Number of Women	Median Earnings ¹
Less than 18	2	....	46-46.9	282	\$1,742
18-18.9	15	\$ 712	47-47.9	321	1,802
19-19.9	70	908	48-48.9	297	1,836
20-20.9	148	912	49-49.9	303	1,821
21-21.9	197	996	50-50.9	236	1,808
22-22.9	288	1,031	51-51.9	282	1,804
23-23.9	385	1,152	52-52.9	250	1,750
24-24.9	409	1,231	53-53.9	186	1,836
25-25.9	424	1,262	54-54.9	207	1,700
26-26.9	381	1,293	55-55.9	178	1,816
27-27.9	470	1,330	56-56.9	133	1,882
28-28.9	399	1,397	57-57.9	136	1,823
29-29.9	412	1,395	58-58.9	115	1,594
30-30.9	405	1,504	59-59.9	93	1,595
31-31.9	459	1,541	60-60.9	66	1,520
32-32.9	469	1,549	61-61.9	73	1,800
33-33.9	430	1,606	62-62.9	59	1,617
34-34.9	390	1,596	63-63.9	44	1,450
35-35.9	495	1,580	64-64.9	52	1,975
36-36.9	420	1,624	65-65.9	31	1,750
37-37.9	486	1,735	66-66.9	26	1,550
38-38.9	451	1,757	67-67.9	21	1,500
39-39.9	458	1,715	68-68.9	16	....
40-40.9	423	1,700	69-69.9	11	....
41-41.9	438	1,693	70-70.9	8	....
42-42.9	404	1,817	71-71.9	4	....
43-43.9	380	1,813	72-72.9	2	....
44-44.9	327	1,803	73-73.9	2	....
45-45.9	366	1,813	74-74.9	2	....
			Information missing	236	1,690
			Total group	14,073	\$1,526

¹Figured on \$200 class intervals.

TABLE 5—PERCENTAGE DISTRIBUTION OF REPORTING GROUP ACCORDING TO OCCUPATIONAL RESPONSIBILITY AND SIZE OF COMMUNITY

Description of Occupational Responsibility	Population									
	Less than 2,500	2,500 to 4,999	5,000 to 9,999	10,000 to 24,999	25,000 to 49,999	50,000 to 99,999	100,000 to 249,999	250,000 to 499,999	500,000 to 999,999	1,000,000 and Over
Unskilled manual	0.4%	0.2%	0.1%	0.2%	...	...	...	...	...	...
Routine, no special training	8.7	10.2	8.7	6.0	6.5%	8.0%	5.8%	5.0%	5.3%	2.8%
Routine, special training	26.2	29.0	33.1	28.0	21.1	22.5	20.4	20.2	9.5	3.6
Non-routine, special training	7.4	7.6	9.1	12.1	13.4	17.0	16.5	17.2	21.9	25.7
Non-routine, supervisory, special training	5.6	5.7	6.3	6.7	7.2	7.9	10.8	11.4	10.9	10.1
Highly trained special worker, non-executive	19.0	13.7	12.3	13.9	13.7	12.0	10.2	10.1	8.6	2.7
Professionally trained non-executive	8.2	9.1	6.9	8.9	10.5	6.7	7.8	7.1	10.5	6.4
Professionally trained minor executive	3.3	2.6	3.7	5.3	6.9	4.9	4.6	4.7	7.6	8.3
Professionally trained major executive	4.0	5.0	4.7	4.0	4.8	3.6	4.1	1.9	5.7	8.3
Minor executive, including department heads	6.0	4.7	4.4	5.0	5.2	6.6	6.6	9.6	8.1	13.8
Major executive, salaried	1.2	2.1	2.4	1.9	2.6	3.2	4.1	4.7	4.3	5.5
Proprietor, partner	7.1	6.6	5.7	5.7	4.9	5.1	6.5	5.7	6.2	10.1
Information missing	2.9	3.5	2.6	2.3	3.2	2.5	2.6	2.4	1.4	2.7
Total per cent	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Total number	1,055	1,853	2,484	3,219	1,969	1,454	1,121	594	210	109

APPENDIX II

EARNINGS BY OCCUPATIONS¹

TABLE 1—MEDIAN AND QUARTILE EARNINGS FOR ALL OCCUPATIONS REPRESENTED IN REPORTING GROUP BY TEN OR MORE WOMEN
(Occupations are classified by types of work)

Occupation	Number of Women	Number Reporting Earnings	Earnings ²		
			First Quartile	Median	Third Quartile
CLERICAL					
Proprietor, public stenographic, mimeographing, or letter service bureau	38	26	\$1,350	\$1,900	\$3,017
City or county clerk or recorder	46	46	1,412	1,790	2,250
Deputy city or county clerk or deputy recorder	53	51	1,238	1,483	1,644
Office manager	287	285	1,555	1,831	2,461
Office manager and bookkeeper	39	39	1,519	1,817	2,145
Office manager and other clerical work	13	12	1,750	2,033	2,300
Assistant office manager	15	15	1,575	1,950	2,312
Chief clerk	85	84	1,590	1,857	2,167
Chief clerk and other clerical work	13	13	1,325	1,550	1,738
Head bookkeeper (including head of accounting or billing departments)	67	66	1,450	1,733	2,117
Head clerical department (including charge of comptometer, correspondence, and filing)	26	26	1,425	1,800	2,445
Head stenographer	18	18	1,517	1,667	2,250
Accountant (including cost accountant)	57	57	1,606	1,895	2,225
Statistician	14	14	1,575	2,100	2,275
Court reporter or deputy court reporter (including clerk and reporter)	53	51	1,834	2,175	2,554
Private secretary or secretary to official	539	534	1,429	1,733	2,095
Secretary	554	539	1,310	1,582	1,887

¹For women in positions where maintenance is provided without charge, such as hospital officials, private duty nurses, and housekeepers, the following amounts have been added to their stated annual earnings, if it was clear that they received maintenance without charge, and had themselves made no allowance for it: officials in hospitals and institutions, \$600; housekeepers and clerks in institutions, \$450; teachers in boarding schools, \$450 (on a 9 months' basis); cafeteria managers, waitresses, etc. receiving board only, \$250 (assuming 50 weeks' employment per year); private duty nurses, \$300 (assuming 40 weeks' employment per year). For example, yearly earnings for a trained nurse on private duty who stated that her weekly earnings in 1927 were \$40 plus maintenance were estimated by multiplying by 40 and adding \$300, making a total of \$1,900.

²See p. 201 for definitions of median and quartile earnings.

TABLE 1—(Continued)

Occupation	Number of Women	Number Reporting Earnings	Earnings ²		
			First Quartile	Median	Third Quartile
Secretary and other clerical work	44	43	1,488	1,869	2,131
Assistant secretary	79	79	1,242	1,546	1,975
Assistant to official	20	20	1,450	1,833	2,050
Abstractor, copyist, or examiner	45	45	1,275	1,555	2,125
Bookkeeper and assistant secretary	33	32	1,375	1,840	2,060
Office machine operator	26	26	1,017	1,250	1,375
Bookkeeper	781	752	1,046	1,317	1,595
Bookkeeper and cashier	145	140	1,033	1,343	1,570
Bookkeeper and general office clerk	57	52	900	1,250	1,520
Bookkeeper and sales clerk	28	27	775	992	1,342
Bookkeeper and stenographer	560	549	1,044	1,305	1,556
Bookkeeper and typist	15	14	950	1,100	1,283
Assistant bookkeeper	29	26	912	1,200	1,550
Stenographer	1,046	1,029	1,026	1,295	1,567
Stenographer and cashier	12	12	1,100	1,450	1,700
Stenographer and clerk	146	143	1,235	1,396	1,602
Typist	26	25	905	1,150	1,325
Clerk	370	352	1,064	1,264	1,569
Billing clerk	29	29	1,162	1,388	1,579
Special clerk (including discount, voucher, record, and shipping)	90	89	1,138	1,470	1,897
File clerk	13	11	1,038	1,450	1,575
Cashier	135	135	949	1,253	1,645
Assistant cashier	18	17	1,012	1,275	1,675
Reporter, registrar, or miscellaneous office worker	17	17	962	1,275	1,675
Timekeeper or assistant timekeeper	20	10	1,525	1,633	1,750
TEACHING					
Professor, college or university	19	19	2,175	2,625	3,625
Assistant professor, college or university	15	15	2,125	2,275	2,725
Instructor, college or university	19	19	1,778	2,012	2,325
Training or critic teacher, normal school	12	12	2,050	2,500	2,575
Instructor, normal school	37	37	1,781	2,250	2,588
County superintendent of schools	42	42	1,839	2,033	2,275
Assistant county superintendent of schools	13	13	1,125	1,282	1,675
Supervisor, public schools, elementary or secondary	103	103	1,462	1,907	2,345
Principal, public schools, elementary or secondary	216	216	1,439	1,700	2,100

¹See footnote 1, p. 127.²See p. 201 for definitions of median and quartile earnings.

EARNINGS OF WOMEN

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TABLE 1—(Continued)

Occupation	Number of Women	Number Reporting Earnings	Earnings ²		
			First Quartile	Median	Third Quartile
Principal, public schools, elementary	174	174	1,425	1,700	2,125
Principal, high school	35	35	1,512	1,725	2,225
Assistant principal, high school	12	12	1,800	2,350	3,150
Dean of girls, high school	12	12	1,650	2,150	2,450
Teacher and department head, high school	31	31	1,515	1,850	2,056
Teacher and cafeteria manager, high school	10	10	1,617	1,700	1,850
Director of physical education	39	39	1,395	1,625	2,125
Teacher, high school	651	649	1,385	1,615	1,889
Teacher, public elementary school	933	925	1,070	1,289	1,800
Teacher, public school, unspecified	73	72	1,200	1,510	1,800
Kindergarten director, or assistant director and teacher	28	28	1,167	1,350	1,700
Proprietor, business college	11	10	1,550	2,400	2,950
Teacher, business college	26	25	1,225	1,462	1,769
Teacher, school for handicapped or mentally defective	18	18	1,450	1,650	1,950
Teacher, private lessons in music, art, dancing, or expression	97	77	742	1,290	1,695
SALES AND PUBLICITY					
Proprietor, sales organization	324	237	1,217	1,992	3,093
Partner, sales organization	119	86	1,256	2,033	3,055
Secretary of sales organization	12	12	1,950	2,600	3,850
Manager, sales organization	77	68	1,250	1,633	2,200
Assistant manager, sales organization	27	27	992	1,325	1,862
Assistant sales manager	10	10	1,550	2,100	2,183
Advertising manager	20	20	1,550	1,900	2,550
Assistant advertising manager	10	10	1,875	2,067	2,450
Assistant to husband	47	13	342	750	1,275
Head of department, retail store	61	59	1,158	1,383	1,605
Underwriter	18	17	1,825	2,150	2,575
Sales clerk and buyer	12	12	1,033	1,400	1,550
Sales clerk and assistant buyer	13	12	900	1,050	1,200
Sales agent or solicitor	190	150	1,282	1,860	3,012
Sales agent or solicitor, life insurance	68	50	1,475	1,880	3,010
Sales agent or solicitor, fire and miscellaneous insurance	37	32	1,550	2,525	3,350
Sales agent, real estate	20	14	1,750	3,067	3,950
Sales agent or solicitor, manufacturing	24	18	1,025	1,800	2,083
Post office clerk (stamps, money order, general delivery)	80	80	2,136	2,140	2,176
Sales clerk (all)	308	279	730	932	1,100

¹See footnote 1, p. 127.²See p. 201 for definitions of median and quartile earnings.

TABLE 1—(Continued)

Occupation	Number of Women	Number Reporting Earnings	Earnings ^a		
			First Quartile	Median	Third Quartile
HEALTH					
Superintendent or night superintendent, hospital	42	42	2,138	2,460	2,717
Supervisor, hospital or other health organization ¹	18	18	1,250	1,600	1,883
Physician (private practice)	55	44	2,500	3,088	5,550
Physician (in organization)	13	13	1,862	2,750	3,088
Physician (both private and in organization)	68	57	2,412	3,055	4,838
Osteopathic physician	65	51	2,075	3,012	4,525
Director or superintendent of nurses, hospital ¹	17	17	2,162	2,488	3,088
Supervisor of nurses, hospital ¹	22	22	1,688	2,100	2,450
Nurse, city board of education	34	34	1,475	1,640	1,808
Nurse, county health department	25	25	1,825	1,862	1,899
Private duty nurse ¹	77	55	1,316	1,544	1,853
Hospital nurse (graduate) ¹	32	31	1,468	1,664	1,906
Nurse, department of health, city and county	60	60	1,800	1,856	2,000
Nurse, with doctor	30	30	1,375	1,600	1,842
Nurse, business or industrial organization	11	11	1,515	1,570	1,812
Trained nurse (all)	291	270	1,558	1,783	1,882
Practical nurse, private duty ¹	12	11	775	1,050	1,325
Supervisor of nursing, school or public health department	11	11	1,810	1,888	1,975
Dental hygienist	12	12	1,100	1,350	1,700
Chiropractor	39	28	1,750	2,050	3,050
Chiroprapist	10	9	1,112	1,450	2,075
Optometrist	10	8	1,500	2,150	3,000
Assistant to dentist	16	15	919	1,025	1,362
Assistant to physician	53	52	725	1,050	1,271
Office assistant to dentist	17	16	650	1,000	1,367
Office assistant to physician	27	26	662	900	1,090
FINANCE					
Treasurer	52	52	1,700	2,100	3,033
Secretary and treasurer	81	81	1,662	2,030	3,016
Assistant secretary and treasurer	14	14	1,550	2,600	3,083
Assistant deputy city or county treasurer	21	20	1,225	1,350	1,700
Assistant treasurer	17	17	1,862	2,462	3,058
Assistant bank cashier	54	53	1,462	1,844	2,455
Auditor	22	22	1,838	2,200	3,017
Deputy city, county, or state auditor	14	14	1,288	1,575	1,817
Credit manager	34	32	1,900	2,150	2,600
Credit manager and bookkeeper	20	20	1,400	1,633	1,900
Manager, savings department	15	14	1,517	1,700	2,150
Bank teller	90	87	1,298	1,553	1,775
Bookkeeper and bank teller	11	10	1,225	1,400	1,775

¹See footnote 1, p. 127.²See p. 201 for definitions of median and quartile earnings.

EARNINGS OF WOMEN

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TABLE 1—(Continued)

Occupation	Number of Women	Number Reporting Earnings	Earnings ²		
			First Quartile	Median	Third Quartile
PRODUCTION AND PLANNING					
Proprietor, manufacturing, farming, or stock raising	56	45	1,312	2,017	3,044
Proprietor, manufacturing company	45	36	1,400	1,900	3,033
Secretary of manufacturing company	13	13	2,008	2,650	4,075
Manager, manufacturing company	14	12	1,600	2,050	3,050
Branch or department manager, manufacturing company	13	13	1,362	1,650	1,858
Chief operator, telephone company	46	44	983	1,228	1,350
Forelady or supervisor	28	28	1,150	1,425	1,950
Milliner or trimmer	18	17	775	1,062	1,525
Dressmaker, modiste, seamstress, or tailor	84	58	682	1,040	1,483
Fitter or alterer	24	20	750	967	1,100
Linotype operator	19	19	1,219	1,550	1,862
Telephone operator	23	23	554	682	881
FOOD, HOUSING, AND PERSONAL SERVICE					
Proprietor, restaurant, cafeteria, tearoom, or other food shop	19	13	925	1,850	2,536
Director or manager, restaurant, cafeteria, tea room, or other food shop ¹	26	25	1,325	1,925	2,475
Dietician	23	23	1,694	2,070	2,325
Matron ¹	15	14	1,250	1,500	1,825
Housekeeper ²	11	11	675	975	1,212
Home demonstration agent	44	44	2,033	2,475	2,700
Proprietor, beauty shop	78	65	1,053	1,590	2,375
Beauty specialist	33	26	938	1,233	1,538
Hair dresser or manicurist	11	10	1,017	1,150	1,550
WELFARE					
Superintendent or director, welfare organization	30	30	1,842	2,100	2,525
Executive secretary, welfare organization (excluding Y.W.C.A.)	68	68	1,822	2,025	2,462
General secretary, Y.W.C.A.	55	55	1,839	2,150	2,542
Departmental secretary, Y.W.C.A.	24	24	1,638	1,725	1,900
Welfare or social service worker	40	39	1,388	1,650	1,882
LIBRARY					
Librarian	141	140	1,247	1,595	2,200
Assistant librarian	31	29	862	1,275	1,938
Reference librarian	10	10	1,550	1,700	1,950
LEGAL AND PROTECTIVE					
Clerk of court	25	24	1,200	1,400	2,067
Deputy clerk of court	31	30	1,283	1,567	1,888
Lawyer, own practice or partnership	36	30	1,562	2,533	4,075
Lawyer, law firm	15	13	1,862	2,682	3,038
Probation officer	11	11	1,675	1,842	1,888

¹See footnote 1, p. 127.²See p. 201 for definitions of median and quartile earnings.

MICHIGAN BUSINESS STUDIES

TABLE 1--(Continued)

Occupation	Number of Women	Number Reporting Earnings	Earnings ²		
			First Quartile	Median	Third Quartile
EDITORIAL					
Society editor	25	25	1,075	1,536	1,775
Reporter	32	31	825	1,225	1,556
Proofreader	26	25	1,262	1,570	1,858
PURCHASING					
Buyer	50	50	1,070	1,580	2,125
Buyer and department manager	15	15	1,062	1,275	1,825
Buyer and sales clerk	29	27	992	1,150	1,342
Assistant buyer	21	19	1,088	1,350	1,581
RESEARCH					
Laboratory technician	35	35	1,519	1,842	2,142
PERSONNEL					
Personnel director	21	21	1,725	2,375	3,092
Employment manager	15	15	1,775	2,083	2,625
SERVICE					
Postmistress	19	19	2,538	2,825	3,612
Assistant postmistress	11	11	2,275	2,383	2,725
PROPRIETORS					
Clerical	38	26	1,350	1,900	3,017
Food, housing, and personal service	118	89	1,053	2,058	2,512
Production and planning	56	45	1,342	2,017	3,044
Sales and publicity	124	107	1,217	1,992	3,093
Teaching	16	15	1,575	2,525	3,062
All proprietors	588	446	1,244	2,023	3,053

¹See footnote 1, p. 127.²See p. 201 for definitions of median and quartile earnings.

APPENDIX III

CENSUS OF OCCUPATIONS OF REPORTING GROUP AND NATIONAL FEDERATION OF BUSINESS AND PROFESSIONAL WOMEN'S CLUBS

TABLE 1—SUMMARY BY TYPE OF WORK

Type of Work	Federation		Reporting Group	
	Number of Women	Per Cent of Total	Number of Women	Per Cent of Total
Clerical	15,674	39.3	5,862	42.8
Teaching	6,760	17.0	2,689	19.7
Sales and publicity	6,340	15.9	1,469	10.8
Health	2,641	6.7	894	6.5
Finance	1,139	2.9	609	4.5
Production and planning	1,881	4.7	463	3.4
Food, housing, and personal service	2,292	5.8	418	3.1
Welfare	647	1.6	315	2.3
Library	465	1.2	205	1.5
Legal and protective	415	1.0	182	1.3
Editorial	491	1.2	168	1.2
Purchasing	317	0.8	141	1.0
Research	136	0.3	80	0.6
Personnel	100	0.2	75	0.5
Service	138	0.3	45	0.3
Professional, not elsewhere classified	239	0.6	34	0.2
Religious	62	0.2	18	0.1
Administrative, not elsewhere classified	29	0.1	12	0.1
Amusements	57	0.1	7	0.1
Political	27	0.1	2	..
Information missing	384	..	385	..
Total	40,234	100.0	14,073	100.0

TABLE 2—OCCUPATIONS CLASSIFIED BY TYPE OF WORK¹

CLERICAL			
Occupation	Employer	Number in Federation	Number in Reporting Group
Proprietor	Office service	42	38
Partner	Office service	1	
Manager	Office service	1	2
City clerk		30	13
County clerk		22	10
County recorder		35	23
City recorder		2	

¹In some occupations, the totals for the reporting group exceed those for the Federation. This may be due in part to the fact that some of our group were not included in the Federation census. More probably, however, it is because the occupational titles for this study were reported by the persons engaged in them, while the titles included in the census were reported by a club officer, frequently the treasurer in charge of the local census. The titles for the groups included here are more accurate because the description of duties given served as a check on the correctness of the job title.

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Recorder, unspecified	Government	7	
County register of deeds		23	
Register of deeds, unspecified	Government	15	
Head, clerical department	Bank, investment company, or other financial organization	3	14
	Abstract company, advertising, collection or employment bureau, or office service	2	
	Real estate or insurance company	5	8
	Retail store	2	2
	Wholesale house	3	
	Retail and wholesale house	1	
	College or university		1
	State government	1	
	Public utility	2	6
	Iron and steel manufacturing company	3	1
	Lumber or furniture manufacturing company		3
	Newspaper, printing, or publishing company	2	
	Textile or clothing manufacturing company	1	
	Coal or other mining company		1
	Railroad		1
	Telephone company		1
	Unspecified	1	4
Asst. manager, clerical dept.	Bank, investment company, or other financial organization		3
	Real estate or insurance company		1
Asst. manager and stenographer clerical department	Real estate or insurance company		1
	Retail store		1
	State government		1
	Public utility		1
	Manufacturing company, not elsewhere classified		1
	Unspecified		1
Supervisor, mail order dept.	Retail store		1
Deputy U. S. clerk		7	
Deputy county clerk		80	32
Deputy city clerk		8	11
Deputy clerk, unspecified	Government	14	2
Deputy county recorder		19	4
Deputy recorder, unspecified	Government	4	
Deputy county register of deeds		4	
Deputy register of deeds, unspecified	Government	5	
Office manager	Theater, moving picture house, or entertainment bureau	2	1
	Bank, investment company, or other financial organization	16	17
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	21	5
	Abstract company, advertising, collection or employment bureau, or office service	9	14
	Real estate or insurance company	59	43
	Retail store	77	45
	Wholesale house	13	20
	Retail and wholesale house	5	12
	Board of education	1	4
	College or university	3	4
	Elementary school		1
	Vocational or technical school	4	1
	Government, U. S.	2	
	Government, state	2	2
	Government, county	2	1
	Government, city or town	4	
	Government, unspecified	2	
	Building and construction company (including building materials)	8	9
	Oil, drug, paint, or other chemical manufacturing company	12	

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group	
Office manager	Public utility	10	2	
	Food manufacturing or packing company	22	6	
	Iron and steel manufacturing company	14	9	
	Lumber or furniture manufacturing company	7	5	
	Metal manufacturing company (not iron and steel)	2	2	
	Manufacturing company, not elsewhere classified	18	24	
	Newspaper, printing, or publishing company	12	16	
	Textile or clothing manufacturing company	15	7	
	Farm, nursery, or greenhouse	2		
	Coal or other mining company	5		
	Live stock or poultry farm		2	
	Chiroprapist		1	
	Accountant	1		
	Engineer	1	1	
	Law firm	10	7	
	Optometrist	4		
	Chamber of commerce or other civic organization	7		
	Hospital, Y. W. C. A., or other health or welfare organization	6	5	
	Women's or men's club or other fraternal organization	1		
	Political organization	1		
	Church or religious association	1	1	
	Express company	1	1	
	Railroad	1	1	
	Taxicab or transfer and trucking company	4		
	Telegraph company	2	1	
	Telephone company	16	2	
	Unspecified	40	13	
	Office manager and accountant	Wholesale house	1	1
		Public utility	1	1
		Lumber or furniture manufacturing company	1	1
	Office manager and statistician	Manufacturing company, not elsewhere classified		1
		Wholesale house		1
Office manager and bookkeeper	Bank, investment company, or other financial organization		1	
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1	
	Real estate or insurance company		2	
	Retail store	4	11	
	Wholesale house	1	5	
	Retail and wholesale house		1	
	Government, U. S.		1	
	Government, city		1	
	Building and construction company (including building materials)		1	
	Public utility		2	
	Food manufacturing or packing company		1	
	Iron and steel manufacturing company		2	
	Manufacturing company, not elsewhere classified	1	2	
	Newspaper, printing, or publishing company	2	3	
	Farm, nursery, or greenhouse	1		
	Hospital, Y. W. C. A., or other health or welfare organization		2	
	Telephone company		1	
	Unspecified	1	2	
	Office manager and private secretary	Manufacturing company, not elsewhere classified		1
		Law firm		2
Hospital, Y. W. C. A., or other health or welfare organization			1	

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Office manager and secretary . . .	Trade association		4
	Theater	1	
	Bank	1	
	Real estate or insurance company	1	
	Retail store	2	
	Retail and wholesale house	1	
Office manager and stenographer	Lumber or furniture manufacturing company	1	
	Law firm	2	
	Real estate or insurance company	2	
	Manufacturing company, not elsewhere classified	1	
Office manager and cashier	Law firm	1	
	Real estate or insurance company	3	1
	Retail store	1	1
	College or university		1
Asst. office manager	Manufacturing company, not elsewhere classified		1
	Abstract company, advertising, collection or employment bureau, or office service		3
	Bank, investment company, or other financial organization	2	
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
	Real estate or insurance company	1	2
	Retail store	4	3
	Wholesale house		1
	Retail and wholesale house		1
	Building and construction company (including building material)	1	
	Oil, drug, paint, or other chemical manufacturing company		1
	Public utility	1	
	Food manufacturing or packing company	1	
	Iron and steel manufacturing company	1	
	Lumber or furniture manufacturing company		1
	Manufacturing company, not elsewhere classified		2
	Textile or clothing manufacturing company	1	
	Unspecified	2	1
Asst. office manager and book-keeper	Bank, investment company, or other financial organization	1	
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
	Retail store	1	
	Manufacturing company, not elsewhere classified		1
	Law firm		1
Asst. office manager and stenographer	Bank, investment company, or other financial organization		1
	Real estate or insurance company		1
	Oil, drug, paint, or other chemical manufacturing company		1
Chief clerk	Bank, investment company, or other financial organization	1	4
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
	Abstract company, advertising, collection or employment bureau, or office service	3	1
	Real estate or insurance company	8	5
	Retail store	2	1
	Wholesale house	1	
	Retail and wholesale house		3
	Board of education	2	3
	College or university	7	2
	Government, U. S.		4

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Chief clerk	Government, state	15	9
	Government, county	2	2
	Government, city or town	7	4
	Government, unspecified	1	3
	Building and construction company (including building materials)		1
	Oil, drug, paint, or other chemical manufacturing company	5	1
	Public utility	15	12
	Food manufacturing or packing company		1
	Iron and steel manufacturing company	4	1
	Lumber or furniture manufacturing company		1
	Metal manufacturing company (not iron and steel)	1	
	Manufacturing company, not elsewhere classified	1	3
	Newspaper, printing, or publishing company	3	
	Accountant		1
	Law firm		1
	Hospital, Y. W. C. A., or other health or welfare organization	2	
	Trade association	1	
	Railroad	15	12
	Telegraph company	1	
	Telephone company	4	8
Unspecified	5	4	
Chief file clerk	Retail store		1
	Bank, investment company, or other financial organization	2	
	Manufacturing company, not elsewhere classified		2
Chief voucher clerk	Railroad	1	
Chief clerk and bookkeeper	Real estate or insurance company		2
	College or university		1
Chief clerk and cashier	Government, state		1
	Real estate or insurance company		1
	Government, state		1
	Public utility		3
Chief clerk and inspector	Telephone company		1
	Government, state		1
Asst. chief clerk	Railroad		2
Head bookkeeper	Railroad	1	
	Bank, investment company, or other financial organization	2	
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1
	Abstract company, advertising, collection or employment bureau, or office service		2
	Real estate or insurance company		2
	Retail store	6	8
	Wholesale house	1	8
	Retail and wholesale house	1	2
	College or university		1
	Government, state	1	
	Oil, drug, paint, or other chemical manufacturing company	1	1
	Public utility	4	
	Food manufacturing or packing company	1	1
	Iron and steel manufacturing company		2
	Manufacturing company, not elsewhere classified		6
	Newspaper, printing, or publishing company		5
	Farm, nursery, or greenhouse	1	
	Hospital, Y. W. C. A., or other health or welfare organization		1
	Railroad		1
	Telephone company	1	
Unspecified	1	5	

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Head bookkeeper and cashier	Public utility		1
Head bookkeeper and secretary to president	Lumber or furniture manufacturing company		1
Head bookkeeper and secretary to proprietor	Lumber or furniture manufacturing company		3
Head cashier	Retail store	3	
Head stenographer	Bank, investment company, or other financial organization		1
	Abstract company, advertising, collection or employment bureau, or office service	1	
	Real estate or insurance company		1
	Government, state		1
	Building and construction company (including building materials)		1
	Oil, drug, paint, or other chemical manufacturing company		3
	Public utility	2	1
	Iron and steel manufacturing company		2
	Metal manufacturing company (not iron and steel)		2
	Manufacturing company, not elsewhere classified	1	6
	Newspaper, printing, or publishing company	1	
	Railroad	1	
	Unspecified	1	
Paymaster	Retail store	3	
	Newspaper, printing, or publishing company	1	
	Textile or clothing manufacturing company	1	1
	Railroad		1
Paymaster and cashier	Telephone company		1
District accountant	Telephone company		2
Cost accountant	Retail and wholesale house		1
	Manufacturing company, not elsewhere classified		2
Accountant	Theater, moving picture house, or entertainment bureau	1	
	Bank, investment company, or other financial organization	11	3
	Abstract company, advertising, collection or employment bureau, or office service	2	
	Real estate or insurance company	8	5
	Retail store	31	7
	Wholesale house	10	7
	Retail and wholesale house	2	1
	College or university	2	2
	Normal school or teachers' college	2	1
	Government, U. S.		1
	Government, state	3	1
	Government, county	2	1
	Government, city or town	2	
	Government, unspecified	1	
	Oil, drug, paint, or other chemical manufacturing company	5	3
	Public utility	8	
	Food manufacturing or packing company	3	
	Iron and steel manufacturing company	5	
	Lumber or furniture manufacturing company	2	
	Metal manufacturing company (not iron and steel)		1
	Manufacturing company, not elsewhere classified	1	1
	Newspaper, printing, or publishing company	5	4
	Textile or clothing manufacturing company	7	
	Live stock or poultry farm	8	2
	Coal or other mining company	1	
	Coal or other mining company	2	
	Law firm	1	2

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Accountant	Hospital, Y. W. C. A., or other health or welfare organization	4	1
	Express company	1	
	Railroad	15	4
	Taxicab or transfer and trucking company		1
	Telephone company	2	
Accountant and cashier	Unspecified	29	5
	Bank, investment company, or other financial organization		1
	Retail and wholesale house		1
	Oil, drug, paint, or other chemical manufacturing company		1
Accountant and secretary	Newspaper, printing, or publishing company		1
	Normal school or teachers' college		1
	Oil, drug, paint, or other chemical manufacturing company		1
Asst. accountant	Wholesale house	1	1
	Retail and wholesale house		1
	Government, U. S.		1
	Newspaper, printing, or publishing company	1	
Auditor	Railroad	1	1
	Real estate or insurance company		2
Auditor and cashier	Public utility		1
Asst. auditor	Newspaper, printing, or publishing company		1
	Abstract company, advertising, collection or employment bureau, or office service	1	
Asst. auditor and cashier	Real estate or insurance company		1
	Oil, drug, paint, or other chemical manufacturing company		1
	Unspecified		2
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1
Statistician	Bank, investment company, or other financial organization		2
	Abstract company, advertising, collection or employment bureau, or office service	1	
	Real estate or insurance company	1	1
	Retail store	1	1
	Retail and wholesale house	1	
	College or university	1	
	Government, state	5	1
	Government, city or town	1	
	Oil, drug, paint, or other chemical manufacturing company	3	2
	Public utility	1	3
	Lumber or furniture manufacturing company	1	1
	Manufacturing company, not elsewhere classified		1
	Doctor	1	
	Chamber of commerce or other civic organization		1
	Hospital, Y. W. C. A., or other health or welfare organization	1	
	Street railway company	1	
	Taxicab or transfer and trucking company	1	
Telephone company		1	
Asst. statistician	Unspecified	2	
	Hospital, Y. W. C. A., or other health or welfare organization	1	
Court reporter	Government, U. S.	2	1
	Government, state	4	5
	Government, county	20	
	Government, city or town	2	
	Government, unspecified	51	10
Reporter and secretary	Railroad		1
Deputy court reporter	Government, state		1
			1

MICHIGAN BUSINESS STUDIES

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Clerk and reporter, probate court	Government, county		6
Sales secretary	Chamber of commerce or other civic organization		1
Private secretary	Theater, moving picture house, or entertainment bureau	1	1
	Bank, investment company, or other financial organization	44	38
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	6	2
	Abstract company, advertising, collection or employment bureau, or office service	4	3
	Real estate or insurance company	32	37
	Retail store	18	16
	Wholesale house	7	22
	Retail and wholesale house	3	22
	Board of education	16	43
	College or university	39	30
	Normal school or teachers' college	1	2
	Private school, unspecified		2
	Professional school (law, medicine, or music)	1	
	School for handicapped	1	
	Secondary school	3	4
	School, unspecified	5	2
	Educational institution, unspecified		1
	Vocational or technical school, public	2	1
	Vocational or technical school, private		4
	Government, U. S.	5	6
	Government, state	14	26
	Government, county	3	6
	Government, city or town	10	2
	Government, unspecified	5	1
	Building and construction company (including building materials)	7	7
	Oil, drug, paint, or other chemical manufacturing company	18	15
	Public utility	17	24
	Food manufacturing or packing company	2	3
	Iron and steel manufacturing company	33	18
	Lumber or furniture manufacturing company	5	
	Metal manufacturing company (not iron and steel)	6	5
	Manufacturing company, not elsewhere classified	18	55
	Newspaper, printing, or publishing company	20	11
	Textile or clothing manufacturing company	7	6
	Coal or other mining company	1	3
	Accountant	5	1
	Architect	9	3
	Auditor	1	
	Author	3	
	Chiropractor		1
	Dentist	3	
	Doctor	58	14
	Osteopathic physician	3	
	Engineer	4	1
	Golf architect	1	
	Lawyer	74	36
	Oculist	1	
	Optometrist	1	
	Chamber of commerce or other civic organization	5	2
	Hospital, Y. W. C. A., or other health or welfare organization	5	17
	Women's or men's club or other fraternal organization	1	1
	Church or religious association	1	5

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Private secretary	Trade association	5	1
	Express company	1	1
	Transportation company, miscellaneous	1	
	Railroad	7	10
	Street railway company	1	
Secretary	Telephone company	6	4
	Unspecified	71	15
Secretary	Theater, moving picture house, or entertainment bureau	6	1
	Bank, investment company, or other financial organization	99	36
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	21	5
	Abstract company, advertising, collection or employment bureau, or office service	37	10
	Real estate or insurance company	131	53
	Retail store	112	14
	Wholesale house	42	16
	Retail and wholesale house	13	15
	Board of education	39	25
	College or university	77	38
	Normal school or teachers' college	3	1
	Private school, unspecified		5
	Professional school (law, medicine, or music)	3	
	School for handicapped	3	4
	Secondary school	13	1
	School, unspecified	15	1
	Vocational or technical school, public or private	8	4
	Educational institution, unspecified	3	
	Government, U. S.	13	5
	Government, state	44	22
	Government, county	19	6
	Government, city or town	32	10
	Government, unspecified	12	1
	Building and construction company (including building materials)	36	17
	Oil, drug, paint, or other chemical manufacturing company	51	2
	Public utility	44	20
	Food manufacturing or packing company	22	3
	Iron and steel manufacturing company	35	9
	Lumber or furniture manufacturing company	14	6
	Metal manufacturing company (not iron and steel)	18	3
	Manufacturing company, not elsewhere classified	43	27
	Newspaper, printing, or publishing company	28	7
	Textile or clothing manufacturing company	21	5
	Farm, nursery, or greenhouse	5	2
	Live stock or poultry farm	4	
	Coal or other mining company	10	2
	Dentist		1
	Doctor		5
	Engineer	2	2
	Law firm	111	75
	Chamber of commerce or other civic organization	44	7
	Hospital, Y. W. C. A., or other health or welfare organization	93	23
	Women's or men's club or other fraternal organization	20	4
	Political organization	2	
	Nurses' or other professional organization	5	1
	Church or religious association	40	17
	Trade association	31	3

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group	
Secretary	Express company	3		
	Transportation company, miscellaneous	1		
	Railroad	33	7	
	Street railway company	2		
	Telegraph company	1		
	Telephone company	5	2	
	Water transportation company	3		
Business secretary	Unspecified	222	29	
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1	
Secretary of estate			4	
Secretary and auditor	Private school		1	
Secretary, bookkeeper, and asst. office manager				
	Bank, investment company, or other financial organization		1	
Secretary and manager, collection department				
	Abstract company, advertising, collection, or employment bureau, or office service		1	
Secretary and stenographer	Bank, investment company, or other financial organization	2		
	Abstract company, advertising, collection or employment bureau, or office service	1		
	Real estate or insurance company	4		
	Retail store	3		
	Wholesale house	1		
	Building and construction company (including building materials)	2		
	Public utility	2		
	Food manufacturing or packing company	3		
	Iron and steel manufacturing company	1		
	Manufacturing company, not elsewhere classified	1		
	Law firm	14		
	Unspecified	31	1	
	Secretary and cashier	Retail store	1	
		Wholesale house	1	
		Unspecified	1	
	Secretary and other work	Bank, investment company, or other financial organization		4
		Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1
Real estate or insurance company			4	
Retail store			2	
Wholesale house			2	
College or university			1	
Government, state			1	
Government, city or town			1	
Public utility			1	
Iron and steel manufacturing company			3	
Metal manufacturing company (not iron and steel)			1	
Manufacturing company, not elsewhere classified			2	
Newspaper, printing, or publishing company			1	
Accountant			1	
Law firm			3	
Railroad			2	
Water transportation company			2	
Asst. secretary		Theater, moving picture house, or entertainment bureau	2	
		Bank, investment company, or other financial organization	29	15
		Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	2	
	Abstract company, advertising, collection or employment bureau, or office service		6	
	Real estate or insurance company	3		
		12	10	

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Asst. secretary	Wholesale house	2	2
	Retail and wholesale house		1
	Commercial company, unspecified	2	
	Board of education	1	1
	College or university	2	2
	School, unspecified	1	
	Government, U. S.	3	
	Government, state	3	3
	Government, city or town	2	
	Government, unspecified	1	
	Building and construction company (including building materials)	2	4
	Oil, drug, paint, or other chemical manufacturing company	1	2
	Public utility		1
	Food manufacturing or packing company	1	
	Iron and steel manufacturing company	1	
	Lumber or furniture manufacturing company	1	1
	Metal manufacturing company (not iron and steel)		
	Manufacturing company, not elsewhere classified	1	
	Newspaper, printing, or publishing company	3	1
	Textile or clothing manufacturing company	1	
	Live stock or poultry farm	1	
	Dentist	1	
	Engineer		1
	Chamber of commerce or other civic organization	11	26
	Hospital, Y. W. C. A., or other health or welfare organization	2	2
	Women's or men's club or other fraternal organization		1
	Trade association	4	1
Railroad	1		
Street railway company	1		
Unspecified	5	2	
Asst. secretary to governor	Government, state		1
Asst. secretary to president	Real estate or insurance company		1
	College or university		1
Asst. to president	Iron and steel manufacturing company	1	
Asst. to manager	Theater, moving picture house, or entertainment bureau	1	
	Bank, investment company, or other financial organization	1	
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
	Abstract company, advertising, collection or employment bureau, or office service	1	
	School, unspecified		2
	Building and construction company (including building materials)	1	
	Food manufacturing or packing company		1
	Telephone company	1	
Asst. to secretary	Real estate or insurance company	2	
	College or university	1	
	Chamber of commerce or other civic organization	1	
	Trade association	1	
Asst. to official	Bank, investment company, or other financial organization		1
	Real estate or insurance company		1
	Retail store		2
	Wholesale house		1
	Board of education		2
	Oil, drug, paint, or other chemical manufacturing company		1

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Asst. to official	Food manufacturing or packing company		1
	Iron and steel manufacturing company		1
	Manufacturing company, not elsewhere classified		1
	Newspaper, printing, or publishing company		2
	Chamber of commerce or other civic organization		1
	Hospital, Y. W. C. A., or other health or welfare organization		1
	Telephone company		1
Asst. to commercial agent	Railroad		1
Asst. to supt. of schools	Board of education	1	
Asst. to registrar and treasurer	School, unspecified		1
Asst. to auditor	Government, county	2	
Asst. to collector	Government, U. S.	1	
Abstractor	Bank, investment company, or other financial organization		3
	Abstract company	32	46
	Real estate company	3	
	Government, U. S.	1	
	Law firm	1	
Asst. abstractor	Unspecified	2	
	Abstract company		1
Corresponding secretary	Chamber of commerce or other civic organization		1
	Bank, investment company, or other financial organization	1	
	Unspecified	4	1
Correspondent	Bank, investment company, or other financial organization	1	
	Real estate or insurance company	1	2
	Retail store	3	
	Retail and wholesale house		1
Sales correspondent	Oil, drug, paint, or other chemical manufacturing company	1	
Policy writer	Insurance company	1	
Copyist	Government, county		2
Copyist and examiner	Retail store		2
	Wholesale house		1
	Oil, drug, paint, or other chemical manufacturing company		1
	Iron and steel manufacturing company		1
	Manufacturing company, not elsewhere classified		1
	Textile or clothing manufacturing company		1
Examiner	Real estate or insurance company		6
	Manufacturing company, not elsewhere classified		1
	Government, city or town		1
Copyist and proofreader	Unspecified	3	
	Public utility		1
Addressograph operator	Public utility		1
Billing machine operator	Metal manufacturing company (not iron and steel)		1
	Railroad		5
Bookkeeping machine operator	Real estate or insurance company	1	
	Retail store		2
	Food manufacturing or packing company		1
Comptometer operator	Bank, investment company, or other financial organization	3	
	Retail store	2	1
	Wholesale house	1	
	Oil, drug, paint, or other chemical manufacturing company		1
	Retail and wholesale house	2	4
	Iron and steel manufacturing company	1	
	Iron and steel manufacturing company	3	

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Comptometer operator	Metal manufacturing company (not iron and steel)	2	
	Manufacturing company, not elsewhere classified		2
	Newspaper, printing, or publishing company	1	
	Railroad	9	
Dictaphone operator	Unspecified	7	
	Real estate or insurance company	1	
	Vocational or technical school	1	
	Manufacturing company, not elsewhere classified		2
Ediphone operator	Unspecified		5
	Oil, drug, paint, or other chemical manufacturing company		1
Multigraph operator	Bank, investment company, or other financial organization		1
	Real estate or insurance company	1	
	College or university	1	
	Food manufacturing or packing company	1	
	Iron and steel manufacturing company	1	
Bookkeeper	Unspecified	1	
	Theater, moving picture house, or entertainment bureau	3	
	Bank, investment company, or other financial organization	480	113
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	166	16
	Abstract company, advertising, collection or employment bureau, or office service	27	8
	Real estate or insurance company	168	38
	Retail store	1,316	202
	Wholesale house	172	66
	Retail and wholesale house	70	24
	Board of education	5	3
	College or university	16	4
	Public school, elementary	1	
	Normal school or teachers' college	1	1
	Private school		1
	Professional school (law, medicine, or music)	1	
	Public school, secondary	1	
	Vocational or technical school		
	Government, U. S.	5	2
	Government, state	15	5
	Government, county	29	9
	Government, city or town	23	9
	Government, unspecified	5	
	Building and construction company (including building materials)	67	14
	Oil, drug, paint, or other chemical manufacturing company	32	9
	Public utility	183	32
	Food manufacturing or packing company	143	25
	Iron and steel manufacturing company	88	15
	Lumber or furniture manufacturing company	27	18
	Metal manufacturing company (not iron and steel)	16	5
	Manufacturing company, not elsewhere classified	58	28
	Newspaper, printing, or publishing company	121	34
	Textile or clothing manufacturing company	54	10
	Farm, nursery, or greenhouse	12	3
	Live stock or poultry farm	8	1
	Coal or other mining company	11	3
	Auditor		1
	Dentist	4	1
	Doctor	38	7
	Engineer		4

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group	
Bookkeeper	Interior decorator	3		
	Law firm	1	1	
	Lawyer	1		
	Oculist	1	1	
	Private medical clinic	2		
	Chamber of commerce or other civic organization	1	1	
	Hospital, Y. W. C. A., or other health or welfare organization	54	8	
	Women's or men's club or other fraternal organization	4		
	Political organization	1		
	Nurses' or other professional organization	1		
	Church or religious association	1		
	Trade association	14		
	Express company	2		
	Railroad	12	6	
	Transportation company, miscellaneous		1	
	Street railway company	1		
	Taxicab or transfer and trucking company	12	2	
	Telephone company	5	1	
	Telephone company	74	6	
	Water transportation company	1		
Unspecified	449	46		
Bookkeeper and manager	Real estate or insurance company	1		
	Wholesale house	1		
Bookkeeper and proofreader	Unspecified	1		
	Newspaper, printing, or publishing company	2		
Bookkeeper and secretary	Real estate or insurance company		2	
	Retail store	1	1	
	Retail and wholesale house		5	
	Hospital, Y. W. C. A., or other health or welfare organization		4	
	Unspecified		1	
Bookkeeper and asst. secretary	Theater, moving picture house, or entertainment bureau		1	
	Bank, investment company, or other financial organization		1	
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1	
	Real estate or insurance company		1	
	Retail store		5	
	Wholesale house		3	
	Oil, drug, paint, or other chemical manufacturing company		1	
	Public utility		1	
	Food manufacturing or packing company	1	1	
	Manufacturing company, not elsewhere classified	2		
	Newspaper, printing, or publishing company		1	
	Coal or other mining company		1	
	Doctor	1	1	
	Law firm	1	2	
	Unspecified		1	
	Bookkeeper and cashier	Bank, investment company, or other financial organization	6	
		Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	2	1
		Abstract company, advertising, collection or employment bureau, or office service		1
		Real estate or insurance company	3	13
		Retail store	37	65
Wholesale house		4	3	
Retail and wholesale house		2	2	
Building and construction company (including building materials)			2	
Public utility		8	13	
Food manufacturing or packing company		2	1	

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group	
Bookkeeper and cashier	Iron and steel manufacturing company		1	
	Lumber or furniture manufacturing company	1	1	
	Metal manufacturing company (not iron and steel)	1	2	
	Manufacturing company, not elsewhere classified	1	6	
	Newspaper, printing, or publishing company	2	7	
	Railroad		1	
	Textile or clothing manufacturing company		3	
	Hospital, Y. W. C. A., or other health or welfare organization		2	
	Taxicab or transfer and trucking company		1	
	Telephone company		1	
Bookkeeper and asst. cashier	Unspecified		4	
	Bank, investment company, or other financial organization		10	
Bookkeeper and clerk	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		3	
	Real estate or insurance company	1		
	Retail store	2		
	Wholesale house	20	3	
	Government, city or town		1	
	Oil, drug, paint, or other chemical manufacturing company		1	
	Public utility	1		
	Food manufacturing or packing company	1		
	Newspaper, printing, or publishing company	2	1	
	Railroad	3		
	Taxicab or transfer and trucking company	1		
	Telephone company	1		
	Bookkeeper and stenographer	Theater, moving picture house, or entertainment bureau		1
		Bank, investment company, or other financial organization	21	48
		Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	4	5
Abstract company, advertising, collection or employment bureau, or office service		3	7	
Real estate or insurance company		44	84	
Retail store		86	115	
Wholesale house		26	47	
Retail and wholesale house		7	33	
College or university		1	3	
Private school			1	
Public school, secondary		1		
School, unspecified		2	1	
Vocational or technical school			1	
Government, U. S.			5	
Government, state			6	
Government, county		3	7	
Government, city or town		2	5	
Government, unspecified		2		
Building and construction company (including building materials)		5	23	
Oil, drug, paint, or other chemical manufacturing company		2	8	
Public utility		6	13	
Food manufacturing or packing company		16	19	
Iron and steel manufacturing company		5	5	
Lumber or furniture manufacturing company		8	7	
Metal manufacturing company (not iron and steel)		1	2	
Manufacturing company, not elsewhere classified		9	11	
Newspaper, printing, or publishing company		9	5	
Textile or clothing manufacturing company	5	3		

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Bookkeeper and stenographer	Farm, nursery, or greenhouse		2
	Live stock or poultry farm		1
	Accountant		2
	Doctor		7
	Engineer		2
	Law firm	18	32
	Chamber of commerce or other civic organization	1	1
	Hospital, Y. W. C. A., or other health or welfare organization	4	6
	Women's or men's club, or other fraternal organization	1	1
	Church or religious association		2
	Trade association	4	
	Railroad		4
	Telephone company		4
Unspecified		26	31
Bookkeeper and general office work	Bank, investment company, or other financial organization		4
	Real estate or insurance company		7
	Retail store		12
	Wholesale house		7
	Retail and wholesale house		1
	College or university		1
	Government, state		1
	Government, county		2
	Government, city or town		1
	Lumber or furniture manufacturing company		1
	Manufacturing company, not elsewhere classified		4
	Doctor		1
	Women's or men's club, or other fraternal organization		1
	Unspecified		8
Bookkeeper and abstractor	Abstract company		1
	Law firm		1
Bookkeeper and collector	Bank, investment company, or other financial organization		1
	Real estate or insurance company		2
	Government, city or town		1
	Building and construction company (including building materials)		1
	Public utility		1
Unspecified		1	
Bookkeeper and sales clerk	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1
	Real estate or insurance company		1
	Retail store		23
	Wholesale house		2
Bookkeeper and designer	Iron and steel manufacturing company		1
	Retail store		1
Bookkeeper and non-clerical work, not elsewhere classified	Retail store		2
	Wholesale house		2
	Iron and steel manufacturing company		2
	Manufacturing company, not elsewhere classified		1
Bookkeeper and operative	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1
Bookkeeper and optician	Retail store		1
Bookkeeper and typist	Bank, investment company, or other financial organization		1
	Real estate or insurance company		3
	Retail store		1
	Wholesale house		2

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group	
Bookkeeper and typist	Retail and wholesale house		1	
	Private school		1	
	Public utility		2	
	Food manufacturing or packing company ..		1	
	Manufacturing company, not elsewhere clas- sified		2	
	Newspaper, printing, or publishing company		1	
Asst. bookkeeper	Unspecified		1	
	Bank, investment company, or other financial organization	2	5	
	Abstract company, advertising, collection or employment bureau, or office service	2		
	Real estate or insurance company		2	
	Retail store	3	2	
	Wholesale house	2	3	
	Retail and wholesale house	1	1	
	Government, U. S.		1	
	Government, state	1		
	Oil, drug, paint, or other chemical manu- facturing company	1		
	Public utility	1	1	
	Food manufacturing or packing company ..	2	5	
	Manufacturing company, not elsewhere clas- sified	4	3	
	Newspaper, printing, or publishing company	1		
	Textile or clothing manufacturing company..	1	1	
	Law firm	1		
Asst. bookkeeper and clerk	Hospital, Y. W. C. A., or other health or welfare organization	1		
	Railroad	1		
	Telephone company		1	
	Unspecified		3	
	Wholesale house		1	
	Asst. bookkeeper and bill clerk...	Retail and wholesale house	1	
		Telegraph company		1
	Asst. bookkeeper and cashier ...	Retail store	1	2
		Retail and wholesale house		1
	Asst. bookkeeper and stenographer	Manufacturing company, not elsewhere clas- sified		1
Retail store		1	2	
Wholesale house		1		
Retail and wholesale house			1	
Food manufacturing or packing company ..			1	
Iron and steel manufacturing company			1	
Coal or other mining company			1	
Chamber of commerce or other civic organi- zation			1	
Stenographer and asst. cashier...	Bank, investment company, or other financial organization		1	
	Real estate or insurance company		1	
	Retail store		2	
Public stenographer	Public stenographic office	190		
Public stenographer and notary public	Public stenographic office	3		
	Stenographer	Theater, moving picture house, or entertain- ment bureau	7	3
Bank, investment company, or other financial organization		346	110	
Hotel, restaurant, beauty shop, laundry, mor- tician, or other living or personal service		13	6	
Abstract company, advertising, collection or employment bureau, or office service		78	38	
Real estate or insurance company		418	95	
Retail store		324	35	
Wholesale house		133	57	
Retail and wholesale house		55	25	

MICHIGAN BUSINESS STUDIES

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Stenographer	Board of education	25	3
	College or university	56	24
	Normal school or teachers' college	2	2
	School for handicapped	1	
	Secondary school, public	7	1
	School, unspecified	10	
	Vocational or technical school	4	
	Government, U. S.	51	12
	Government, state	73	24
	Government, county	100	16
	Government, city or town	50	12
	Government, unspecified	61	7
	Building and construction company (including building materials)	59	12
	Oil, drug, paint, or other chemical manufacturing company	80	21
	Public utility	145	34
	Food manufacturing or packing company	87	26
	Iron and steel manufacturing company	110	34
	Lumber or furniture manufacturing company	53	20
	Metal manufacturing company (not iron and steel)	39	5
	Manufacturing company, not elsewhere classified	123	55
	Newspaper, printing, or publishing company	70	12
	Textile or clothing manufacturing company	55	12
	Farm, nursery, or greenhouse	12	1
	Live stock or poultry farm	5	
	Coal or other mining company	19	3
	Accountant	3	1
	Architect	2	1
	Dentist	1	
	Doctor	21	1
	Engineer	6	3
	Law firm	530	198
	Veterinary	1	
	Chamber of commerce or other civic organization	31	7
	Hospital, Y. W. C. A., or other health or welfare organization	41	4
	Women's or men's club or other fraternal organization	12	1
	Political organization	1	1
	Church or religious association	2	1
	Trade association	19	5
	Express company	5	
	Transportation company, miscellaneous	1	1
	Railroad	198	56
	Street railway company	10	
	Taxicab or transfer and trucking company	7	2
	Telegraph company	5	
	Telephone company	22	8
	Water transportation company	1	
	Unspecified	634	42
Stenographer and abstractor	Abstract company	4	1
Stenographer and cashier	Bank, investment company, or other financial organization		1
	Real estate or insurance company		5
	Retail store	2	2
	Oil, drug, paint, or other chemical manufacturing company		2
	Public utility		1
	Railroad		1
	Telephone company	1	
	Unspecified	1	
Stenographer and clerk	Bank, investment company, or other financial organization	12	20

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Stenographer and clerk	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
	Abstract company, advertising, collection or employment bureau, or office service	2	1
	Real estate or insurance company	4	11
	Retail store	9	3
	Wholesale house	4	
	Retail and wholesale house	1	5
	Board of education	1	2
	College or university	1	2
	Secondary school, public	1	
	School, unspecified		1
	Government, U. S.	5	12
	Government, state	5	5
	Government, county	3	4
	Government, city or town	4	1
	Government, unspecified	4	1
	Building and construction company (including building materials)		3
	Oil, drug, paint, or other chemical manufacturing company	5	5
	Public utility	4	2
	Food manufacturing or packing company	1	1
	Iron and steel manufacturing company	1	3
	Lumber or furniture manufacturing company		1
	Metal manufacturing company (not iron and steel)	1	2
	Manufacturing company, not elsewhere classified	1	13
	Newspaper, printing, or publishing company	2	2
	Textile or clothing manufacturing company		6
	Law firm	2	1
	Hospital, Y. W. C. A., or other health or welfare organization	1	
	Women's or men's club or other fraternal organization	1	1
	Railroad	12	26
	Street railway company	2	
	Telephone company	1	
	Unspecified	5	7
	Stenographer and biller	Wholesale house		4
Building and construction company (including building materials)		1	
Stenographer and clerical work, not elsewhere classified	Food manufacturing or packing company		1
	Government, unspecified		1
Stenographer and shipping clerk	Oil, drug, paint, or other chemical manufacturing company		1
	Building and construction company (including building materials)		1
Stenographer and court reporter	Government, U. S.		1
	Law firm		1
Stenographer and sales clerk	Real estate or insurance company		2
	Retail store		1
Stenographer and miscellaneous sales work	Retail store		1
Stenographer and asst. in sales department	Food manufacturing or packing company		1
Stenographer and miscellaneous non-clerical work	Bank, investment company, or other financial organization		1
	Real estate or insurance company		1
	Retail store		1
Stenographer and undertaker's asst.	Mortician		2

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Typist	Bank, investment company, or other financial organization	2	1
	Abstract company, advertising, collection or employment bureau, or office service	9	3
	Real estate or insurance company	4	3
	Wholesale house		1
	Board of education		1
	Government, U. S.	1	
	Government, state	2	
	Government, county	4	3
	Government, city or town	1	
	Government, unspecified		1
	Building and construction company (including building materials)		2
	Oil, drug, paint, or other chemical manufacturing company	4	1
	Public utility		2
	Food manufacturing or packing company	1	1
	Iron and steel manufacturing company	1	2
	Lumber or furniture manufacturing company	2	
	Metal manufacturing company (not iron and steel)		1
	Manufacturing company, not elsewhere classified	1	1
	Newspaper, printing, or publishing company	2	
	Textile or clothing manufacturing company	2	
	Law firm	1	
	Church or religious association	1	
	Street railway company	1	
Unspecified		10	
Typist and file clerk	Real estate or insurance company		1
	Manufacturing company, not elsewhere classified		1
Typist and genealogist	Church or religious association		1
Clerk	Theater, moving picture house, or entertainment bureau	5	
	Bank, investment company, or other financial organization	246	58
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	34	2
	Abstract company, advertising, collection or employment bureau, or office service	25	6
	Real estate or insurance company	127	32
	Retail store	163	18
	Wholesale house	33	10
	Retail and wholesale house	7	5
	Board of education	20	8
	College or university	23	4
	Normal school or teachers' college		1
	Secondary school, public	4	
	School, unspecified	5	1
	Educational institution, unspecified		1
	Government, U. S.	34	23
	Government, state	72	10
	Government, county	131	34
	Government, city or town	51	11
	Government, unspecified	68	1
	Building and construction company (including building materials)	4	1
	Oil, drug, paint, or other chemical manufacturing company	21	7
	Public utility	109	14
	Food manufacturing or packing company	22	10
	Iron and steel manufacturing company	35	3
	Lumber or furniture manufacturing company	9	2
	Metal manufacturing company (not iron and steel)	18	2

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group	
Clerk	Manufacturing company, not elsewhere classified	46	16	
	Newspaper, printing, or publishing company	65	12	
	Textile or clothing manufacturing company	26	10	
	Farm, nursery, or greenhouse	4	1	
	Coal or other mining company	3		
	Accountant		1	
	Architect	1	1	
	Dentist	6		
	Doctor	26		
	Engineer		1	
	Law firm	22	2	
	Optometrist	3		
	Chamber of commerce or other civic organization	3		
	Hospital, Y. W. C. A., or other health or welfare organization	23	7	
	Women's or men's club or other fraternal organization	9		
	Church or religious association	1	1	
	Trade association	7	1	
	Express company	5	1	
	Transportation company, miscellaneous	1		
	Railroad	140	28	
	Street railway company	5		
	Taxicab or transfer and trucking company	4		
	Telegraph company	6	1	
Telephone company	33	4		
Clerk, abstract	Unspecified	192	21	
	Government, U. S.	1		
Clerk, bill	Government, city or town	1		
	Railroad	1	8	
Clerk, bill	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1		
	Retail store	7	1	
	Wholesale house	6	9	
	Retail and wholesale house		1	
	Government, U. S.	1		
	Building and construction company (including building materials)		1	
	Oil, drug, paint, or other chemical manufacturing company	2	2	
	Public utility	3	1	
	Food manufacturing or packing company	1		
	Iron and steel manufacturing company	2	1	
	Lumber or furniture manufacturing company	2	1	
	Metal manufacturing company (not iron and steel)	2		
	Manufacturing company, not elsewhere classified	5	2	
	Newspaper, printing, or publishing company	2	1	
	Textile or clothing manufacturing company	1	1	
	Railroad	3	5	
	Telephone company	1		
	Clerk, cost	Unspecified	2	3
		Retail store	1	1
		Wholesale house	1	4
Clerk, complaint	Building and construction company (including building materials)		1	
	Lumber or furniture manufacturing company	1	1	
Clerk, file	Public utility		3	
	Bank, investment company, or other financial organization	3	3	
Clerk, file	Abstract company, advertising, collection or employment bureau, or office service	1		
	Real estate or insurance company	3	1	
	Retail store	2		

MICHIGAN BUSINESS STUDIES

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Clerk, file	Wholesale house	1	
	College or university	1	1
	Government, U. S.	1	
	Government, state	3	3
	Government, county	1	
	Oil, drug, paint, or other chemical manufacturing company	1	
	Public utility	6	
	Iron and steel manufacturing company	2	1
	Lumber or furniture manufacturing company	3	
	Metal manufacturing company (not iron and steel)	1	
	Manufacturing company, not elsewhere classified	3	
	Textile or clothing manufacturing company	1	
	Law firm	1	
	Hospital, Y. W. C. A., or other health or welfare organization	1	
	Trade association	2	
	Railroad	2	
	Telephone company	1	
	Unspecified	8	3
	Railroad	3	
Clerk, freight	Railroad	3	
	Railroad	3	
Clerk, invoice	Building and construction company (including building materials)	1	
	Oil, drug, paint, or other chemical manufacturing company	1	1
	Food manufacturing or packing company	1	
	Iron and steel manufacturing company	1	1
	Manufacturing company, not elsewhere classified	1	1
	Newspaper, printing, or publishing company	1	1
	Textile or clothing manufacturing company	1	
	Lumber or furniture manufacturing company	1	
	Metal manufacturing company (not iron and steel)	1	
	Manufacturing company, not elsewhere classified	2	
Textile or clothing manufacturing company	2		
Clerk, order	Oil, drug, paint, or other chemical manufacturing company	1	
	Public utility	2	
	Lumber or furniture manufacturing company	2	
Clerk, payroll	Manufacturing company, not elsewhere classified	1	2
	Textile or clothing manufacturing company	2	1
	Unspecified	1	
	Government, U. S.	179	20
Clerk, postoffice Clerk, special, not elsewhere classified	Bank, investment company, or other financial organization	2	8
	Abstract company, advertising, collection or employment bureau, or office service	1	8
	Real estate or insurance company	1	8
	Retail store	1	18
	Wholesale house	1	2
	Government, county	1	3
	Oil, drug, paint, or other chemical manufacturing company	1	2
	Public utility	1	2
	Food manufacturing or packing company	1	1
	Iron and steel manufacturing company	1	1
	Lumber or furniture manufacturing company	1	1
	Metal manufacturing company (not iron and steel)	1	2
	Manufacturing company, not elsewhere classified	1	1

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Clerk, special, not elsewhere classified	Newspaper, printing, or publishing company		1
	Farm, nursery, or greenhouse		1
	Coal or other mining company		3
Clerk, statistical	Railroad	2	
	Telephone company	1	4
	Unspecified		6
	Real estate or insurance company	1	
	Retail store	1	
	College or university	2	2
	Government, U. S.		2
	Government, state	1	1
	Government, city or town	1	1
	Oil, drug, paint, or other chemical manufacturing company	1	1
Clerk, voucher	Public utility	4	
	Metal manufacturing company (not iron and steel)		1
	Telegraph company	1	
	Unspecified		1
	Retail and wholesale house		1
	College or university	1	
	Government, state	1	
	Oil, drug, paint, or other chemical manufacturing company	1	
	Public utility	1	
	Clerk and typist	Abstract company, advertising, collection or employment bureau, or office service		1
Retail store			1
Government, state			1
Oil, drug, paint, or other chemical manufacturing company			1
Government, state		2	
Asst. clerk	Government, county	6	
	Government, city or town	7	
	Government, unspecified	2	
	Engineer		1
Asst. clerk, shipping	Wholesale house		1
Cashier	Theater, moving picture house, or entertainment bureau	8	2
	Financial organization (not bank)	15	6
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	19	3
	Abstract company, advertising, collection or employment bureau, or office service	1	10
	Real estate or insurance company		21
	Retail store	118	20
	Wholesale house	12	9
	Retail and wholesale house	2	4
	College or university	3	1
	Government, U. S.	1	
	Government, state	6	2
	Government, county		1
	Government, city or town	4	2
	Government, unspecified	2	
	Building and construction company (including building materials)	3	
	Oil, drug, paint, or other chemical manufacturing company	1	1
	Public utility	66	13
	Food manufacturing or packing company	14	1
	Iron and steel manufacturing company	5	2
	Lumber or furniture manufacturing company		1
	Metal manufacturing company (not iron and steel)	1	1
	Manufacturing company, not elsewhere classified	2	
	Newspaper, printing, or publishing company	7	1

CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Reporting Group	
Cashier	Accountant	1		
	Hospital, Y. W. C. A., or other health or welfare organization		1	
	Women's or men's club or other fraternal organization	2		
	Express company	2	1	
	Railroad	10	4	
	Street railway company	2		
	Taxicab or transfer and trucking company	1		
	Telegraph company	3		
	Telephone company	16	22	
	Unspecified	30	7	
Cashier and timekeeper	Newspaper		1	
Asst. cashier	Financial organization (not bank)	3		
	Real estate or insurance company	2	4	
	Retail store	3	4	
	Government, state	1		
	Oil, drug, paint, or other chemical manufacturing company		1	
	Public utility	9	3	
	Metal manufacturing company (not iron and steel)		1	
	Manufacturing company, not elsewhere classified	1		
	Railroad	1	1	
	Street railway company	1	1	
	Unspecified	2	1	
	Asst. cashier and accountant	Financial organization (not bank)		1
	Asst. abstractor	Abstract company	2	
Historian	Oil, drug, paint, or other chemical manufacturing company	1		
Office assistant	Government, county		1	
	Building and construction company (including building materials)		1	
	Public utility		1	
	Accountant	1		
Reader	Chemist	1		
Cataloguer and mounter	Clipping bureau	1	1	
	Retail store		2	
Checker	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1	
	Trade association		1	
Brand recorder	Government, state		1	
Recorder	Government, county	1		
Asst. recorder	Government, county	1		
Receptionist	Retail store	1		
	Commercial, unspecified	1		
Registrar	Abstract company, advertising, collection or employment bureau, or office service	3		
	Government, state	1		
	Government, unspecified		1	
	Hospital, Y. W. C. A., or other health or welfare organization	3	4	
	Trade association	2		
	Unspecified		1	
Cataloguer	Iron and steel manufacturing company	1		
Coder	Government, state	1		
Meter reader	Public utility	1		
Timekeeper	Iron and steel manufacturing company	3		
	Lumber or furniture manufacturing company	1		
	Manufacturing company, not elsewhere classified		2	
	Newspaper, printing, or publishing company		1	
	Textile or clothing manufacturing company	2		
	Express company		1	
	Railroad	10		
Asst. timekeeper	Railroad		6	

EARNINGS OF WOMEN

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CLERICAL, continued

Occupation	Employer	Number in Federation	Number in Federation Group
Switchboard operator	Bank, investment company, or other financial organization	4	1
	Abstract company, advertising, collection or employment bureau, or office service		1
	Retail store	3	1
	Wholesale house	1	
	Government, state	3	
	Oil, drug, paint, or other chemical manufacturing company	1	
	Public utility	3	
	Iron and steel manufacturing company	1	
	Manufacturing company, not elsewhere classified	2	1
	Newspaper, printing, or publishing company		1
	Textile or clothing manufacturing company	2	
	Farm, nursery, or greenhouse	1	
	Doctor	1	
	Hospital, Y. W. C. A., or other health or welfare organization	1	1
	Railroad	3	
Unspecified	1	1	
File clerk and switchboard operator	Manufacturing company, not elsewhere classified		1
Telegraph operator	Bank, investment company, or other financial organization	1	1
	Iron and steel manufacturing company	3	1
	Lumber or furniture manufacturing company	2	1
	Manufacturing company, not elsewhere classified	1	
Unspecified clerical work	Newspaper, printing, or publishing company	1	
	Retail store		1
	Normal school or teachers' college		1
	Manufacturing company, not elsewhere classified		1
	Unspecified		7
Group total		15,674	5,862

TEACHING

Alumnae secretary	College or university		1
Secretary	College or university	1	1
Asst. secretary	College or university	1	1
Registrar	College or university	8	5
Asst. registrar	College or university	10	4
Recorder	College or university	2	
Asst. recorder of faculties	College or university	1	
Organizer	College or university	1	
Field secretary	College or university	1	
Executive secretary	College or university	4	
Dean of college	College or university	1	1
Dean of women	College or university	16	6
Dean of women and professor	College or university		4
Dean of women and assoc. professor	College or university		1
Dean of women and instructor	College or university		2
Asst. dean of women	College or university	1	
Director of home economics	College or university	1	
Director of music	College or university	1	
Director of physical education	College or university	3	
Department head	College or university	5	
Asst. director of home economics	College or university	1	
Professor and dean	College or university	1	1

TEACHING, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
President, extension division	College or university	1	
Professor	College or university	11	19
Associate professor	College or university	4	6
Asst. professor	College or university	11	15
Teacher	College or university	122	19
Critic teacher	College or university		1
Lecturer	College or university	1	
Departmental asst.	College or university	1	
Extension service worker	College or university	3	
Unspecified	College or university		6
Superintendent and principal, teachers' training	Normal school or teachers' college	2	
Principal	Normal school or teachers' college	1	1
Registrar	Normal school or teachers' college	2	1
Asst. secretary	Normal school or teachers' college		1
Asst. state director of special education	Normal school or teachers' college	1	
Dean of women	Normal school or teachers' college	7	5
Dean of women and teacher	Normal school or teachers' college	1	1
Director of rural education	Normal school or teachers' college	1	
Director of teachers' training	Normal school or teachers' college	1	
Supervisor, asst. supervisor, or asst. principal	Normal school or teachers' college		4
Supervisor	Normal school or teachers' college		3
Director of music	Normal school or teachers' college	1	
Director of physical education	Normal school or teachers' college	3	
Department head	Normal school or teachers' college	10	
Department head and professor	Normal school or teachers' college		8
Asst. professor	Normal school or teachers' college	6	5
Instructor	Normal school or teachers' college	61	37
Teacher and cafeteria manager	Normal school or teachers' college		1
Critic teacher	Normal school or teachers' college	26	12
Asst. instructor	Normal school or teachers' college		2
Departmental asst.	Normal school or teachers' college	3	
Extension service worker	Normal school or teachers' college	1	
Supervisor of department, elementary schools	Board of education	43	43
Supervisor of department, secondary schools	Board of education	12	
Director of department, elementary schools	Board of education		2
Director of dramatic art, secondary schools	Board of education	1	
Director of music, secondary schools	Board of education	1	
Director of physical education, elementary schools	Board of education		1
Director of physical education, secondary schools	Board of education	4	39
Director of vocational guidance, secondary schools	Board of education	1	1
Supervisor of attendance	Board of education, city		1
Counselor, elementary schools	Board of education	1	
Counselor, secondary schools	Board of education	2	
Counselor, schools unspecified	Board of education	1	
Examiner, committee on education	Board of education		1
Principal	Elementary school	171	174
	Secondary school	29	35
Principal and teacher	Elementary school	27	
	Secondary school	1	
Asst. principal	Elementary school	2	1
	Secondary school	14	12
Dean of girls	Secondary school	14	13
Registrar	Elementary school	1	1
	Secondary school	2	4

EARNINGS OF WOMEN

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TEACHING, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Asst. registrar or executive secretary	Elementary school		2
State superintendent of schools		3	2
State supervisor of high schools			1
State supervisor of rural schools			1
State supervisor		1	1
Director, special schools for deaf and blind	State dept. of education		1
Commissioner of schools	Board of education, county		5
	Board of education, city or town	2	
County superintendent of schools		79	42
Asst. county superintendent of schools		10	13
Director of special classes	Board of education, county		1
Director of elementary schools	Board of education, county	1	
Supervisor	Board of education, county		3
Member	Board of education, county	1	1
Chairman	Board of education, city	2	
Member	Board of education, city	3	
Superintendent of elementary schools	Board of education	2	
City superintendent of schools			1
Asst. city superintendent of schools		13	6
Director of exceptional schools		1	1
Executive secretary	Board of education	1	
Supervisor of elementary schools	Board of education	18	6
Supervisor of high schools	Board of education	3	
Asst. supervisor of elementary schools	Board of education	2	
Asst. supervisor, school unspecified	Board of education	2	
Department head	Elementary school	1	
	Secondary school	5	
Teacher and dept. head	Secondary school		31
Supervising teacher	Elementary school		2
	Secondary school		
Head teacher	Elementary school	1	
	Secondary school	1	
Teacher	Elementary school	2,177	961
	Secondary school	1,421	669
Teacher and cafeteria manager	Secondary school		10
Critic teacher	Elementary school		1
Asst. teacher	Elementary school	1	2
	Secondary school		2
Study hall keeper	Secondary school	1	
Substitute teacher	Elementary school	4	
	Secondary school	6	1
Proprietor	Elementary school, private	2	1
	Secondary school, private		1
	School, unspecified, private	4	
Principal	Secondary school, private		1
	School, unspecified, private		5
Business manager	Secondary school, private	2	1
Secretary	Secondary school, private		1
Registrar	Military school		1
Department head	Secondary school, private		2
Supervising teacher	University high school		1
Professor	School, unspecified, private		1
Teacher	Secondary school, private		2
	School, unspecified, private		4
Teacher and department head	Secondary school, private		1
Asst. teacher	School, unspecified, private		1
Proprietor	Professional school	5	2
Director	Professional school	3	
Director and teacher	Professional school	1	
Manager	Professional school	1	

TEACHING, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Principal	Professional school	1	3
Principal and teacher	Professional school	1	
Asst. principal	Professional school	1	1
Dean	Professional school		1
Registrar	Professional school		1
Secretary and teacher	Professional school	1	
Director of music	Professional school	2	
Teacher	Professional school	21	13
Proprietor	Technical or vocational school	25	11
Partner	Technical or vocational school	3	
President	Technical or vocational school	3	2
Vice-president	Technical or vocational school	1	
Vice-president and secretary	Technical or vocational school	1	
Secretary	Technical or vocational school	1	
Superintendent	Technical or vocational school	1	
Manager	Technical or vocational school	6	3
Promoter	Technical or vocational school		1
Asst. manager	Technical or vocational school	2	
Business manager	Technical or vocational school	1	
Principal	Technical or vocational school	9	6
Asst. principal	Technical or vocational school	1	
Supervisor	Technical or vocational school	2	1
Dean of women	Technical or vocational school	1	
Vocational guidance director	Technical or vocational school	1	1
Registrar	Technical or vocational school		1
Department head	Technical or vocational school	2	5
Teacher	Technical or vocational school	13	32
Disciplinarian	Technical or vocational school	1	
Asst. to manager	Technical or vocational school	1	
Superintendent	School for handicapped	4	3
Principal	School for handicapped	6	3
Supervisor	School for handicapped	1	1
Director of educational activities	School for handicapped		1
Director of physical education	School for handicapped	1	
Department head	School for handicapped	1	
Teacher	School for handicapped	4	23
Educational director	Retail store	4	3
	Manufacturing company, not elsewhere classified		1
	Textile or clothing manufacturing company		1
Manager of training school	Telephone company	1	
Director of domestic science	Food manufacturing or packing company	1	
Director of physical education	Club, social or recreational	1	
Teacher	Real estate or insurance company		1
	Retail store	6	3
	Food manufacturing or packing company	1	
	Iron and steel manufacturing company	2	1
	Manufacturing company, not elsewhere classified	2	
	Textile or clothing manufacturing company	1	
	Telephone company	11	4
Parliamentarian	Service bureau	1	
Director of music	Musical organization		1
Choral director	Musical organization	2	
Director of home economics	Hospital, Y. W. C. A., or other health or welfare organization	1	
Director of physical education	Y. W. C. A.	4	1
Director of religious education	Church or religious association	4	4
Asst. physical director	Y. W. C. A.	1	
Superintendent training school department	Y. W. C. A. or other welfare organization	1	
Instructor of nurses	Hospital or other health organization	10	
Instructor, religious	Unspecified	1	
Teacher	Government, U. S.		1
Instructor	Hospital, Y. W. C. A., or other health or welfare organization	10	4
	Church or religious association	1	1

EARNINGS OF WOMEN

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TEACHING, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Lecturer	Chautauque		2
Asst. teacher	Hospital, Y. W. C. A., or other health or welfare organization		
Teacher	Private lessons	502	102
Tutor	Private lessons	6	4
Unspecified	Private lessons		2
President	School, unspecified	1	
President and principal	School, unspecified	1	
Superintendent	School, unspecified	3	
Superintendent fresh air school	Unspecified	1	
Director	School, unspecified		1
Asst. superintendent	School, unspecified	1	
Principal	School, unspecified	99	7
Principal and teacher	School, unspecified	9	
Asst. principal	School, unspecified	4	
Asst. manager	School, unspecified	1	
Dean	School, unspecified	1	
Dean of girls	School, unspecified	3	
Educational director	School, unspecified	3	1
Director of extra curricular activities	School, unspecified		2
Supervisor	School, unspecified	5	52
Registrar	School, unspecified	1	
Asst. registrar or executive secretary	School, unspecified		2
Attendance officer and voca- tional director	School, unspecified	1	
Department head	School, unspecified	62	
Director of dramatic art	School, unspecified	3	
Director of music	School, unspecified	2	
Director of physical education	School, unspecified	5	
Director of vocational guid- ance in schools	School, unspecified	1	
Asst. director of physical edu- cation	School, unspecified	1	
Asst. director of vocational training	School, unspecified	1	
Supervising teacher	School, unspecified		1
Teacher and department head	School, unspecified		1
Teacher	School, unspecified	895	77
	Educational institution, unspecified	339	2
Lecturer	School, unspecified	1	
Extension worker	School, unspecified		1
Visiting teacher	School, unspecified	1	
Substitute teacher	School, unspecified	6	9
Teacher and stenographer	School, unspecified	1	
Departmental asst.	School, unspecified	1	
Educator	Educational institution, unspecified	7	
Group total		6,760	2,689

SALES

Proprietor	Theater, moving picture house, or entertain- ment bureau	1	
	Abstract company, advertising, collection or employment bureau, or office service	33	10
	Real estate or insurance company	153	45
	Retail store	1,569	264
	Wholesale house	23	5
	Retail and wholesale house	7	
	Commercial, unspecified	13	
Partner	Abstract company, advertising, collection or employment bureau, or office service	4	1
	Real estate or insurance company	13	23

SALES, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Partner	Retail store	200	77
	Wholesale house	3	11
	Retail and wholesale house	4	3
Partner and manager	Commercial, unspecified	1	6
	Retail store	4	
Partner and secretary-treasurer	Retail store	1	
Partner and bookkeeper	Retail store	2	
Partner and cashier	Retail store	1	
President	Real estate company	2	
	Retail store	10	
	Wholesale house	4	
	Real estate company	2	
Vice-president	Retail store	10	4
	Wholesale house	2	1
	Real estate company	1	
	Abstract company, advertising, collection or employment bureau, or office service	1	1
Vice-president and office manager	Real estate company	7	
	Real estate company	1	
Secretary	Retail store	1	5
	Wholesale house		2
Director	Retail and wholesale house		4
	Retail store		2
Director, financial campaigns	Abstract company, advertising, collection or employment bureau, or office service		1
Director, travel tours	Service bureau (not office)	1	
Asst. to husband	Abstract company, advertising, collection or employment bureau, or office service		2
	Real estate company		2
	Retail store		35
	Retail and wholesale house		2
	Commercial company, unspecified		1
Superintendent	Unspecified		5
	Real estate company	3	
Manager	Retail store	2	
	Abstract company, advertising, collection or employment bureau, or office service	3	2
	Real estate company	41	7
	Retail store	324	54
	Wholesale house	16	6
	Retail and wholesale house	3	4
	Commercial company, unspecified	5	
	College or university	2	
	Unspecified	3	4
	Retail store	5	6
Manager and buyer	Retail store	1	2
	Real estate company	2	
Manager and bookkeeper	Retail store	2	
Business manager	Retail store	2	
Business manager	Newspaper, printing, or publishing company	6	
Asst. general manager and bookkeeper	Retail store		2
	Wholesale house		1
Asst. manager	Abstract company, advertising, collection or employment bureau, or office service	1	
	Real estate company	9	1
	Retail store	67	19
	Wholesale house	4	3
	Retail and wholesale house	1	2
	Commercial company, unspecified	1	2
Asst. manager and buyer	Retail store	1	
District manager	Real estate company	13	
	Retail store	1	
	Wholesale house	2	
Branch manager	Retail store	1	
	Wholesale house		2
	Retail and wholesale house	1	1
	Newspaper, printing, or publishing company		1

EARNINGS OF WOMEN

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SALES, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Sales manager	Real estate company	2	2
	Retail store	6	1
	Wholesale house	2	1
	Commercial company, unspecified	1	
	Oil, drug, paint, or other chemical manufacturing company	1	1
	Food manufacturing or packing company	1	1
	Manufacturing company, not elsewhere classified	1	2
	Newspaper, printing, or publishing company	1	1
	Unspecified	1	
Export sales manager	Manufacturing company, not elsewhere classified	1	
Asst. sales manager	Real estate company	2	2
	Retail store		1
	Wholesale house		1
	Retail and wholesale house	1	1
	Building and construction company (including building materials)	1	
	Food manufacturing or packing company	1	
	Iron and steel manufacturing company		2
	Metal manufacturing company (not iron and steel)	1	
	Manufacturing company, not elsewhere classified	2	1
	Newspaper, printing, or publishing company		1
Unspecified		1	
District sales manager	Real estate company		1
	Retail store		1
	Wholesale house		1
	Oil, drug, paint or other chemical manufacturing company		1
	Manufacturing company, not elsewhere classified		1
Asst. export manager	Textile or clothing manufacturing company		1
	Oil, drug, paint, or other chemical manufacturing company	1	
Advertising manager	Bank, investment company, or other financial organization	1	2
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1
	Retail store	14	6
	Wholesale house	3	
	Manufacturing company, not elsewhere classified		2
	Government, state	1	
	Unspecified	3	1
	Abstract company, advertising, collection or employment bureau, or office service	1	
	Newspaper, printing, or publishing company	9	3
	Director of publicity	Real estate company	1
Asst. advertising manager	Public utility		1
	Chamber of commerce or other civic organization		3
	Y. W. C. A.		1
	Bank, investment company, or other financial organization		1
	Abstract company, advertising, collection or employment bureau, or office service		1
	Retail store	1	1
	Retail and wholesale house		1
	Newspaper, printing, or publishing company	2	4
	Chamber of commerce or other civic organization	2	
	Railroad		1
Unspecified	1	1	
Circulation manager	Newspaper printing, or publishing company	9	5

SALES, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Asst. circulation manager	Newspaper, printing, or publishing company	2	2
Manager clearing house	Real estate development		1
Department manager, unspecified	Public utility	1	
	Iron and steel manufacturing company	1	
	Manufacturing company, not elsewhere classified	2	
	Newspaper, printing, or publishing company	1	
	Textile or clothing manufacturing company	1	
Manager, foreign division	Manufacturing company, not elsewhere classified		1
Manager, insurance department	Real estate and insurance company		1
Manager, new business department	Real estate and insurance company		4
Manager, resale department	Real estate and insurance company		3
Manager, real estate department	Real estate and insurance company		1
Manager, women's department	Real estate and insurance company		4
	Retail store		2
Manager, art department	Retail store		4
Manager, china sales department	Retail store		7
Manager, order department	Retail and wholesale house		1
	Iron and steel manufacturing company		1
	Retail and wholesale house	1	1
Manager, department, unspecified	Real estate company	15	
	Retail store	116	47
	Wholesale house	3	
	Commercial company, unspecified	2	
Department head and buyer	Retail store	20	3
Department head and asst. buyer	Retail store		1
Asst. department manager	Real estate company	1	1
	Retail store	1	6
Efficiency manager	Newspaper, printing, or publishing company	1	
Executive secretary	Real estate company		1
Advertiser	Retail store	1	
	Wholesale house	1	
	Oil, drug, paint, or other chemical manufacturing company	1	
	Iron and steel manufacturing company	1	
Advertising counselor	Abstract company, advertising, collection or employment bureau, or office service	1	
Advertising asst.	Newspaper, printing, or publishing company	5	
Publicity agent	Bank, investment company, or other financial organization	1	
	Abstract company, advertising, collection or employment bureau, or office service	2	
	Unspecified	2	
Sales instructor and editor	Textile or clothing manufacturing company		1
Station agent	Railroad	1	1
Asst. ticket agent	Railroad	5	1
	Street railway company		1
	Railroad, city		1
Field supervisor	Real estate company		1
	Retail store		1
	Wholesale house		2
Head sales clerk	Retail store	12	6
Floor lady	Retail store	7	2
Underwriter	Bank, investment company, or other financial organization		1
	Insurance company	25	18
Examiner	Insurance company	4	
Director of home economics	Food manufacturing or packing company		1
Sales clerk and asst. manager	Retail store		1
Sales clerk and buyer	Retail store	57	11
	Newspaper, printing, or publishing company		1
Sales clerk and asst. buyer	Retail store		13
Asst. to manager	Retail store	2	
	Wholesale house	1	

EARNINGS OF WOMEN

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SALES, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Asst. to com'l agent	Railroad		1
Rental agent	Real estate company	2	
Sales agent	Bank, investment company, or other financial organization	23	4
	Abstract company, advertising, collection or employment bureau, or office service		1
	Real estate or insurance company	445	109
	Retail store	24	21
	Wholesale house	2	3
	Retail and wholesale house	2	1
	Commercial company, unspecified		1
	Oil, drug, paint, or other chemical manufacturing company	1	1
	Public utility	9	1
	Food manufacturing or packing company	7	
	Iron and steel manufacturing company	1	3
	Lumber or furniture company	1	
	Manufacturing company, not elsewhere classified	3	3
	Newspaper, printing, or publishing company	9	1
	Textile or clothing manufacturing company	3	10
Sales clerk	Theater, moving picture house, or entertainment bureau	7	
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	3	
	Retail store	2,302	282
	Wholesale house	7	1
	Retail and wholesale house		2
	Commercial company, unspecified		3
	Building and construction company (including building materials)		1
	Public utility	2	1
	Food manufacturing or packing company	0	1
	Iron or steel manufacturing company	1	
	Manufacturing company, not elsewhere classified	2	
	Newspaper, printing, or publishing company	2	
	Unspecified	170	19
Sales clerk and bookkeeper	Retail store	2	
Sales clerk and cashier	Retail store		5
	Unspecified		1
Sales clerk and special instructor	Retail store		2
Sales clerk and demonstrator	Public utility	2	1
Traveling saleswoman	Retail store	5	
	Wholesale house	2	
	Commercial company, unspecified		1
	Public utility		1
	Food manufacturing or packing company	1	
	Manufacturing company, not elsewhere classified	1	
	Newspaper, printing, or publishing company	1	1
	Unspecified	2	
Tourist agent	Chamber of commerce or other civic organization	2	
Promoter	Bank, investment company, or other financial organization	1	
	Real estate or insurance company	1	
Organizer educational courses	Retail store		1
Traveling organizer	Textile or clothing manufacturing company		1
Solicitor	Private technical school		1
	Abstract company, advertising, collection or employment bureau, or office service	2	1
	Real estate or insurance company	25	21
	Retail store	2	
	Newspaper, printing, or publishing company	4	5
	Street railway company	1	
	Taxicab or transfer and trucking company	1	
	Unspecified		1

SALES, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Advertising solicitor	Newspaper, printing, or publishing company	1	
Post office clerk	Government, U. S.	59	80
Ticket agent	Railroad	12	5
	Unspecified	2	
District agent	Newspaper, printing, or publishing company	1	
Special agent	Real estate or insurance company	12	
Representative	Theater, moving picture house, or entertain- ment bureau	1	
	Bank, investment company, or other financial organization	1	
	Real estate or insurance company	18	
	Retail store	5	
	Wholesale house	1	
	Food manufacturing or packing company	1	
	Newspaper, printing, or publishing company	2	
	Railroad	4	
	Telephone company	2	
Field worker	Abstract company, advertising, collection or employment bureau, or office service	1	
	Retail store	1	
Canvasser	Retail store	1	
	Unspecified	2	
Agent	Unspecified	2	
Asst. agent	Food manufacturing or packing company	1	
Corsetiere	Retail store	37	9
	Textile or clothing manufacturing company	1	1
	Unspecified	17	2
Demonstrator	Real estate or insurance company	1	
	Retail store	15	7
	Wholesale house	1	
	Public utility	12	1
	Food manufacturing or packing company	3	
	Manufacturing company, not elsewhere clas- sified	1	
	Unspecified	6	1
Lecturer	Dairy company	1	
	Hospital, Y. W. C. A., or other health or welfare organization	2	
	Women's or men's club or other fraternal organization	2	
Interior decorator	Retail store	4	2
	Unspecified	23	1
Interior decorator and sales- woman	Retail store	1	
Student in training dept.	Retail store	1	
Florist and bookkeeper	Retail store	1	
Florist and stenographer	Retail store	1	
Asst. florist	Retail store	6	
Asst. at filling station	Retail store	1	
Sales worker, unspecified	Abstract company, advertising, collection or employment bureau, or office service	1	
	Real estate or insurance company	1	
	Retail store	8	
	Manufacturing company, not elsewhere clas- sified	1	1
	Food manufacturing or packing company	1	
Group total		<u>6,340</u>	<u>1,469</u>

HEALTH

Proprietor	Hospital or other health organization	14
	Physiotherapy laboratory	3
	Sanipractor institute	1
	Sulphur bath	1
	X-ray laboratory	1

EARNINGS OF WOMEN

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HEALTH, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Partner	Hospital or other health organization	1	
Partner and superintendent	Hospital or other health organization		2
President	Hospital or other health organization	1	
	Health association	1	
Superintendent	Hospital or other health organization	90	31
	Emergency hospital, miscellaneous manufacturing company		2
Director or superintendent	Visiting nurses' association or public health nurses		8
Superintendent and manager	Hospital or other health organization		3
Director	Hospital	1	
Night superintendent	Hospital		11
Manager	Hospital, or other health organization	10	
	Mineral baths	1	
Director	Health organization (not hospital)		2
Asst. superintendent	Hospital	6	2
Business manager	Hospital or other health organization	1	2
	Nurses' or other professional association		1
Chairman	Red Cross committee on seals		1
Superintendent of public health	Government, state		2
	Government, city or town		1
Director of child hygiene	Government, state	1	
	Hospital or other health organization		1
Director of dental hygiene	Government, state	1	
Director of dietetics	Hospital or other health organization	1	
Director of health	School, unspecified	1	
	Government, state	1	
	Government, city or town	1	
	Government, unspecified	2	
Director of health education	Hospital or other health organization	1	
Director of medical inspection and welfare nursing	Government, city or town	2	
Asst. health officer	Government, county		1
Supervisor	Hospital or other health organization	23	2
Supervisor of health	Board of education		4
	Elementary school, public		1
	School, unspecified	1	
Supervisor of health work	Hospital or other health organization	1	12
Supervisor of public health	Government, U. S.		1
	Government, state	1	
	Government, unspecified	1	
Executive secretary	Government, state	1	
	Hospital or other health organization	4	9
	Nurses' or other professional association		2
	Unspecified		1
Field secretary	Government, unspecified		1
Asst. secretary	Tuberculosis association, county		1
Asst. supervisor of bureau of child hygiene	Government, state	1	
Medical examiner	Insurance company	1	
	College or university		2
	Government, unspecified		1
	Hospital or other health organization		1
Physician	Real estate or insurance company	1	
	Board of education	1	2
	College or university	1	1
	Normal school or teachers' college	1	
	Professional school (law, medicine, or music)	1	
	Secondary school, public		2
	School, unspecified	1	
	Government, state	4	
	Government, county	2	
	Government, city or town	1	1
	Government, unspecified	1	
	Manufacturing company, not elsewhere classified		2

HEALTH, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Physician	Own practice	182	58
	Hospital or other health organization	9	4
	Women's or men's club or other fraternal organization	1	
Orthopedic surgeon	Own practice		1
Oculist	Own practice	1	
Asst. physician	College or university		1
	Private medical clinic		1
Osteopathic physician	Own practice	186	65
	Hospital or other health organization	1	
Dentist	Own practice	39	8
Superintendent of nurses	Government, county	1	
	Government, city or town	1	
	Hospital or other health organization	41	17
	Unspecified	3	
Superintendent of visiting nurses	Government, city or town	1	
Asst. superintendent of nurses	Hospital or other health organization	2	6
Head nurse	College or university		1
	Hospital or other health organization		3
Supervising nurse	Hospital or other health organization	25	25
Supervisor of nurses	School for handicapped	1	
	Government, county	1	
	Government, state	1	
	Government, city or town	1	
	Government, unspecified	2	1
	Coal or other mining company	1	
Supervisor of school nurses	Board of education		3
	School, unspecified	1	
Supervisor, public health nursing	Government, unspecified		7
Supervisor of operating room	Hospital	4	2
Surgical supervisor	Unspecified		1
Obstetrical supervisor	Hospital	1	2
Floor supervisor	Hospital or other health organization	2	3
Supervisor of nursing service	School, unspecified	1	
Director, school of nursing	School of nursing		1
and superintendent	Hospital		1
Department supervisor	Hospital or other health organization	2	
Nurse, executive	Government, county		2
	Hospital or other health organization		5
Nurse	Real estate or insurance company	10	2
	Retail store	3	
	Wholesale house	1	
	Board of education		36
	College or university	6	2
	Elementary school, public	9	
	Normal school or teachers' college	2	
	Professional school (law, medicine, or music)	1	
	Secondary school, public	3	
	School, unspecified	98	
	Vocational or technical school	1	
	Government, U. S.	6	1
	Government, state	10	2
	Government, county	56	25
	Government, city or town	44	7
	Government, unspecified	28	29
	Oil, drug, paint, or other chemical manufacturing company		1
	Public utility	2	
	Food manufacturing or packing company	3	
	Iron and steel manufacturing company	20	
	Lumber or furniture manufacturing company	1	
	Metal manufacturing company (not iron and steel)	2	1
	Manufacturing company, not elsewhere classified	23	9

EARNINGS OF WOMEN

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HEALTH, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Nurse	Newspaper, printing, or publishing company	1	
	Textile or clothing manufacturing company	2	
	Coal or other mining company	1	
	Chiropractor		1
	Dentist	13	8
	Doctor	79	30
	Osteopathic physician	1	
	Chamber of commerce or other civic organization	2	
	Hospital or other health organization	349	58
	Women's or men's club or other fraternal organization	2	
	Nurses' association	1	
	Railroad	5	2
	Taxicab or transfer and trucking company	1	
	Telephone company	2	
	Unspecified	94	6
Nurse, private duty		449	77
Nurse, anaesthetic	Hospital		2
Nurse, obstetrical	Private duty		1
Nurse, surgical	Hospital		1
Nurse, visiting	Unspecified	10	
Nurse and bookkeeper	Doctor	1	
Nurse and technician	Doctor	2	
	Hospital or other health organization	1	
Asst. surgical supervisor	Doctor		1
Asst. nurse	Hospital or other health organization	1	
	Railroad	1	
	Unspecified	1	
Asst. nurse, visiting	Hospital	6	1
Student nurse		16	13
Nurse, practical	Hospital or other health organization	4	1
Pathologist	Hospital or other health organization	1	
Asst. pathologist	Board of education		2
Dental hygienist	Government, city or town	2	
	Dental firm	10	9
	Own practice	5	1
	Unspecified	3	
Asst. orthodontist	Dentist		1
Asst. dental supervisor and X-ray technician	Government, city or town	1	
Pharmacist	Hospital or other health organization	3	3
Asst. pharmacist	Government, state	1	
Chiropractor	Own practice	132	39
Naprapath	Own practice	6	1
Naturopath	Unspecified	1	
Physioatrix	Government, unspecified	1	
Podiatrist	Own practice	1	
Radiologist	Doctor		4
	Hospital or other health organization		4
Physiotherapist	Own practice	12	4
	Doctor	2	6
	Hospital or other health organization	7	2
	Unspecified	2	
Physiotherapist and masseuse	Own practice	1	
Electrotherapist	Own practice		2
Hydrotherapist	Own practice	2	
X-ray technician	Government, county	1	
	Government, unspecified	1	
	Dentist	1	
	Doctor	8	
	Hospital or other health organization	9	
	Unspecified	5	
Masseuse	Beauty shop	3	
	Own practice	14	5
	Hospital or other health organization	2	1
	Unspecified	4	

HEALTH, Continued

Occupation	Employer	Number in Federation	Number in Reporting Concern
Anaesthetist	Surgeon		
	Hospital or other health organization	8	
Optometrist	Retail store		
	Own practice	29	1
	Optometrists		
Ophthalmologist	Own practice	1	
Chiropodist	Own practice	41	1
Food inspector	Government, state	1	
	Government, city or town	1	
Nutritionist	Board of education		
	Unspecified	1	
Health worker	Government, U. S.	1	
	Government, state	1	
	Hospital or other health organization	2	
	Unspecified	2	
Health and hygiene inspector	School, unspecified	1	
Chief dental asst.	Hospital or other health organization	1	
Dental asst.	Dentist	82	3
Asst. technician and office nurse	Doctor		
Asst. to doctor	Doctor	135	8
Asst. to oculist	Doctor		
Asst. to osteopathic physician	Doctor		
Asst. to chiropodist	Doctor	2	
Asst. to chiropractor	Doctor	4	
Asst. to health officer	Government, unspecified	1	
Asst. to optometrist		2	
Asst., dept. of health and welfare	Government, city or town		
Asst. in clinic	Hospital or other health organization	1	
Assistant (health)	Insurance company		
Office asst.	Unspecified		
Office asst. (health)	Manufacturing company, not elsewhere classified		
Health work, unspecified	Unspecified		
Group total		2,641	89

FINANCE

Proprietor	Bank, investment company, or other financial organization	10	1
	Abstract company	1	1
	Accounting firm	5	1
Partner	Bank, investment company, or other financial organization	3	
	Accounting firm	1	
President	Bank, investment company, or other financial organization	2	
	Real estate or insurance company		1
President and treasurer	Bank, investment company, or other financial organization	1	
	Abstract company	1	
	Real estate or insurance company	1	
	Unspecified	1	
Vice-president	Bank, investment company, or other financial organization	4	1
Vice-president and director	Bank, investment company, or other financial organization		
Vice-president and treasurer	Bank, investment company, or other financial organization		
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
	Lumber or furniture manufacturing company	1	
	Newspaper, printing, or publishing company	1	
Trustee of estate		1	1
Cashier	Bank	30	4
	Real estate or insurance company		1

EARNINGS OF WOMEN

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FINANCE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Cashier	Manufacturing company, not elsewhere classified		1
Capitalist, independent		2	1
Secretary	Bank, investment company, or other financial organization	11	4
	Insurance company		4
Treasurer	Theater, moving picture house, or entertainment bureau		2
	Bank, investment company, or other financial organization	4	1
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	5	1
	Abstract company, advertising, collection or employment bureau, or office service	2	
	Real estate or insurance company	6	4
	Retail store	15	
	Wholesale house	4	1
	Retail and wholesale house	1	4
	Commercial company, unspecified	2	
	Board of education	1	
	College or university	1	
	Government, state	1	
	Government, county	38	15
	Government, city or town	14	9
	Building and construction company (including building materials)	5	1
	Oil, drug, paint, or other chemical manufacturing company		2
	Public utility	2	1
	Food manufacturing or packing company	3	
	Iron and steel manufacturing company	2	
	Lumber or furniture manufacturing company		1
	Metal manufacturing company (not iron and steel)	1	
	Manufacturing company, not elsewhere classified	3	5
	Newspaper, printing, or publishing company	5	2
	Textile or clothing manufacturing company	3	
	Chamber of commerce or other civic organization	1	
	Hospital, Y. W. C. A., or other health or welfare organization	1	
	Nurses' or other professional association	1	
	Church or religious association	1	
	Street railway company	2	1
	Unspecified	8	2
Treasurer and manager	Bank, investment company, or other financial organization	1	
	Manufacturing company, not elsewhere classified	1	
Treasurer and office manager	Abstract company, advertising, collection or employment bureau, or office service		1
	Real estate or insurance company		2
	Food manufacturing or packing company		1
	Coal or other mining company		1
	Street railway company	1	
Treasurer and bookkeeper	Real estate or insurance company	1	
	Vocational or technical school	1	
	Government, state	1	
	Newspaper, printing, or publishing company	1	
	Taxicab or transfer and trucking company	1	
Treasurer and cashier	Bank, investment company, or other financial organization		1
	Wholesale house		1
	Oil, drug, paint, or other chemical manufacturing company		1
Treasurer and clerk	Government, city or town	2	

MICHIGAN BUSINESS STUDIES

FINANCE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Director	Bank, investment company, or other financial organization	2	
Secretary and treasurer	Theater, moving picture house, or entertainment bureau	2	
	Bank, investment company, or other financial organization	13	5
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	5	1
	Abstract company, advertising, collection or employment bureau, or office service	4	1
	Real estate or insurance company	17	2
	Retail store	51	17
	Wholesale house	13	9
	Retail and wholesale house	3	7
	Government, U. S.	1	
	Building and construction company (including building materials)	7	6
	Oil, drug, paint, or other chemical manufacturing company	6	3
	Public utility	7	
	Food manufacturing or packing company	1	2
	Iron and steel manufacturing company	6	4
	Lumber or furniture manufacturing company	2	
	Metal manufacturing company (not iron and steel)	1	
	Manufacturing company, not elsewhere classified	6	8
	Newspaper, printing, or publishing company	8	6
	Textile or clothing manufacturing company	1	2
	Farm, nursery, or greenhouse	1	
	Coal or other mining company	2	
	Architect	1	
	Accountant		1
	Hospital, Y. W. C. A., or other health or welfare organization	1	1
	Transportation company, miscellaneous	1	
	Taxicab or transfer and trucking company	2	
	Water transportation company		1
	Unspecified	4	5
Secretary-treasurer and manager	Abstract company, advertising, collection or employment bureau, or office service		1
	Food manufacturing or packing company		1
	Newspaper, printing, or publishing company		1
	Dental laboratory	1	
	Trade association	1	
Secretary-treasurer and book-keeper	Retail store	1	
Secretary and asst. treasurer	Bank, investment company, or other financial organization	1	
	Abstract company, advertising, collection or employment bureau, or office service	1	
	Retail store	1	1
	Wholesale house		1
	Oil, drug, paint, or other chemical manufacturing company	3	1
	Public utility	2	
	Church or religious association		1
Asst. secretary	Bank, investment company, or other financial organization	4	2
Asst. secretary and actuary	Insurance company		1
Asst. secretary and treasurer	Bank, investment company, or other financial organization	1	8
	Abstract company, advertising, collection or employment bureau, or office service		1
	Real estate or insurance company	1	1
	Retail store	1	
	Wholesale house		1

EARNINGS OF WOMEN

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FINANCE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Asst. secretary and treasurer	Iron and steel manufacturing company		1
	Manufacturing company, not elsewhere classified	1	
	Farm, nursery, or greenhouse	1	
	Coal or other mining company		1
	Unspecified		1
Deputy treasurer	Government, U. S.	1	
	Government, county	24	
	Government, city or town	2	
Asst. treasurer	Theater, moving picture house, or entertainment bureau	1	
	Bank, investment company, or other financial organization	11	4
	Abstract company, advertising, collection or employment bureau, or office service	1	
	Real estate or insurance company	8	2
	Retail store	4	2
	Wholesale house		2
	Retail and wholesale house	1	
	College or university	1	
	Government, county	18	18
	Government, city or town	1	1
	Public utility	1	2
	Iron and steel manufacturing company	2	1
	Manufacturing company, not elsewhere classified		1
	Hospital, Y. W. C. A., or other health or welfare organization	1	1
	Trade association		1
	Unspecified	4	1
Asst. treasurer and office manager	Public utility	1	
	Manufacturing company, not elsewhere classified	1	2
	Chamber of commerce or other civic organization		1
Asst. treasurer and bookkeeper	Wholesale house	1	
	Oil, drug, paint, or other chemical manufacturing company	1	
	Iron and steel manufacturing company		1
	Hospital, Y. W. C. A., or other health or welfare organization		1
Asst. deputy treasurer	Government, county		1
Asst. trust officer	Bank, investment company, or other financial organization	2	
Asst. to president	Bank, investment company, or other financial organization	1	1
Manager	Bank, investment company, or other financial organization	10	
	Abstract company	1	
	Collection and credit agency	2	2
Executrix of estate	Unspecified	1	
Asst. manager	Bank, investment company, or other financial organization	4	1
	Abstract company	2	1
Asst. manager and stenographer	Abstract company		1
Asst. department manager	Bank, investment company, or other financial organization	3	
Asst. cashier	Bank	79	55
	Insurance company		1
Asst. cashier and director	Bank	1	
Asst. cashier and auditor	Bank	1	
Investor	Bank	1	
Officer, unspecified	Bank	6	
Asst. receiver	Bank		1
	Retail store	1	
Accountant	Unspecified	17	8

FINANCE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Accountant, Jr.	Accountant	1	2
Income tax expert	Unspecified	1	
Division auditor	Public utility		1
Auditor	Bank, investment company, or other financial organization	4	3
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	11	5
	Abstract company, advertising, collection or employment bureau, or office service	1	
	Real estate or insurance company	1	1
	Retail store	7	1
	Wholesale house	2	
	Retail and wholesale house	1	
	College or university		1
	Government, U. S.	2	2
	Government, state	2	
	Government, county	5	3
	Government, city or town	9	1
	Government, unspecified	1	
	Oil, drug, paint, or other chemical manufacturing company	3	1
	Public utility	4	
	Food manufacturing or packing company ..	2	
	Iron and steel manufacturing company	1	1
	Lumber or furniture manufacturing company ..	1	
	Manufacturing company, not elsewhere classified	2	1
	Newspaper, printing, or publishing company ..	4	1
	Trade association	1	1
	Telephone company	3	
	Unspecified	11	
Auditor and bookkeeper	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service ..	1	
Auditor and office manager	Iron and steel manufacturing company	1	
Auditor and secretary	Transportation company, miscellaneous ..	1	
Comptroller	Real estate or insurance company	1	
	Retail store	1	
Asst. comptroller	Government, state	1	
Asst. auditor	Government, city or town		3
	Abstract company, advertising, collection or employment bureau, or office service		1
	Government, state	1	1
	Government, county	4	10
	Government, city or town	2	
	Public utility	1	1
Deputy auditor	Government, state	1	
	Government, county	12	
	Government, city or town	4	
	Government, unspecified	2	
Asst. auditor and accountant ...	Bank, investment company, or other financial organization		1
	Government, city or town		1
Bursar	College or university	3	2
	Private school	1	
Credit manager	Bank, investment company, or other financial organization	2	2
	Abstract company, advertising, collection or employment bureau, or office service	3	1
	Retail store	37	14
	Wholesale house	8	4
	Retail and wholesale house	1	
	Commercial company, unspecified	1	
	Oil, drug, paint, or other chemical manufacturing company	1	
	Food manufacturing or packing company ...		1
	Lumber or furniture manufacturing company ..	1	1

EARNINGS OF WOMEN

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FINANCE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group	
Credit manager	Manufacturing company, not elsewhere classified	1	5	
	Newspaper, printing, or publishing company	1		
	Textile or clothing manufacturing company	2	1	
	Coal or other mining company		1	
	Hospital, Y. W. C. A., or other health or welfare organization		1	
	Trade association	1		
	Unspecified		3	
Credit manager and asst. secretary and treasurer	Retail store		1	
Credit and office manager	Retail store	2	3	
	Lumber or furniture manufacturing company		1	
Credit manager and bookkeeper	Newspaper, printing, or publishing company	1		
	Unspecified	1		
	Abstract company, advertising, collection or employment bureau, or office service		1	
	Retail store	2	10	
	Wholesale house		5	
	Retail and wholesale house		1	
	Iron and steel manufacturing company		1	
Credit manager and asst. bookkeeper	Lumber or furniture manufacturing company		1	
	Textile or clothing manufacturing company		1	
Asst. credit manager	Retail store		1	
	Bank, investment company, or other financial organization		1	
	Retail store	8	1	
	Wholesale house	1		
	Food manufacturing or packing company	1		
	Manufacturing company, not elsewhere classified		1	
	Hospital, Y. W. C. A., or other health or welfare organization		1	
Credit and collection manager	Unspecified		1	
	Public utility	1		
Director of school savings	Bank, investment company, or other financial organization	1		
Director of women's benefit	Insurance company	1		
Financial manager	Real estate or insurance company		1	
	Wholesale house		1	
	College or university		1	
	Coal or other mining company		1	
Head, financial department	Bank, investment company, or other financial organization	42	38	
	Abstract company, advertising, collection or employment bureau, or office service	5	1	
	Real estate and insurance company	1	2	
	Retail store	1		
	Wholesale house	1		
	College or university		1	
	Public utility		1	
	Miscellaneous manufacturing		1	
	Asst. head, financial department	Bank, investment company, or other financial organization		6
		Government, city	1	
Commissioner (finance)	Government, state		2	
Deputy commissioner of revenue	Government, city	1		
Loan inspector	Government, state	1		
Loan officer	Bank, investment company, or other financial organization	1		
	Bank, investment company, or other financial organization	1		
Supervisor	Bank, investment company, or other financial organization	1		
Head teller	Bank	1		
Teller	Bank	167	89	
	College bank		1	
Teller and asst. cashier	Bank		1	

FINANCE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Teller and bookkeeper	Bank	2	11
	College bank		1
Teller and stenographer	Bank	1	1
	College bank		1
Asst. teller	Bank	2	3
Asst. teller and stenographer	Bank		2
Assessor	Government, county	2	2
	Government, city		2
Deputy assessor	Government, county	8	6
	Government, city	1	
	Government, unspecified	5	
Tax collector	Government, U. S.	1	
	Government, state	2	
	Government, county	2	
	Government, city	8	
	Government, unspecified	2	
Asst. tax collector	Government, U. S.	1	2
	Government, county	5	3
	Government, city	1	
	Government, unspecified	3	3
Collector	Bank, investment company, or other financial organization	1	
	Abstract company, advertising, collection or employment bureau, or office service	4	1
	Real estate or insurance company	5	
	Retail store	4	
	Food manufacturing or packing company	1	
	Newspaper, printing, or publishing company	2	
	Doctor	1	
	Taxicab or transfer and trucking company	1	
	Unspecified	7	
Collector and office clerk	Private school		1
Deputy collector	Government, U. S.	4	
	Government, county	4	
	Government, city or town	1	
	Government, unspecified	1	
Budget specialist	Nurses' or other professional association	1	
Financial secretary	Bank, investment company, or other financial organization	2	
	Retail store	1	
	College or university	1	
	Lumber or furniture manufacturing company	1	
	Church or religious association		2
	Hospital, Y. W. C. A., or other health or welfare organization		1
	Unspecified	1	
Fiscal agent	Government, U. S.	1	
Asst. financial secretary	Bank, investment company, or other financial organization		1
	Government, U. S.		1
	Church or religious association	1	
Vault custodian	Bank	3	3
Unspecified (financial)	Unspecified		1
Group total		<u>1,139</u>	<u>609</u>

PRODUCTION AND PLANNING

Proprietor	Building and construction company (including building materials)	13	3
	Oil, drug, paint, or other chemical manufacturing company	5	3
	Food manufacturing or packing company	62	5
	Real estate or insurance company	3	1
	Retail store	12	

EARNINGS OF WOMEN

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PRODUCTION AND PLANNING, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Proprietor	Wholesale house	46	8
	Retail and wholesale house	144	25
	Farm, nursery, or greenhouse	7	8
	Live stock farm	6	3
	Coal or other mining company	2	
	Farm or ranch	59	
	Gardens	11	
Partner	Turkey raising	1	
	Building and construction company (including building materials)	2	3
	Oil, drug, paint, or other chemical manufacturing company	1	
	Food manufacturing or packing company	15	4
	Iron and steel manufacturing company	1	
	Lumber or furniture manufacturing company	2	
	Manufacturing company, not elsewhere classified	2	1
	Newspaper, printing, or publishing company	8	3
	Textile or clothing manufacturing company	4	8
	Farm, nursery, or greenhouse		1
	Live stock farm	1	
Partner and manager	Food manufacturing or packing company	2	
Partner and asst. manager	Live stock farm	1	
President	Oil, drug, paint, or other chemical manufacturing company	1	
	Public utility	1	
	Food manufacturing or packing company	1	
	Manufacturing company, not elsewhere classified	3	
	Newspaper, printing, or publishing company	2	
President and treasurer	Food manufacturing or packing company	1	
	Newspaper, printing, or publishing company	1	
Vice-president	Building and construction company (including building materials)	2	1
	Oil, drug, paint, or other chemical manufacturing company		1
	Public utility	1	
	Iron and steel manufacturing company	3	
	Manufacturing company, not elsewhere classified	1	
Director and secretary	Newspaper, printing, or publishing company	4	
	Textile or clothing manufacturing company	1	
Secretary	Building and construction company (including building materials)	3	
	Oil, drug, paint, or other chemical manufacturing company	2	2
	Public utility	1	
	Food manufacturing or packing company		1
	Iron and steel manufacturing company		1
	Manufacturing company, not elsewhere classified		7
	Newspaper, printing, or publishing company	1	1
	Textile or clothing manufacturing company	1	1
	Poultry raising	1	
	Newspaper, printing, or publishing company	2	
County road commissioner	Government, county	1	
Superintendent	Building and construction company (including building materials)	1	
	Manufacturing company, not elsewhere classified	1	
	Building and construction company (including building materials)	1	1
Manager	Oil, drug, paint, or other chemical manufacturing company	4	
	Public utility	9	
	Food manufacturing or packing company	22	3
	Iron and steel manufacturing company	6	

PRODUCTION AND PLANNING, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Manager	Lumber or furniture manufacturing company	3	1
	Metal manufacturing company (not iron and steel)	3	
	Manufacturing company, not elsewhere classified	6	2
Manager of medical equipment	Newspaper, printing, or publishing company	19	3
	Textile or clothing manufacturing company	9	1
Manager	Manufacturing company		1
	Farm, nursery, or greenhouse	13	3
Asst. manager	Live stock farm	5	
	Coal or other mining company	1	
	Railroad	1	
	Telegraph company	23	9
	Telephone company	10	3
	Building and construction company (including building materials)	1	1
	Oil, drug, paint, or other chemical manufacturing company	1	
Asst. business manager	Public utility	2	
	Food manufacturing or packing company	3	1
	Iron and steel manufacturing company	1	
	Lumber or furniture manufacturing company	1	
	Manufacturing company, not elsewhere classified	1	
	Newspaper, printing, or publishing company	6	3
	Textile or clothing manufacturing company	4	1
	Live stock farm	1	
	Coal or other mining company	1	
	Telephone company	1	1
District supervisor	Telephone company	2	
Asst. superintendent	Public utility	1	
	Food manufacturing or packing company	1	1
Branch manager	Textile or clothing manufacturing company	1	
	Food manufacturing or packing company	1	
Asst. district superintendent	Manufacturing company, not elsewhere classified	1	
	Telegraph company	2	
	Telephone company	1	
Supervisor	Telephone company	2	2
	Telephone company	21	10
Asst. to husband	Building and construction company (including building materials)		1
	Food manufacturing or packing company		1
	Manufacturing company, not elsewhere classified		1
Traffic supervisor	Farm, nursery, or greenhouse		1
	Live stock farm		1
Traffic manager	Telephone company	1	
	Railroad	1	
Director of planning	Telephone company	2	6
	Telephone company		1
Manager, alteration department	Retail store		2
Manager, dressmaking department	Retail store		2
Manager, production department	Retail store	2	
Department head	Advertising agency		1
	Oil, drug, paint, or other chemical manufacturing company	2	
	Public utility	9	
	Iron and steel manufacturing company	5	
	Manufacturing company, not elsewhere classified	6	
	Newspaper, printing, or publishing company	3	
	Textile or clothing manufacturing company		1
Telephone company	3		

EARNINGS OF WOMEN

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PRODUCTION AND PLANNING, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Supervisor of domestic science	Iron and steel manufacturing company	1	
Supervisor of gardens	Government, state	1	
Mechanical engineer	Iron and steel manufacturing company	1	
Draftsman	Government, county	1	
	Government, unspecified	1	
	Iron and steel manufacturing company	1	
	Lumber or furniture manufacturing company		1
	Manufacturing company, not elsewhere classified	1	
	Newspaper, printing, or publishing company	1	
	Architect		2
	Engineer		1
	Railroad		1
	Unspecified	1	
District chief operator	Telephone company	1	1
Chief service observer	Telephone company	1	1
Chief operator	Telegraph company	1	
	Telephone company	94	46
Asst. chief operator	Telephone company	1	5
Telegraph supervisor	Telegraph company	1	
Toll supervisor	Telephone company	2	
Observer	Telephone company	6	
Forelady	Laundry		4
	Retail store		1
	Wholesale house		1
	Building and construction company (including building materials)	1	
	Iron and steel manufacturing company	2	1
	Manufacturing company, not elsewhere classified	4	2
	Newspaper, printing, or publishing company	2	1
	Textile or clothing manufacturing company	12	4
	Unspecified	1	1
Supervisor	Textile plant		1
Asst. to manager	Newspaper, printing, or publishing company	2	
	Textile or clothing manufacturing company	1	
Freight agent	Railroad		1
Mechanical dentist	Manufacturing company, not elsewhere classified	1	
Engraver	Retail store	3	
Photographer	Photograph shop	35	4
	Unspecified	14	
Estimator	Retail store	1	
Asst. estimator	Iron and steel manufacturing company	1	
Floral designer	Florist	1	
	Greenhouse	2	
Designer	Retail store	4	3
	Wholesale house	1	
	Lumber or furniture manufacturing company	1	
	Manufacturing company, not elsewhere classified	2	
	Textile or clothing manufacturing company	6	2
	Unspecified	5	
Millinery designer	Retail store	5	
	Clothing manufacturing company	3	
Milliner	Retail store	160	8
	Textile or clothing manufacturing company		1
Trimmer	Retail store	1	
	Textile or clothing manufacturing company	2	
Trimmer and saleswoman	Retail store		9
Modiste and milliner	Textile or clothing manufacturing company	1	
	Retail store	13	
	Textile or clothing manufacturing company	204	82
Dress designer	Textile or clothing manufacturing company	3	
Dressmaker	Private home	1	
	Retail store	2	
	School for handicapped	1	

PRODUCTION AND PLANNING, Continued

Occupation	Employer	Number in Federation	Number in Reporting Concern
Tailor	Private home	1	
	Retail store	2	1
	Textile or clothing manufacturing company	2	
Inspector	Unspecified	2	
	Textile or clothing manufacturing company		1
Arts and crafts worker	Unspecified	3	
	Retail store		1
Reed worker	Lumber or furniture manufacturing company	1	
Hand worker, vocational department	Home for incurables		1
Embroiderer	Textile or clothing manufacturing company	3	
	Textile or clothing manufacturing company		1
Artercraft worker	Textile or clothing manufacturing company		1
Seamstress	Laundry or private home	7	1
	Retail store	40	3
	Textile or clothing manufacturing company	20	4
	Coal or other mining company	1	
Fitter	Unspecified	35	
	Retail store	15	
Alterationist	Unspecified		3
	Private home	2	
Hemstitcher	Retail store	21	21
	Textile or clothing manufacturing company	4	
Drapery maker	Retail store	9	2
	Textile manufacturing company	1	
Rug maker	Textile manufacturing company		1
Pattern maker	Textile or clothing manufacturing company	1	
Color artist	Retail store	1	
	Unspecified	1	
Photograph tinter	Photograph shop	1	
China decorator	At home	8	
Watch repairer	Retail store	1	
Sign painter	Unspecified	1	
Electrician	Unspecified	1	
Bookbinder	Newspaper, printing, or publishing company	3	1
Baker	Food manufacturing or packing company	6	
Candy maker	Retail store	1	
	Food manufacturing or packing company	1	
Chocolate dipper	Unspecified	1	
Asst. baker	Food manufacturing or packing company	2	
Cigar maker	Manufacturing company, not elsewhere classified	1	
Cigar stripper	Manufacturing company, not elsewhere classified	1	
Composer	Newspaper, printing, or publishing company	1	4
	Unspecified	2	
Factory worker	Government, state	1	
	Food manufacturing or packing company	3	
	Manufacturing company, not elsewhere classified	10	1
	Newspaper, printing, or publishing company	3	
Shop girl	Textile or clothing manufacturing company	30	2
	Unspecified		1
Furrier	Retail store	1	1
	Manufacturing company, not elsewhere classified	2	
Laundry worker	Laundry		1
Presser	Laundry	2	2
Presser and boxer	Textile or clothing manufacturing company	1	
Sorter	Food manufacturing or packing company	1	
Weaver	Textile or clothing manufacturing company	7	
Linotype operator	Newspaper, printing, or publishing company	51	17
	Unspecified		2
Monotype operator	Newspaper, printing, or publishing company	1	
Machine operator	Newspaper, printing, or publishing company		1
	Textile or clothing manufacturing company		1
Photostat operator	Iron and steel manufacturing company	1	
Hose mending	Unspecified	1	

EARNINGS OF WOMEN

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PRODUCTION AND PLANNING, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Fruit packer	Farm		1
Asst. pharmacist	Retail store		1
Asst. optician	Unspecified	1	
Asst. photographer	Photograph shop	10	2
Retoucher photographer	Photograph shop	11	7
Finisher	Photograph shop	1	
	Retail store	3	
Asst. photostat operator	Retail store	1	
Asst. publisher	Newspaper, printing, or publishing company	1	
Florist	Nursery or greenhouse	1	
Asst. florist	Nursery or greenhouse	1	
Printer	Retail store	1	1
	Building and construction company (including building materials)	1	
	Newspaper, printing, or publishing company	5	1
	Unspecified	2	
Printer's asst.	Newspaper, printing, or publishing company	1	
Developer	Photograph shop	1	
Typesetter	Newspaper, printing, or publishing company	5	
Shoemaker	Textile or clothing manufacturing company	3	
Shoe fitter	Textile or clothing manufacturing company	1	
Farmerette	Farm, nursery, or greenhouse	1	
Information operator	Telephone company	1	
Long distance operator	Telephone company	1	
Telephone worker, unspecified	Telephone company	2	
Telephone operator	Telephone company	162	21
	Telephone company	1	1
	Unspecified	1	
Telegraph operator	Railroad	9	4
	Telegraph company	33	
Multiplex operator	Telegraph company		4
Head page	City library, public		1
Unspecified	Iron and steel manufacturing company		1
	Newspaper, printing, or publishing company	1	
	Textile or clothing manufacturing company	5	
Group total		1,881	463

FOOD, HOUSING, AND PERSONAL SERVICE

Proprietor	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	917	134
Partner	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	47	19
President and manager	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
Manager	Estate	1	1
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	260	36
Manager and housekeeper	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
Manager and purchasing agent	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
Director	Food, living or personal service, unspecified		1
Asst. to husband	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		9
Asst. manager	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	35	1
Director of home demonstration agents	Government, U. S.		1
State supervisor, home economics education	Government, state		2
Supervisor	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1

FOOD, HOUSING, AND PERSONAL SERVICE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Food supervisor	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
	Unspecified	1	
Executive secretary	Hotel, restaurant, beauty shop, laundry, mortician or other living or personal service	1	
Supervisor of home economics	Government, state	2	
Building manager	Hospital, Y. W. C. A., or other health or welfare organization	2	
	Women's or men's club, or other fraternal organization	1	
Business manager	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	2	
Manager of cafeteria	Board of education	1	
	College or university	3	2
	Elementary school, public	2	1
	Secondary school, public	5	1
	School, unspecified	3	
	Government, U. S.	1	
	Government, state	1	
	Oil, drug, paint, or other chemical manufacturing company	1	
	Iron and steel manufacturing company	1	
	Metal manufacturing company (not iron and steel)	1	
	Manufacturing company, not elsewhere classified		1
	Textile or clothing manufacturing company	2	
	Hospital, Y. W. C. A., or other health or welfare organization	12	6
Manager of laundry agency	Laundry	1	
Head of commissary dept.	School, unspecified	1	
Head of dietician's dept.	Hospital, Y. W. C. A., or other health or welfare organization	1	
Director of girls' dormitory	College or university	1	
Director of home economics	Public utility	1	
Director of home service dept.	Public utility		4
Director of school lunches	School, unspecified		1
Director of service	Telephone company		1
Asst. director of cafeteria	Hospital, Y. W. C. A., or other health or welfare organization	1	
Dietician	Hotel, restaurant, or other food establishment	4	3
	Commercial, unspecified		1
	College or university	2	2
	Normal school or teachers' college	1	
	Secondary school, public	2	
	School, unspecified	3	
	Government, state	1	
	Metal manufacturing company (not iron and steel)	1	
	Textile or clothing manufacturing company	1	
	Hospital, Y. W. C. A., or other health or welfare organization	39	17
	Unspecified	13	
Asst. dietician	Hotel, restaurant, or other food establishment	1	
	Government, unspecified	1	
Consulting dietician	Hospital, Y. W. C. A., or other health or welfare organization	1	
Home demonstration agent	Government, U. S.	1	
	Government, state	11	6
	Government, county	120	44
Asst. home demonstration agent	Government, state	3	1
Social director	College or university	2	
	Hospital, Y. W. C. A., or other health or welfare organization	2	
	Church or religious association	1	
Matron	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	5	3

EARNINGS OF WOMEN

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FOOD, HOUSING, AND PERSONAL SERVICE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Matron	Abstract company, advertising, collection or employment bureau, or office service	1	
	College or university	8	2
	Normal school or teachers' college	2	
	School for handicapped	5	1
	Secondary school, public	2	
	School, unspecified	9	
	Educational institution, unspecified	1	
	Government, U. S.	1	1
	Government, state	7	
	Government, county	2	
	Government, city	1	
	Government, unspecified	5	
	Iron and steel manufacturing company	1	
	Manufacturing company, not elsewhere classified		1
	Newspaper, printing, or publishing company	1	
	Hospital, Y. W. C. A., or other health or welfare organization	43	9
	Women's or men's club or other fraternal organization	2	2
	Organization, not elsewhere classified	2	
	Railroad	2	
	Unspecified	3	1
Matron and nurse	Hospital, Y. W. C. A., or other health or welfare organization		1
Chaperon	College or university		2
	Theater, moving picture house, or entertainment bureau	1	
Hostess	Hotel, restaurant, or other food establishment	19	2
	Hospital, Y. W. C. A., or other health or welfare organization	4	3
	Women's or men's club, or other fraternal organization	1	
	Nurses' or other professional association	1	
Hostess and decorator	Retail store	1	
Asst. matron	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	2	
	Elementary school, public	1	
	Government, state	1	
Head of housing section	Chamber of commerce or other civic organization		1
Head, department unspecified	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
	Unspecified		1
Floor manager	Hotel, restaurant, or other food establishment		1
Asst. to manager	Hotel, restaurant, or other food establishment		5
Home management specialist	College or university	1	1
	Chamber of commerce or other civic organization	1	
	Unspecified	1	2
District agent for children's gardens	Government, state	1	
Clothing specialist	College or university	3	
Field worker	Unspecified	1	
Operator cream testing station	Unspecified	1	
Sanitarian	Normal school or teachers' college	1	
Caterer	Hotel, restaurant, or other food establishment	19	
	Chamber of commerce or other civic organization		1
Mortician	Mortician	38	8
Embalmer	Mortician	8	
Asst. mortician	Mortician	13	

FOOD, HOUSING, AND PERSONAL SERVICE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Mortician's asst.	Mortician	14	3
Beauty specialist	Beauty shop	346	34
Electrolysis operator	Beauty shop	5	1
Hairdresser	Beauty shop	33	10
Hairdresser and chiropodist	Beauty shop	1	
Manicurist	Beauty shop or barber shop	1	
Barber	Beauty shop or barber shop	1	
Housekeeper	Hotel	52	9
	College or university	1	1
	School for handicapped		1
Companion		5	1
Governess		4	2
Attendant	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	7	
	Hospital, Y. W. C. A., or other health or welfare organization		
		4	
Forelady	Laundry	1	
Stewardess	Unspecified	2	
Asst. steward	Government, state	1	
Custodian of linen	Hospital, Y. W. C. A., or other health or welfare organization	1	
Cook	Hotel, restaurant, or other food establishment	7	
	College or university	2	
	Secondary school, public	1	1
	School, unspecified		1
Gardener	Government, state		1
	Farm, nursery, or greenhouse	1	
Children's nurse	Private family		2
Maid	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	5	
Waitress	Hotel, restaurant, or other food establishment	15	5
	Retail store		1
	Commercial, unspecified		1
	Elementary school, public	2	
	Hospital, Y. W. C. A., or other health or welfare organization	1	
Bus girl	Hotel, restaurant, or other food establishment	2	
Janitress	College or university	1	
Laundress	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
	Hospital, Y. W. C. A., or other health or welfare organization	1	
Laundry worker	Laundry company	9	
Driver	Taxicab or transfer and trucking company	1	
Assistant, unspecified	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	
General help	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service		1
Helper	Hospital, Y. W. C. A., or other health or welfare organization	1	
Unspecified	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	6	
Group total		<u>2,291</u>	<u>418</u>

WELFARE

National president	Women's or men's club or other fraternal organization	1	
Deputy	Women's or men's club or other fraternal organization		1
Commissioner	Women's or men's club or other fraternal organization	1	

EARNINGS OF WOMEN

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WELFARE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Commissioner of poor	Government, state	1	
	Government, county	1	
	Government, unspecified	1	
Supervisor of institutions	Government, state	2	
Grand secretary	Women's or men's club or other fraternal organization	2	
Asst. club leader, state	Y. W. C. A. or other welfare organization		3
Chairman	Red Cross	1	
Superintendent	Government, state		2
	Government, county	1	
	Government, city or town	2	2
	Y. W. C. A. or other welfare organization	21	16
	Women's or men's club or other fraternal organization	1	1
	Trade association	1	
Superintendent of day nursery	Y. W. C. A. or other welfare organization	6	
Superintendent of municipal recreation	Government, city or town	1	
Asst. commissioner of paupers	Government, county	2	
Director	Y. W. C. A. or other welfare organization		3
Director of Girl Scouts	Y. W. C. A. or other welfare organization	6	
Director of women's world's fair	Women's or men's club or other fraternal organization	1	
Chief of staff	Y. W. C. A. or other welfare organization	1	
Manager of church and missionary work	Church or other religious association		1
Manager	Y. W. C. A. or other welfare organization	2	
	Women's club	1	
National secretary	Y. W. C. A.		3
Secretary	Y. W. C. A. or other welfare organization		6
District manager	Y. W. C. A. or other welfare organization	1	
	Women's or men's club or other fraternal organization	2	
District deputy	Women's or men's club or other fraternal organization	3	
Officer, unspecified	Fraternal lodge	1	
Executive secretary	Government, state		1
	Government, unspecified		1
National director	Women's or men's club or other fraternal organization	1	
Asst. superintendent	Y. W. C. A. or other welfare organization	4	1
Asst. supervisor of occupational therapy	Hospital, Y. W. C. A., or other health or welfare organization	1	
Asst. director	Government, city or town	1	
	Chamber of commerce or other civic organization	1	
	Y. W. C. A. or other welfare organization		2
Junior director	Y. W. C. A. or other welfare organization		1
Asst. manager	Y. W. C. A. or other welfare organization	1	
Asst. manager of community chest	Y. W. C. A. or other welfare organization	1	
Asst. director of recreation	Government, city or town	1	
Associate secretary	Chamber of commerce or other civic organization	1	
	Y. W. C. A. or other welfare organization	5	2
Asst. executive secretary	Church or religious association		
	Government, unspecified	1	
	Chamber of commerce, or other civic organization	9	
	Y. W. C. A. or other welfare organization	3	
Asst. secretary	Y. W. C. A. or other welfare organization		2
Business secretary	Y. W. C. A. or other welfare organization	3	24
Industrial secretary	Y. W. C. A. or other welfare organization	6	

WELFARE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Employment secretary	Y. W. C. A. or other welfare organization	1	2
Girl Reserve secretary	Y. W. C. A. or other welfare organization	1	3
Secretary girls' welfare	Y. W. C. A. or other welfare organization		1
Secretary welfare department	Unspecified	1	
Membership secretary	Y. W. C. A. or other welfare organization	1	
Relief secretary	Y. W. C. A. or other welfare organization		1
Social secretary	Y. W. C. A. or other welfare organization		2
Social service secretary	Government, county	1	
Department secretary, unspecified	Y. W. C. A. or other welfare organization	33	
Executive, unspecified	Y. W. C. A. or other welfare organization	4	
Registrar	Y. W. C. A. or other welfare organization	1	
	Women's or men's club or other fraternal organization	1	
Registrar to national director	American Red Cross	1	
County agent	Y. W. C. A. or other welfare organization	1	
Club leader	Trade association	1	
Field secretary	Y. W. C. A. or other welfare organization	4	
	Women's or men's club or other fraternal organization	1	
	Religious association or church	1	
Field chieftain	Girl Scouts organization		2
Captain, Girl Scouts	Girl Scouts organization	6	5
Scout commissioner	Girl Scouts organization	1	
Chautauqua representative	Y. W. C. A. or other welfare organization	2	2
Organizer	Y. W. C. A. or other welfare organization		2
	Women's club or other fraternal organization	1	2
	Trade association	1	
Social worker	Bank, investment company, or other financial organization	1	
	Real estate or insurance company	1	
	Retail store	1	
	Elementary school, public	1	
	School, unspecified	2	1
	Government, U. S.	1	1
	Government, state	11	5
	Government, county	11	1
	Government, city or town	18	1
	Government, unspecified	4	
	Oil, drug, paint, or other chemical manufacturing company	1	
	Public utility		1
	Iron and steel manufacturing company	1	
	Metal manufacturing company (not iron and steel)	1	
	Manufacturing company, not elsewhere classified	1	
	Textile or clothing manufacturing company	3	
	Chamber of commerce or other civic organization	1	
	Hospital, Y. W. C. A., or other health or welfare organization	46	32
	Women's or men's club or other fraternal organization	3	
	Church or religious association	3	2
	Street railway company	1	
	Unspecified	64	4
Field worker	Hospital, Y. W. C. A., or other health or welfare organization	3	3
	Women's or men's club or other fraternal organization	1	
Recreation specialist	Government, U. S.	1	
	Government, city or town	2	
Asst. labor inspector	Government, state		1
Asst. medical aid adjustor	Government, state		2
Travellers' aid worker	Travellers' aid society	12	2
Humane officer	Humane society	1	

WELFARE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Head psychiatric social worker	Hospital, Y. W. C. A., or other health or welfare organization		1
Occupational therapist	Government, state		3
	Hospital, Y. W. C. A., or other health or welfare organization	2	2
	Unspecified	2	
Reconstruction aide	Government, U. S.	3	
	Government, state	3	
Acting secretary	Chamber of commerce or other civic organization	1	
Asst. registrar	Y. W. C. A. or other welfare organization	1	
Unspecified	Y. W. C. A. or other welfare organization	3	
Executive secretary	Chamber of commerce or other civic organization		
	Y. W. C. A. or other welfare organization	10	10
	Women's club or other fraternal organization	116	79
	Organization, not elsewhere classified	2	3
	Nurses' or other professional association	1	1
	Church or religious association	1	3
	Trade association	1	
	Welfare organization, unspecified		2
	Unspecified		2
Executive secretary and director of field work	Chamber of commerce or other civic organization	1	
General secretary	Chamber of commerce or other civic organization	1	
	Y. W. C. A. or other welfare organization	107	1
	Women's club or other fraternal organization	3	
	Organization, not elsewhere classified	2	
	Trade association	1	
Chairman, division	Chamber of commerce		1
Secretary	Branch, Y. W. C. A.		48
Director of athletics	Y. W. C. A. or other welfare organization	1	
Director of charity department	Government, city or town	2	
Director of child welfare	Government, state	1	
Director of city welfare department	Government, city		1
Director of educational work	Y. W. C. A. or other welfare organization		2
Director of labor department	Government, state	1	
Director of occupational therapy	Government, state	1	
	Hospital, Y. W. C. A., or other health or welfare organization	2	2
	Unspecified	1	
Director of recreation	Y. W. C. A. or other welfare organization		3
Director of social service	Y. W. C. A. or other welfare organization	7	2
	Welfare organization, unspecified	1	
Director of student activities	Church or religious association	1	
Director of welfare work	Government, county		1
	Metal manufacturing company (not iron and steel)	1	
	Manufacturing company, not elsewhere classified	1	
Director of women's recreation	Government, city or town		1
Supervisor	Women's club or other fraternal organization		1
Playground supervisor	Government, city or town	1	
Manager of community room	Y. W. C. A. or other welfare organization	1	
Asst. superintendent	Government, county	1	
Group total		647	315

LIBRARY

Occupation	Employer	Number in Federation	Number in Reporting Group
Director	State library commission		1
Executive secretary	State library commission	1	
Supervisor	Government, city or town		1
Librarian and professor of library science	College or university		1
Librarian and instructor of library science	College or university		1
Secretary and librarian	Oil, drug, paint, or other chemical manufacturing company		1
Librarian	Bank, investment company, or other financial organization	1	1
	Abstract company, advertising, collection or employment bureau, or office service	2	
	Real estate or insurance company	1	1
	Retail store	1	1
	College or university	43	12
	Normal school or teachers' college	8	2
	Secondary school, public	31	24
	School, unspecified	11	
	Educational institution, unspecified	1	
	Library, U. S.	1	4
	Library, state	15	1
	Library, county	5	4
	Library, city	216	79
	Government, unspecified	1	4
	Oil, drug, paint, or other chemical manufacturing company	3	2
	Manufacturing company, not elsewhere classified		1
	Public utility	1	2
	Newspaper, printing, or publishing company	7	2
	Hospital, Y. W. C. A., or other health or welfare organization	4	
	Women's or men's club or other fraternal organization		1
	Church or religious association	3	
	Trade association	1	
	Unspecified	33	2
Asst. librarian	College or university	6	3
	Normal school or teachers' college	1	
	Secondary school, public	2	1
	School, unspecified	1	
	Library, state	3	1
	Library, city	36	27
	Unspecified		1
Asst. librarian and children's supervisor	Library, city		1
Asst. librarian and cataloguer	Library, city		1
Manager of library	Unspecified	1	
Director of travelling library	Library, state	1	
Field representative	Library, city	1	
Director of children's work	Library, city		2
Supervisor of circulation	Library, city		2
Reference librarian	Retail store		1
	College or university		1
	Library, city		8
Reference librarian and cataloguer	Library, state		1
Department manager	Library, college or university	1	
	Library, city	4	
Head of training class	Library, city	1	
Head cataloguer	Library, college or university	2	2
	Library, state		1
	Library, city	1	1
Cataloguer	Library, college or university	3	
	Library, state	1	
	Library, city	2	

EARNINGS OF WOMEN

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LIBRARY, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Asst. cataloguer	Library, college or university	1	
Research asst.	Library, city		2
Circulation asst.	Library, city		2
Asst. in library	Library, college or university	3	
	Library, city	4	
Clerk	Library, college or university		1
	Library, city		1
Group total		<u>465</u>	<u>205</u>

LEGAL AND PROTECTIVE

Judge	Government, state	1	
	Government, county	1	
	Government, city or town	2	
	Government, unspecified	2	
Judge of juvenile court	Government, city or town	1	1
	Government, unspecified	1	
Judge of probate court	Government, county	2	1
	Government, unspecified	3	
Police judge	Government, city or town	1	
Asst. attorney general	Government, state	2	
U. S. commissioner	Government, U. S.	1	
Railroad commissioner	Government, U. S.	1	
Deputy insurance commissioner	Government, state	1	
Master commissioner of court	Government, county	1	
Commissioner of juvenile court	Government, unspecified	1	
Justice of the peace	Government, unspecified	2	
Justice of the peace and law clerk	Unspecified	1	
Notary public	Abstract company, advertising, collection or employment bureau, or office service	7	
	Real estate or insurance company	3	
Notary public and secretary	Law firm	3	
Notary public and private secretary	Bank, investment company, or other financial organization	1	
	Real estate or insurance company	1	
Clerk of the court	Government, U. S.		4
	Government, state	2	
	Government, county	10	21
	Government, unspecified	11	
Clerk and master of chancery court	Government, city or town		1
	Government, unspecified	1	
Lawyer's asst. and clerk of the court	Law firm	1	
Register in probate	Government, county	1	
	Government, unspecified	1	
Registrar	Government, county	2	1
Recorder, court	Government, unspecified	1	1
Deputy circuit clerk	Government, U. S.	1	
	Government, state	1	3
	Government, county	3	
	Government, unspecified	5	
Deputy chancery clerk	Government, county	2	
	Government, city or town		1
	Government, unspecified		2
Deputy clerk of the court	Government, U. S.		6
	Government, state	1	
	Government, county	1	19
	Government, unspecified	1	
Deputy probate clerk	Government, unspecified	3	
Deputy recorder, court	Government, unspecified	1	
Deputy clerk and master of chancery court	Government, city or town		1

LEGAL AND PROTECTIVE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Asst. registrar	Government, county	1	
Asst. ordinary	Government, unspecified	1	
Asst. district attorney	Government, U. S.	1	
City attorney	Government, city or town		1
Asst. attorney	Government, U. S.		2
	Government, county	2	
	Government, city or town	1	
Prosecutor	Government, city or town	1	
Asst. prosecuting attorney	Government, unspecified	1	
Investigator and prosecutor	Government, county	1	
Lawyer	Bank, investment company, or other financial organization	1	
	Retail store	1	
	Government, U. S.	1	
	Government, state	2	1
	Government, county	4	
	Government, city or town	2	
	Government, unspecified	1	
	Law firm	39	15
	Own practice	118	36
	Railroad	2	
Lawyer and secretary	Hospital, Y. W. C. A., or other health or welfare organization	1	
Associate attorney	Law firm	1	
Trial assistant	Law firm	1	
Department manager	Law firm	1	
Examiner	Government, U. S.		1
Title examiner	Government, city or town	2	
Legal investigator	Railroad	1	
Law clerk	Government, state		1
	Law firm		4
Lawyer's asst.	Public utility		1
	Government, state		4
Secretary and asst. lawyer	Government, state		1
Parliamentarian	Unspecified	1	
Deputy marshal	Government, U. S.	2	1
Sheriff and collector of fire tax	Government, unspecified	1	
Deputy sheriff	Government, county	5	4
	Government, unspecified	5	
Constable	Government, county	1	
Deputy and matron, sheriff's office	Government, county		1
Guardian of homeless children	Government, state	1	
Parole officer	Government, state	2	
Friend of the court	Government, county	1	
Probation officer and friend of the court	Government, county	1	
Probation officer	Government, state	1	
	Government, county	11	
	Government, city or town	9	
	Government, unspecified	14	10
	Unspecified		1
Probation officer and secretary	Government, county	1	
Probation officer and matron	Government, city or town	1	1
	Government, unspecified	1	1
	Unspecified	1	1
Asst. probation officer	Government, county		1
Juvenile officer	Government, county	2	
	Government, unspecified	1	
Truant officer	Board of education	2	2
	Unspecified	4	
Police matron	Government, city or town	11	1
	Government, unspecified	5	
Detective	Government, city or town		1
	Unspecified		1
Policewoman and detective	Government, city or town		3
Policewoman and supervisor	Government, city or town		1

EARNINGS OF WOMEN

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LEGAL AND PROTECTIVE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Policewoman	Government, city or town	12	6
	Government, unspecified	8	
Fingerprint expert	Government, U. S.	1	
	Government, county	1	
	Government, city or town	1	1
Inspector	Government, U. S.	1	
	Government, state	1	
Customs inspector	Government, U. S.	1	
Scaler of weights	Government, county	1	
Censor	Government, state	1	
Amusement inspector	Government, state	1	2
	Government, city or town	1	
Agent, fire relief	Government, state	1	
Asst. attendance officer	School, unspecified	1	
Superintendent, state institution	Government, state	2	1
Manager, county institution	Government, county	1	
Superintendent women's police division	Government, city or town	1	1
Chief of women's bureau	Government, city or town	1	
Asst. superintendent, state institution	Government, state	1	
Proprietor	Abstract company	5	5
Vice-president	Abstract company	1	1
Vice-president and secretary	Abstract company	1	
Manager	Abstract company	11	
Asst. manager	Abstract company	3	1
Asst. secretary and asst. manager	Abstract company	1	1
Investigator	Abstract company	1	
Conveyancer	Abstract company	1	
Group total		415	182

EDITORIAL

Proprietor	Newspaper, printing, or publishing company	10	1
Editor and partner	Newspaper, printing, or publishing company	1	
Writer	Government, U. S.	1	1
	Newspaper, printing, or publishing company	5	1
	Independent	24	7
Writer and politician		1	
Author and lecturer		3	
Playwright		1	
Journalist	College or university	1	
	Newspaper, printing, or publishing company	12	
Translator		1	1
Manager	Newspaper, printing, or publishing company	2	
Asst. manager	Newspaper, printing, or publishing company	1	
Business manager	Newspaper, printing, or publishing company	3	2
Asst. business manager	Newspaper, printing, or publishing company	2	2
Managing editor	Newspaper, printing, or publishing company	1	
Asst. managing editor	Newspaper, printing, or publishing company	1	
Asst. to husband	Newspaper	6	
Editor and publisher	Newspaper	4	
Editor	Newspaper, printing, or publishing company	55	11
Editor and special writer	Newspaper, printing, or publishing company	1	
Associate editor	Newspaper, printing, or publishing company	4	3
Asst. editor	Vocational or technical school	1	
	Newspaper, printing, or publishing company	25	5
	Railroad	1	
City editor	Newspaper, printing, or publishing company	2	
Dramatic editor	Newspaper, printing, or publishing company	2	
Department head	Newspaper, printing, or publishing company	1	
Editorial writer	Newspaper, printing, or publishing company	16	
Feature editor	Newspaper, printing, or publishing company	6	1

EDITORIAL, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
News editor	Newspaper, printing, or publishing company		2
Political editor	Newspaper, printing, or publishing company	1	
Publisher	Unspecified	1	
Society editor	Newspaper, printing, or publishing company	68	25
Book review editor	Newspaper, printing, or publishing company	1	1
Vicinity editor	Newspaper, printing, or publishing company		7
Club editor	Newspaper, printing, or publishing company	1	
Editor and clerk	Railroad	1	
Reporter and feature writer	Newspaper, printing, or publishing company		6
Reporter	Newspaper, printing, or publishing company	180	32
Reporter and collector	Newspaper, printing, or publishing company	1	
Reporter and linotype operator	Newspaper, printing, or publishing company		1
Reporter and proofreader	Newspaper, printing, or publishing company		4
Proofreader	Government, state	2	
	Government, county	1	1
	Newspaper, printing, or publishing company	26	25
	Church or religious association	2	
	Unspecified	4	
Advertisement writer	Advertising company	6	
	Newspaper, printing, or publishing company	5	
Copywriter	Advertising company	1	2
	Retail store	1	1
	Newspaper, printing, or publishing company		2
	Unspecified		1
Compiler	Newspaper, printing, or publishing company	1	
Correspondent, news	Government, state		
Correspondent	Newspaper	3	
Member of news staff	Newspaper	1	
Editorial asst.	Newspaper, printing, or publishing company		5
Unspecified	Newspaper, printing, or publishing company	17	
Group total		491	168

PURCHASING

Purchasing agent	College or university	1	1
	Government, county	1	
	Oil, drug, paint, or other chemical manufacturing company		2
	Public utility	1	
	Lumber or furniture manufacturing company	1	
	Metal manufacturing company (not iron and steel)	2	1
	Manufacturing company, not elsewhere classified	3	
	Newspaper, printing, or publishing company	1	1
	Textile or clothing manufacturing company	1	
	Street railway company	1	
Buyer	Retail store	259	46
	Wholesale house	1	1
	Commercial company, unspecified	4	1
	Government, state	1	
	Manufacturing company, not elsewhere classified		1
	Trade association	1	
	Unspecified	8	1
Buyer and asst. manager	Retail store		3
Buyer and dept. manager	Retail store		19
Buyer and cost accountant	Wholesale house		1
Buyer and cosmetiere	Retail store		3
Buyer and sales clerk	Retail store		28
	Commercial company, unspecified		1
Buyer and bookkeeper	Retail store	2	5
Buyer and clerk	Y. W. C. A. or other welfare organization	1	
Asst. purchasing agent	Wholesale house	1	1

EARNINGS OF WOMEN

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PURCHASING, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Asst. purchasing agent	Iron and steel manufacturing company	1	1
	Metal manufacturing company (not iron and steel)	1	
	Manufacturing company, not elsewhere classified	1	
	Textile or clothing manufacturing company	1	1
Asst. purchasing agent and stenographer	Manufacturing company, not elsewhere classified		1
Asst. buyer	Retail store	19	18
	Wholesale house	1	1
	Unspecified		2
Professional shopper	Retail store	2	
Space buyer	Advertising company	1	1
Group total		37	14

RESEARCH

Proprietor	Clinical laboratory		1
Director of museum	Government, city or town	1	
Director of state laboratory	Government, state		1
Director	Own medical laboratory		1
Manager of laboratory	Textile or clothing manufacturing company	1	
Director of educational research	Elementary school, public		1
Director of bacteriology	Hospital or other health organization	1	
Director of economic research	Chamber of commerce or other civic organization	1	
Director of food economics department	Food manufacturing or packing company	1	
Statistical director	Unspecified	1	
Asst. superintendent historical society	Government, state	1	
	Professional association		1
Asst. director of laboratories	Government, state		1
Statistician and manager educational bureau	College or university		1
	College or university		1
Research associate	College or university	1	
Associate in cancer research	College or university	1	
Associate in personnel research	College or university	1	
Curator	College or university		1
	Government, state	1	
Laboratory supervisor	Unspecified	1	
	Food manufacturing or packing company		1
Bacteriologist	College or university	1	
	Government, state	2	1
	Government, city or town	2	4
	Oil, drug, paint, or other chemical manufacturing company		1
	Food manufacturing or packing company	1	
	Manufacturing company, not elsewhere classified	1	
	Doctor	1	
	Hospital or other health organization	7	2
	Unspecified	4	
	Hospital or other health organization	1	
Bacteriologist and nurse	Hospital or other health organization	1	
Biologist	College or university	1	
	Unspecified	1	
Biochemist	Hospital or other health organization		1
Chemist	Oil, drug, paint, or other chemical manufacturing company	5	
	Food manufacturing or packing company	3	2
	Hospital or other health organization	3	2
	Unspecified	1	

MICHIGAN BUSINESS STUDIES

RESEARCH, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Physicist	Government, U. S.	1	
	Government, unspecified		1
Psychologist	Government, state	1	
School psychologist	Secondary school, public	1	
Actuary	Insurance company	1	
Asst. secretary and actuary	Insurance company	1	2
Asst. actuary	Insurance company	1	
	Church or religious association	1	
	Unspecified		1
Asst. bacteriologist	Government, state	1	
	Government, city or town	1	1
Asst. chemist	Government, city or town	1	
	Food manufacturing or packing company		3
	Hospital or other health organization	1	
Serologist	Hospital or other health organization	1	
Genealogist	Government, state	1	
Historian	Hospital or other health organization	1	
Radiologist	Hospital or other health organization		4
Medical technician	College or university		1
Laboratory technician	Unspecified	4	2
X-ray technician	Hospital or other health organization	2	
Personnel research worker	Cartoonist	1	
Research worker	Doctor		1
Analyst	Government, unspecified	1	
	Manufacturing company, not elsewhere classified	1	
	Farm, nursery, or greenhouse	1	
	Telephone company	1	
	Unspecified		1
Income analyst	Bank, investment company, or other financial organization	1	
Sales analyst	Food manufacturing or packing company	1	
Seed analyst	Wholesale house	1	
	Unspecified	1	
Microscopic clerk	Government, unspecified		1
Microscopist	Unspecified	1	
Technician	College or university	2	
	Government, state	2	
	Government, unspecified		1
	Dentist	2	
	Doctor	17	10
	Hospital or other health organization	24	20
	Railroad		1
	Unspecified	6	
Laboratory asst.	Government, county	1	
	Hospital or other health organization	3	
Museum asst.	Government, city or town	1	1
Asst. to physician and surgeon			1
Asst. in dept. of highways	Government, state		1
Asst. to city chemist	Government, city		1
Asst. technician	Hospital or other health organization	1	
Tester	Food manufacturing or packing company	2	2
Tester, gasoline	Government, state	1	
Unspecified	School, unspecified		1
Group total		136	80

PERSONNEL

Proprietor	Employment bureau	16	5
	Vocational guidance bureau	1	
Partner	Employment bureau	2	
Manager, placement bureau	Vocational or technical school	1	
Manager	Teachers' employment bureau	10	3

EARNINGS OF WOMEN

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PERSONNEL, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Director, vocational guidance bureau	Board of education	1	
Secretary, bureau of appointments	College or university		2
Asst. manager	Vocational or placement bureau		2
Supervisor of vocational guidance	School, unspecified		1
Supervisor	Employment bureau	1	2
Supervisor of employment agency	Government, state		2
Vocational secretary	Elementary school, public		1
	Y. W. C. A. or other welfare organization		1
Counsellor, vocational and educational	Elementary school, public		2
	Secondary school, public		3
Vocational counsellor	Y. W. C. A. or other welfare organization		2
Placement clerk	Government, state		1
Examiner, employment service	Government, U. S.		2
Personnel director	Bank, investment company, or other financial organization	6	1
	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	2	1
	Retail store	7	11
	College or university	1	
	Government, U. S.		1
	Public utility		1
	Iron and steel manufacturing company	2	1
	Lumber or furniture manufacturing company	1	1
	Manufacturing company, not elsewhere classified	1	2
	Telegraph company	1	
	Unspecified		2
Director of planning and personnel	Real estate or insurance company		1
Manager, employment and service department	Manufacturing company, not elsewhere classified		2
Employment manager	Retail store	6	3
	Wholesale house	2	
	Retail and wholesale house		1
	Government, unspecified	1	
	Iron and steel manufacturing company	3	3
	Metal manufacturing company (not iron and steel)	1	1
	Manufacturing company, not elsewhere classified	3	
	Textile or clothing manufacturing company	1	3
	Telephone company	1	3
	Unspecified	3	
Asst. employment manager	Bank, investment company, or other financial organization	1	
	Abstract company, advertising, collection or employment bureau, or office service	2	
	Metal manufacturing company (not iron and steel)	1	
Director of welfare	Retail store		1
Director of women	Public utility		1
Director of tests	Elementary school, public		1
	School, unspecified		3
Employment supervisor	Retail store	1	
	Telephone company	1	
	Unspecified	1	
Manager of department	Iron and steel manufacturing company	1	
Director of social science	Iron and steel manufacturing company	1	
District employment manager	Abstract company, advertising, collection or employment bureau, or office service	1	
Efficiency director	Retail store	1	

PERSONNEL, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Director of studio for personal development		1	
Personnel and production executive	Newspaper, printing, or publishing company	1	
Employment and clerical superintendent	Public utility	1	
Personnel secretary	Board of education	1	
Employment secretary	Wholesale house	1	
Civil service examiner	Government, U. S.	1	
Personnel worker	Vocational or technical school		1
	Oil, drug, paint, or other chemical manufacturing company		1
	Iron and steel manufacturing company	2	
	Manufacturing company, not elsewhere classified	2	
Employment agent	Retail store	1	
Personnel asst.	Retail store	1	
Asst. in personnel department	Manufacturing company, not elsewhere classified		1
Unspecified	Abstract company, advertising, collection or employment bureau, or office service	1	
	Retail store	1	
	Telephone company	1	
Group total		<u>100</u>	<u>75</u>

SERVICE

Claim adjustor	Newspaper, printing, or publishing company	2	
	Live stock farm	1	
	Railroad	2	
	Telephone company		1
Asst. claim agent	Government, state	1	
Advisor of homemakers	Retail store		1
Budget specialist	Government, city or town	1	
Furniture stylist and budget specialist	Retail store	1	
Home economist	Public utility	1	
Hostess	Retail store	1	
	Food manufacturing or packing company		1
Personal shopper	Retail store	2	
Window decorator	Retail store	8	
	Public utility	1	
Historical guide	Government, unspecified	1	
Public relations worker	Street railway company	1	
	Telephone company	1	
	Unspecified	1	
Custodian of building	Bank, investment company, or other financial organization	1	
Mail censor	Government, state	1	
Mail carrier	Government, U. S.	7	
Asst. to postmaster	Government, U. S.	1	
Elevator operator	Government, county	1	1
	Unspecified	2	
Proprietor	Physicians' exchange	2	
Postmaster	Government, U. S.	62	19
Asst. postmaster	Government, U. S.	16	11
Commissioner of cemeteries	Government, city or town	1	
Executive secretary	Automobile club		2
Service manager	Retail store	1	
Manager of personal service	Manufacturing company, not elsewhere classified	1	1
Superintendent of goodwill department	Telephone company	1	
Traffic manager	Abstract company, advertising, collection or employment bureau, or office service	1	

EARNINGS OF WOMEN

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SERVICE, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Traffic manager	Retail store	1	
	Retail and wholesale house	1	
	Food manufacturing or packing company	1	
	Manufacturing company, not elsewhere classified	4	1
Traffic manager and cashier	Food manufacturing or packing company		1
Asst. manager service department	Lumber or furniture manufacturing company	1	
	Manufacturing company, not elsewhere classified		1
Asst. director public relations	Public utility		1
Asst. superintendent goodwill department	Telephone company	1	
Asst. traffic manager	Wholesale house		1
	Food manufacturing or packing company		1
Window display manager	Retail store	1	
Piano tuner	Retail store	2	
Claim adjustor	Hotel, restaurant, beauty shop, laundry, mortician, or other living or personal service	1	1
	Real estate or insurance company	1	
	Retail store	1	
	Government, state	1	
Group total		138	45

PROFESSIONAL, NOT ELSEWHERE CLASSIFIED

Horticulturist		1	1
Architect	School, unspecified	1	
		8	
Landscape artist		3	2
Landscape gardener	Government, city or town	1	
Director of chorals	Church or religious association	2	1
Director of music	Theater, moving picture house, or entertainment bureau	2	
Actress		12	3
Dramatic artist		2	
Lecturer		21	
Public reader		1	
Impersonator		1	
Dramatic reader and lecturer		2	
Artist	Advertising company	3	1
	Retail store	3	
		25	
Miniature painter		1	
Sculptress		1	
Commercial artist		4	1
Decorative designer		3	
Artist, cattle brand	Government, state	2	1
Accompanist		3	
Singer	Theater, moving picture house, or entertainment bureau	1	
Concert singer			3
Vocalist	Church or religious association	1	
Singer	Unspecified	14	
Pianist	Church or religious association	1	
	Theater, moving picture house, or entertainment bureau	7	3
		1	

PROFESSIONAL, NOT ELSEWHERE CLASSIFIED, Continued

Occupation	Employer	Number in Federation	Number in Reporting Group
Violinist	Hotel, restaurant, or other food establishment	1	
Musician	Unspecified	50	1
Organist	Theater, moving picture house, or entertainment bureau	4	1
	Church or religious association	5	1
	Unspecified	4	
Organist and choir director	Church or religious association		1
Engineer	Railroad	1	
Engineer of service	Drug store		1
Pharmacist		39	6
Aviatrix		1	
Character analyst		6	1
Hand reader			1
Graphologist		1	
Astrologer		1	
Group total		<u>232</u>	<u>34</u>

RELIGIOUS

Minister	Church or religious association	6	3
Minister and author	Professional	1	
Asst. pastor	Church or religious association	1	1
Revival worker	Temperance society		1
Missionary	Church or religious association	4	3
Deaconess	Church or religious association	4	3
Christian science reader	Church	1	
Christian science practitioner	Church	10	1
Field or executive secretary	Church or religious association		1
Secretary	Church or religious association	13	
Superintendent in church	Church or religious association	1	
Associate superintendent	Church or religious association		1
Asst. superintendent	Church or religious association	1	
Asst. captain	Salvation Army	1	
Officer	Salvation Army	5	1
Parish worker	Church or religious association	3	
Church worker	Church		2
Church hostess	Church	1	
Healer	Church or religious association		1
Asst. to minister	Church or religious association	1	8
Business secretary	Church or religious association		1
Group total		<u>62</u>	<u>18</u>

ADMINISTRATIVE, NOT ELSEWHERE CLASSIFIED

Proprietor	Collection bureau	2	
	Water company	1	
	Transportation company, miscellaneous	1	
	Taxicab or transfer and trucking company	8	
	Water transportation company	1	
Partner	Collection bureau	1	
	Transportation company, miscellaneous	1	2
President	Railroad		1
Executive secretary	City planning commission		1
Secretary	Storage company		1
	Street railway company		1
	Taxicab or transfer and trucking company		1
Superintendent	Telephone company	1	

EARNINGS OF WOMEN

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ADMINISTRATIVE, NOT ELSEWHERE CLASSIFIED, CONTINUED

Occupation	Employer	Number in Federation	Number in Reporting Group
Travelling superintendent	Telephone company	1	
Manager	Travellers' association		1
	Transportation company, miscellaneous	1	1
	Taxicab or transfer and trucking company	4	2
Manager of local office	Railroad	1	
Asst. superintendent	Railroad	1	
Asst. manager	Express company	1	
	Telephone company		1
Department manager	Chamber of commerce or other civic organization	1	
	Telephone company	1	
	Water transportation company	1	
Supervisor, unspecified	Government, county	1	
Group total		<u>29</u>	<u>12</u>

AMUSEMENTS

Proprietor	Theater, moving picture house, or entertainment bureau	15	5
Proprietor and manager of orchestra		1	
Partner	Theater, moving picture house, or entertainment bureau	3	
Partner and asst. manager	Theater, moving picture house, or entertainment bureau	1	
Vice-president	Theater, moving picture house, or entertainment bureau	1	
Theatrical producer	Theater, moving picture house, or entertainment bureau	1	
Manager	Theater, moving picture house, or entertainment bureau	17	2
Concert manager	Theater, moving picture house, or entertainment bureau	3	
Concert promoter	Unspecified	1	
Orchestra director	Theater, moving picture house, or entertainment bureau	1	
Asst. manager	Theater, moving picture house, or entertainment bureau	10	
Entertainer	Theater, moving picture house, or entertainment bureau	1	
	Womens' or men's club or other fraternal organization	1	
Advance agent	Theater, moving picture house, or entertainment bureau	1	
Group total		<u>57</u>	<u>7</u>

POLITICAL

Senator	Government, state	1	
Legislator	Government, U. S.	1	
	Government, state	7	
	Government, county	1	
Representative	Government, state	2	
Asst. secretary of state	Government, state	1	
Deputy commissioner of lands	Government, state	1	
Mayor	Government, city or town	1	
Alderman	Government, city or town	1	
Councilman	Government, city or town	2	
Secretary of town	Government, city or town	1	
Executive secretary	Government, state	1	
Vice-chairman	Political organization	2	
National committeewoman	Political organization		1
Manager political campaign	Political organization		1
Campaign worker	Political organization	5	
Group total		<u>27</u>	<u>2</u>

APPENDIX IV

DEFINITIONS

Earnings. "Earnings" as used in this study refer to the earned income, whether salary or net business earnings, from a person's chief occupation. Supplementary income, earned or unearned, is not included in the earnings figures given here. The data for supplementary income are analyzed independently (p. 103 ff.).

Net Business Earnings. The directions for filling in the questionnaires which were sent to each local club in the Federation defined "net business earnings" as follows: "If in business for yourself, expenses to be deducted from gross earnings include rent, heat, light, salaries, interest on borrowed money invested in the business, maintenance of transportation facilities (i.e., trucks, automobiles, etc.) used in the business, and depreciation on equipment. Please note that there is a special space for indicating the amount of your own investment in your business." (See copy of questionnaire, p. 204).

Living Expenses. The following items have been included here in calculating "living expenses"—room, board, service, laundry, and transportation to and from work. The directions to persons filling in the questionnaires called attention to the following: "(1) Note that monthly living expenses are asked for. They can perhaps best be calculated from an annual total divided by twelve. This distributes seasonal expenses, such as coal, care of furnace, etc., through the year, and so gives a more accurate average. (2) Note that clothes are excluded. (3) 'Service' means domestic service, not medical or dental care. (4) 'Transportation' means daily transportation to and from work. If you have an automobile, do not include this expense under transportation. What we wish to secure is a figure which covers immediate, day-to-day expenses—rent, food, light, domestic service, laundry, and carfare. (5) If you have dependents living with you, do not try to separate their living expenses from your own, but give the total amount which you spend monthly on the items mentioned above."

Median. The median is the size of the middle item in a series arranged in order of magnitude. Fifty per cent of the total number of cases, when arranged in order of magnitude, lie below it, and fifty per cent above it. For instance, the statement, "median earnings are \$1,548," means simply that 50 per cent of the women included in the study are earning less than this amount, and 50 per cent are earning more. Similarly, "median age is 37.7 years" means that half of the total group are younger than 37.7 years, and half are older.

Quartiles. "Quartiles are closely related to the median. Just as the median was defined as that position on the scale of the variable which divides the items arranged in the order of magnitude into two equal parts, the quartiles are to be thought of as those positions on the scale which divide the items arranged in the order of magnitude into four equal parts. There are obviously three of these positions or quartiles. The one toward the lower values of the scale of the variable is referred to as the first, the one toward the upper range of the variable as the third. The second, or middle, quartile clearly is the median."¹ If for instance, earnings at the first quartile for the total group are \$1,213, this means that 25 per cent of the group are earning less than this amount, and 75 per cent are earning more. Similarly, if earnings at the third quartile are \$2,004, it means that 75 per cent are earning less, and 25 per cent more than this amount. Median and second quartile earnings are identical.

¹E. E. Day, *Statistical Analysis*, p. 170.

Coefficient of Correlation. A coefficient of correlation is a measure of the "degree of correspondence" between two variables. Suppose, for instance, one wishes to know the degree to which the amount women save varies with the amount they earn. If there were perfect correspondence between earnings and savings for the group studied, the coefficient of correlation would be $+1.00$. If there were complete independence between the two variables, earnings and savings, the coefficient of correlation would be zero; and if the correspondence between them were perfect but inverse—that is, high earnings were associated with small savings—it would be indicated by a coefficient of correlation of -1.00 . As a matter of fact, the correlation coefficient in this study for earnings of women with dependents and their savings is $+567$, or $+596$ for women without dependents, both of which indicate a fairly close relationship between earnings and savings. In contrast to these figures, the correspondence between earnings and the size of the community in which the work is carried on is comparatively slight, as indicated by the correlation coefficient $+235$. Perfect correlation between these variables would, as already shown, be indicated by a coefficient of $+1.00$.

Correlation Ratio. The correlation ratio is used instead of the coefficient of correlation as a measure of the degree of correspondence between two variables when their relationship is curvilinear, as in the case of age and earnings (Chart 4). The coefficient of correlation is used when the relationship is linear. The correlation ratio is to be interpreted in the same way as the coefficient of correlation—that is, $+1.00$ indicates perfect positive correlation; 0, complete independence; and -1.00 , perfect negative or inverse correlation (see above).

APPENDIX V

METHOD OF CONDUCTING THE STUDY

Problems of method in a study like this fall roughly into four major divisions corresponding to the stage of progress of the study. First, the scope and content of the questionnaire itself must be determined. Then come the questions of how to distribute and provide for an effective method of "follow-up" on the questionnaires. Third, there is the task of devising an occupational classification which lends itself to translation into code for use on Hollerith cards. And finally, a numerical code must be prepared in order to transfer the information contained in the questionnaires to Hollerith cards (Forms C and D, p. 212 ff.). Once the data are on these cards, the task of final tabulation requires only the services of an expert statistical machine operator. It is the decisions in the earlier stages of the study which determine its success or failure.

The questionnaire used here is in four sections, the first of which is concerned with such topics as education, marital status, mode of living, earnings, and savings (Form A, p. 204). The second section is devoted to a complete occupational history, including earnings. From the data in this section it is hoped to discover whether or not there are typical occupational sequences. The third and fourth sections are concerned with occupational requirements and interests, which will be analyzed in a later bulletin.

With the form and content of the questionnaires agreed upon, the next problems concerned their distribution and "follow-up." There were 46,760 questionnaires to be distributed among 813 groups varying in membership anywhere from six to six hundred. To remove all possibility of identification and at the same time to provide for "follow-up" on delinquents, questionnaires were numbered serially from one to fifty thousand. Records of the serial numbers of the blanks sent to each local club were kept by the Bureau of Business Research to which the questionnaires were returned directly by those who filled them out. As each blank was received at the Bureau, the corresponding number was crossed off the card of the club to which that particular blank had been sent.

From time to time, local club officers in charge of the survey were informed of the serial numbers of questionnaires not yet returned. These officers in turn kept lists indicating the number of the blank given to each club member; and so when "follow-up" letters listing the numbers of unreturned questionnaires were received from the Bureau of Business Research, the local officer could discover the identity of the delinquents from these serial lists.

In order to secure as nearly as possible standard procedure in filling in the blanks, each club officer locally in charge of the study received explicit directions for conducting the survey in her club (Form B, p. 209). These directions she was asked to present to her group at a club meeting. Although it is impossible to say how many club members were reached in this way, it is believed that the majority of clubs made use of these directions.

Between January 1 and June 14, 1927, 13,147 questionnaires were returned to the Bureau of Business Research. The last thousand came in slowly between June and December of that year. As soon as a considerable number of the questionnaires had been received, the work of classifying and coding the occupations enumerated in them was begun. The general scheme of classification used has already been described (p. 15 ff.).

With the exception of the occupational code, the code used in the study is given in full in Form D, p. 213 ff. The facts contained in the questionnaires were translated by means of this code into numbers, which in turn were recorded on Hollerith cards by means of hole-punching machines. There is, therefore, for each questionnaire a Hollerith card which shows *by the holes punched in it* the facts contained in the blank itself. These cards can be sorted and counted by machines to combine any sets of facts contained on them.

MICHIGAN BUSINESS STUDIES

FORM A

THE QUESTIONNAIRE

OCCUPATIONAL SURVEY OF BUSINESS AND PROFESSIONAL WOMEN

READ THROUGH CAREFULLY

FOREWORD

The National Federation of Business and Professional Women's Clubs has undertaken as one of its major projects for the year 1926-27 an occupational study of its members. This detailed study of the experience of a group of nearly 50,000 women, active in a variety of occupations, offers an unusual opportunity to gather information never before collected about the work of business and professional women. The chief aims of the study are (1) to provide an accurate occupational record of the members of the National Federation of Business and Professional Women's Clubs, and (2) to make available reliable vocational information to younger women who have not yet found their places in business or the professions. The study is also designed to throw light on such problems as dependency, earnings, training, promotion, combining marriage and careers, and placement methods, in the hope of assisting women to render increasingly effective service in the business and professional world.

The questions asked on the following pages are necessarily rather personal. The questionnaire, however, contains no means of identification, such as name, club, or employer, and you need therefore feel no hesitancy in giving full and accurate information. Furthermore, you will mail your questionnaire direct to the Bureau of Business Research at the University of Michigan, where the data will be compiled by a statistical staff under the direction of Dr. Margaret Elliott, Chairman of the National Personnel Research Committee. All information will be regarded as strictly confidential. No individual records will be published.

The study is yours to make a success or failure. Unless each member of the National Federation assumes a feeling of personal responsibility for carrying out the project, it cannot succeed. Will you not show your readiness to cooperate in so important a venture by filling in the questionnaire accurately and fully, and mailing it promptly in the attached envelope to the

Bureau of Business Research
 School of Business Administration
 University of Michigan
 Ann Arbor, Michigan

For further assistance in filling in the questionnaire, please consult your local Personnel Research Chairman, or Club President.

DO NOT SIGN YOUR NAME OR MARK IN ANY WAY FOR IDENTIFICATION

1. Education and Training

Please give dates of the following events: Birth month day year

Started to school Attended (a) Grade school year to year
 (b) High school (c) Business college (d) Normal school (e) College or university (f) Graduate school
 year to year year to year year to year
 or professional school year to year

Draw circle around the last grade or year in school which you completed. (Formal education) Grades 1 2 3 4 5 6 7 8 High or Preparatory 1 2 3 4 College or University 1 2 3 4 5 6 7 (excluding business college).

Degrees received Degree Date

Special courses not listed above	Subject studied	No. of months
1. Correspondence
2. Business college
3. Trade school
4. Night school
5. Tutor
6. Special reading

EARNINGS OF WOMEN

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Are you doing work for which you trained directly? Underscore Yes No Partly
Marital Status and Dependents

Underscore whether you are single, married, widowed, divorced, separated
 how many dependents Children Totally Partly Adults Totally Partly
 do you support? Own Parent
 Others Others

Approximately what *percentage* of your income goes for support of dependents?.....

The following questions in Section 2 are to be answered only by women who are or have been married.

Please give *dates* of the following events: Married..... Widowed..... Separated.....
 Divorced..... Birth of children..... If employed, time off job required by birth of each child:

Mos. before	<input type="checkbox"/>	Mos. after	<input type="checkbox"/>
	<input type="checkbox"/>		<input type="checkbox"/>
	<input type="checkbox"/>		<input type="checkbox"/>
	<input type="checkbox"/>		<input type="checkbox"/>

Present provision for care of children. Check method used: Relative Friends
 Housekeeper Trained nurse Nurse maid Day nursery Nursery school
 Public school and own services other hours Other provision

Financial Status

Present yearly salary in major occupation If in business on your own account, give annual net business earnings (deducting all expenses of operation, but *not income tax*) Amount of own investment in the business

Amount of yearly income from other sources: Special or evening work
 Inheritance or gifts Own savings invested

Amount of yearly savings from earned income (excluding gifts, inheritance, etc.)
 What *percentage* of your total savings is invested in: Real Estate
 Mortgages..... Savings Banks..... Building and Loan Associations..... Bonds..... Preferred stock.....
 Common stock..... Annuities..... Life Insurance.....

Underline your mode of living:

Live with parents or relatives	{	Pay board
		Pay no board
Have a house	{	Meals in
		Meals out
Have an apartment	{	Meals in
		Meals out
Have a room	{	Light housekeeping
		Take meals out

Calculate amount of monthly living expenses, including room, board, service, laundry, and transportation. Persons with dependents indicate amount here..... Persons without dependents indicate here.....

If you keep house, or have an apartment, do you have housekeeping assistance? Check Yes No Underscore whether paid or unpaid. About how many hours per week do you yourself give to housekeeping?..... How many hours of other unpaid assistance? How many hours of paid assistance? Average present weekly expenditure for paid assistance

1. Occupational History

Present position: Usual number of working hours per day..... Per week
 Average number of hours of overtime per week..... Underscore whether overtime is paid or unpaid.

Describe each position held since you first started to work. Begin with the first one and list them in order including your present one. Describe fully each new position within an organization in the same way as positions in a different organization, indicating how secured by *h* or *i* (see key).

It is most essential that this occupational history be complete. If more space is desired, please enclose an extra sheet using the same form for your answers.

Year to year	Title of position	Nature of business (e.g. department store, life insurance, etc.)	How secured*	Yearly salary	Duties (Describe in full. Use next line also)
1.
2.
3.
4.
5.
6.
7.
8.
9.
10.

*In column *How secured* put only the letter of the method which applies in your case as given in the following key. If the key does not give your method please name specifically in space *How secured*.

- | | | |
|----------------------------------|---|------------------------------------|
| a. Newspaper advertisement. | f. School or university placement service | h. Promotion within the company |
| b. Friend in the business | g. Fee charging placement bureau | i. Transfer within the company |
| c. "Cold" canvass | | j. Services sought by new employer |
| d. Family influence | | |
| e. Heard indirectly of a vacancy | | |

PERSONALITY REQUIREMENTS

Below you will find listed thirty personality traits which have been considered important for success in the professions and in business. Read through the list and underscore the ten which you have found to be the most necessary in doing the work which you do now. When you have selected these ten put the number (1) after the most important trait, (2) after the next most important and so on until you have put the number (10) after the least important of the ten chosen.

Ability to follow directions	Conversational ability	Originality
Ability to handle and deal fairly with people	Courteous	Resourcefulness
Adaptable	Creative imagination	Responsibleness
Alert	Forceful	Self-confidence
Analytical	Foresight	Self-control
Appearance pleasing	Humor	Systematic
Artistic	Initiative	Speed
Capacity for hard work and long hours	Kindliness	Strength (Physical)
Careful of details	Knowledge in special field	Tact
	Manual dexterity	Technical skill
	Organizing ability	

OCCUPATIONAL INTERESTS

After each of the occupations listed there are five symbols. Cross out one of the symbols after each occupation as follows:

Cross out L! if you would like very much doing that kind of work.

Cross out l if you would like doing that kind of work.

Cross out ? if you have no decided feeling toward that kind of work or know nothing about it.

Cross out d if you would dislike doing that kind of work.

Cross out D! if you would dislike very much doing that kind of work.

Disregard any salary or social difference or any possible family objections, consider only your interest and satisfaction in doing each of the kinds listed. You are not asked whether you would take up the occupation permanently; you are merely asked if you would enjoy that kind of work, regardless of whether you have the ability necessary for each of the occupations.

Abstractor	L! 1 ? d D!	Dancing teacher	L! 1 ? d D!
Accountant	L! 1 ? d D!	Deaconess	L! 1 ? d D!
Actress	L! 1 ? d D!	Dean	L! 1 ? d D!
Actuary	L! 1 ? d D!	Dean of women	L! 1 ? d D!
Adjuster	L! 1 ? d D!	Demonstrator	L! 1 ? d D!
Advertising agent	L! 1 ? d D!	Dentist	L! 1 ? d D!
Advertisement writer	L! 1 ? d D!	Dental hygienist	L! 1 ? d D!
Archaeologist	L! 1 ? d D!	Detective	L! 1 ? d D!
Architect	L! 1 ? d D!	Dietician	L! 1 ? d D!
Artist	L! 1 ? d D!	Domestic science teacher ..	L! 1 ? d D!
Artist's model	L! 1 ? d D!	Dramatist	L! 1 ? d D!
Art teacher	L! 1 ? d D!	Draftsman	L! 1 ? d D!
Asst. buyer (Dept. store) ..	L! 1 ? d D!	Dressmaker	L! 1 ? d D!
Athletic director	L! 1 ? d D!	Editor	L! 1 ? d D!
Auditor	L! 1 ? d D!	Educational director	L! 1 ? d D!
Auto saleswoman	L! 1 ? d D!	Elevator operator	L! 1 ? d D!
Bacteriologist	L! 1 ? d D!	Executive	L! 1 ? d D!
Baker	L! 1 ? d D!	Factory worker	L! 1 ? d D!
Bank executive	L! 1 ? d D!	Farmer	L! 1 ? d D!
Bank clerk	L! 1 ? d D!	File clerk	L! 1 ? d D!
Barber	L! 1 ? d D!	Florist	L! 1 ? d D!
Biologist	L! 1 ? d D!	Genealogist	L! 1 ? d D!
Book agent	L! 1 ? d D!	Geologist	L! 1 ? d D!
Book binder	L! 1 ? d D!	Governess	L! 1 ? d D!
Botanist	L! 1 ? d D!	Government clerk	L! 1 ? d D!
Business manager	L! 1 ? d D!	Grade school principal	L! 1 ? d D!
Business for self	L! 1 ? d D!	Grade school teacher	L! 1 ? d D!
Buyer (Dept. store)	L! 1 ? d D!	Hair dresser	L! 1 ? d D!
Canner	L! 1 ? d D!	Health inspector	L! 1 ? d D!
Cashier	L! 1 ? d D!	High school principal	L! 1 ? d D!
Caterer	L! 1 ? d D!	High school teacher	L! 1 ? d D!
Cattle raiser	L! 1 ? d D!	Home maker	L! 1 ? d D!
Chaperone	L! 1 ? d D!	Horticulturist	L! 1 ? d D!
Chemist	L! 1 ? d D!	Hostess (hotel)	L! 1 ? d D!
Choropodist	L! 1 ? d D!	Housekeeper	L! 1 ? d D!
Chiropractor	L! 1 ? d D!	Illustrator	L! 1 ? d D!
City or county clerk	L! 1 ? d D!	Importer	L! 1 ? d D!
Cleaner and dyer	L! 1 ? d D!	Interior decorator	L! 1 ? d D!
Clerical worker	L! 1 ? d D!	Interpreter	L! 1 ? d D!
Commercial teacher	L! 1 ? d D!	Journalist	L! 1 ? d D!
Companion	L! 1 ? d D!	Judge	L! 1 ? d D!
Cook	L! 1 ? d D!	Kindergartner	L! 1 ? d D!
Corsetiere	L! 1 ? d D!	Landlady	L! 1 ? d D!
Court reporter	L! 1 ? d D!	Landscape gardener	L! 1 ? d D!
Credit manager	L! 1 ? d D!	Laundress	L! 1 ? d D!
Dancer	L! 1 ? d D!	Lawyer	L! 1 ? d D!

Librarian	L!	1	?	d	D!	Proof reader	L!	1	?	d	D!
Life insurance solicitor ...	L!	1	?	d	D!	Psychiatrist	L!	1	?	d	D!
Magazine writer	L!	1	?	d	D!	Psychologist	L!	1	?	d	D!
Manicurist	L!	1	?	d	D!	Public stenographer	L!	1	?	d	D!
Manikin	L!	1	?	d	D!	Purchasing agent	L!	1	?	d	D!
Masseuse	L!	1	?	d	D!	Recreation director	L!	1	?	d	D!
Matron	L!	1	?	d	D!	Registrar	L!	1	?	d	D!
Medical missionary	L!	1	?	d	D!	Retail saleswoman	L!	1	?	d	D!
Milliner	L!	1	?	d	D!	Sales agent	L!	1	?	d	D!
Minister	L!	1	?	d	D!	Secretary	L!	1	?	d	D!
Minister's assistant	L!	1	?	d	D!	Singer	L!	1	?	d	D!
Missionary	L!	1	?	d	D!	Social secretary	L!	1	?	d	D!
Modiste	L!	1	?	d	D!	Social worker	L!	1	?	d	D!
Movie star	L!	1	?	d	D!	Statistician	L!	1	?	d	D!
Music teacher	L!	1	?	d	D!	Stenographer	L!	1	?	d	D!
Musician	L!	1	?	d	D!	Storekeeper	L!	1	?	d	D!
Newspaper reporter	L!	1	?	d	D!	Supervisor	L!	1	?	d	D!
Notary public	L!	1	?	d	D!	Surgeon	L!	1	?	d	D!
Novelist	L!	1	?	d	D!	Taxidermist	L!	1	?	d	D!
Nurse	L!	1	?	d	D!	Tea room proprietor	L!	1	?	d	D!
Office manager	L!	1	?	d	D!	Telegrapher	L!	1	?	d	D!
Osteopath	L!	1	?	d	D!	Telephone operator	L!	1	?	d	D!
Optician	L!	1	?	d	D!	Ticket agent	L!	1	?	d	D!
Personnel director	L!	1	?	d	D!	Translator	L!	1	?	d	D!
Pharmacist	L!	1	?	d	D!	Treasurer	L!	1	?	d	D!
Physician	L!	1	?	d	D!	Truant officer	L!	1	?	d	D!
Physicist	L!	1	?	d	D!	Truck gardener	L!	1	?	d	D!
Poet	L!	1	?	d	D!	Tutor	L!	1	?	d	D!
Politician	L!	1	?	d	D!	Typist	L!	1	?	d	D!
Post mistress	L!	1	?	d	D!	Usher	L!	1	?	d	D!
Post office clerk	L!	1	?	d	D!	Vocational counsellor	L!	1	?	d	D!
Poultry raiser	L!	1	?	d	D!	Waitress	L!	1	?	d	D!
Probation officer	L!	1	?	d	D!	Wife	L!	1	?	d	D!
Professor	L!	1	?	d	D!	Y. W. C. A. secretary	L!	1	?	d	D!

FORM B

DIRECTIONS FOR CONDUCTING THE OCCUPATIONAL SURVEY IN LOCAL CLUBS^[1]

I. DISTRIBUTION OF QUESTIONNAIRES.

1. As soon as questionnaires and return envelopes arrive, arrange a date for a club meeting at which the questionnaires will be explained.
2. Prepare a code list, assigning a questionnaire by number to each club member. You will find the questionnaires are numbered serially in the upper left-hand corner of the front page. For purposes of follow-up on members who fail to return their questionnaires, it is essential that you have an accurate record of the number of the questionnaire assigned to each member. From time to time, the National Personnel Research Committee will send you a list of numbers of questionnaires which have not yet been returned. By means of your code list, you can check up by telephone or letter on persons whose questionnaires bear these numbers. Without this code list, therefore, all follow-up will be impossible. A suggested form for your code list is as follows:

<u>Number of Questionnaire</u>	<u>Name of Member</u>	<u>Address</u>	<u>Telephone Number</u>
------------------------------------	---------------------------	----------------	-----------------------------

3. In sending out announcements of the time and place of the meeting at which the questionnaire is to be discussed, be sure to instruct members to bring their questionnaires with them to the meeting, but not to fill them out until *after* the meeting.
4. Distribute questionnaires according to the code list, making certain that you adhere strictly to the numbering scheme on your list.

II. SUGGESTIONS FOR CONDUCTING CLUB MEETING.

1. Familiarize yourself thoroughly with the questionnaire and its purposes before the meeting. Some objections are almost sure to be raised, and your position will be more secure if you anticipate these objections and meet them in advance ^[2]
2. After a preliminary statement of the purposes of the study, the questionnaire should be considered in detail, question by question, allowing members to raise their individual problems. The following points may well be stressed:
 - a. Education and Training.
 - (1) Dates, not number of years, are asked for.
 - (2) The questions cover formal education only. Private school education should be entered under Grade School, High School, et cetera, but not private tutoring, for which a special space is provided.
 - (3) Do not include business college work in estimating number of years spent in college or university. Describe business college courses in space provided opposite No. 2 of list of special courses.
 - (4) Indicate summer school work in college, graduate school, et cetera, separately.
 - (5) In circling number to indicate total years of education, it is assumed that normal school education is the equivalent of college or university training.
 - b. Financial Status.
This section, which will perhaps require more thought than any other, is one of the most significant. It will undoubtedly raise many individual problems, particularly for women in business for themselves. From it we shall learn not only what the salary range in each occupation is, but how much a woman spends on immediate living expenses, and how much she is able to save. The destination of these savings will also give interesting

¹These directions were sent to the club officer in each locality who was in charge of the survey. They were an important means of standardizing procedure in filling out the questionnaires.

²The detailed statement of purposes of the study, included for use of club officers who were unfamiliar with them, is omitted here.

investment data. Since it is an important section, please urge your members to make their calculations as accurate as possible. Attention should be drawn to the following points:

- (1) The first question aims to discover your *present annual earned income*.
 - (a) If on salary, state your annual salary for the present fiscal year in your organization.
 - (b) If in business for yourself, you will probably find it most convenient to work with figures calculated for the income tax returns of March 1, 1926.
 - (c) If in business for yourself, expenses to be deducted from gross earnings include rent, heat, light, salaries, interest on borrowed money invested in the business, maintenance of transportation facilities used in business (i.e., trucks, automobiles) and depreciation on equipment. Note special space for indicating amount of your own investment in your business.
- (2) The second question, which deals with sources of supplementary income, has three parts, namely, amount of yearly income from (1) special or evening work, (2) inheritance or gifts, (3) own savings invested.
 - (a) Note that the question refers to income, not capital. We are interested only in the yearly sum received from each of these three sources.
 - (b) If you have unearned income from other sources than these three, indicate source, and also amount of income from it in space beyond "Own Savings Invested."
- (3) The third question asks first for amount of yearly savings from earned income, and second, for the destination of your total savings on a percentage basis, i.e., (1) how much are you able to save in one year from your present salary, and (2) what percentage of your total savings have you invested in real estate, mortgages, bonds et cetera? (Compute these percentages by adding amounts in each form of investment and calculating what percentage each is of the total figure.)
 - (a) Note that amount of yearly savings is to be given in dollars, the other figures in percentages.
 - (b) Figure savings in life insurance on amount paid in up to present time, not on amount of the policy.
 - (c) This question is in no way concerned with your unearned income; i.e., inheritance, gifts, et cetera.
- (4) If your own mode of living is not included in those listed, describe it in space to the right of list.
- (5) Living expenses.
 - (a) Note that monthly living expenses are asked for. Perhaps they are best calculated from an annual total, divided by twelve. This distributes seasonal expenses, such as coal, care of furnace, et cetera, throughout the year and so gives a more accurate average.
 - (b) Note that clothes are excluded. "Service" means domestic service, not medical or dental care. "Transportation" means daily transportation to and from work. If you have an automobile, do not include this expense under transportation. What we wish to secure is a figure which covers immediate, day-to-day expenses—rent, food, light, domestic service, laundry, and carfare.
 - (c) If you have dependents living with you, do not try to separate their living expenses from your own, but give the total amount which you spend monthly on the items mentioned above.

c. Occupational History.

- (1) This is the most important single section in the questionnaire and, if it is fully and accurately filled out, will give valuable information on the "work histories" of women. It will correlate interestingly with the section on education and training, and will show what types of jobs hold greatest promise of advancement. The column "How secured" will, it is hoped, show the relative effectiveness of different ways of getting jobs.
- (2) Urge your club members to describe their duties in each occupation in full. Frequently titles are quite misleading, and unless a description of duties is given, it is impossible to get an accurate picture of the job. As the directions at the top of the page indicate, transfers and promotions within an organization are to be as fully described as changes to positions in different organizations.

d. Personality Requirements.

- (1) The obvious purpose of this section is to make an inventory of the personality requirements in each occupation, based on the judgment of many persons engaged in that occupation.
- (2) Note that the ten most important traits are to be selected on the basis of requirements of the exact work you are now doing, rather than on the requirements of the general field of work in which your job lies. For example, a cataloguer of foreign books in a library should give the ten most essential traits for cataloguing books on foreign material, not for general cataloguing.
- (3) The chief hazard in this section of the questionnaire is hasty selection of the ten most important traits. Accurate choice requires discriminating analysis of one's present job. Members should, therefore, be urged to go through the list slowly and carefully.

e. Occupational Interests.

- (1) From this section of the questionnaire we hope to derive information as to the variety and intensity of the occupational interests of a large number of active business and professional women. We also wish to discover whether persons engaged in the same field of work have similar occupational interests. The information derived from this and the preceding section will, it is hoped, be helpful in vocational counselling.
- (2) Please call attention of members to the fact that one of the five symbols is to be crossed out for *each* occupation listed.

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FORM D

CODE FOR TRANSFERRING DATA FROM QUESTIONNAIRES TO HOLLERITH CARDS

State where club is located—Columns 1-2.	Code	General education—Column 6.	Code
Alabama	00	Grades 1-4	0
Arizona	01	Grades 5-8	1
Arkansas	02	Grades 9-10	2
California	03	Grades 11-12	3
Colorado	04	Normal, with high school incomplete	4
Connecticut	05	Normal, high school complete	5
Delaware	06	College, 1, 2, 3 years	6
Florida	07	B.A. or B.S. degree	7
Georgia	08	B.A. degree and graduate work	8
Hawaii	09	M.A. or M.S.	9
Idaho	10	Ph.D. or Sc.D.	b
Illinois	11	Information missing	X
Indiana	12		
Iowa	13	Professional and trade training—Column 7.	
Kansas	14	None or not listed	X
Kentucky	15	Business course	0
Louisiana	16	Business course with non-diploma	
Maine	17	special courses	1
Maryland	18	M.D. degree	2
Massachusetts	19	R.N. degree	3
Michigan	20	Law degree	4
Minnesota	21	Dentist or pharmaceutical degree	5
Mississippi	22	Diploma in arts, music, elocution, etc. ¹	6
Missouri	23	Summer school courses	7
Montana	24	Trade and technical courses, not	
Nebraska	25	elsewhere classified	8
Nevada	26	Extension, correspondence, general	
New Hampshire	27	cultural courses	9
New Jersey	28	Osteopathic degree	b
New Mexico	29		
New York	30	Marital Status—Column 8.	
North Carolina	31	Single	0
North Dakota	32	Married	1
Ohio	33	Widowed	2
Oklahoma	34	Divorced	3
Oregon	35	Separated	4
Pennsylvania	36	Information missing	X
South Carolina	37		
South Dakota	38	Percentage of income to dependents—Column	
Tennessee	39	9.	
Texas	40	None	0
Utah	41	1-9	1
Vermont	42	10-19	2
Virginia	43	20-29	3
Washington	44	30-39	4
West Virginia	45	40-49	5
Wisconsin	46	50-59	6
Wyoming	47	60-69	7
Information missing	XX	70-79	8
		80 or over	9
		Information missing	X
Population of city or town where club is located—Column 3.			
		Number of dependents—Column 10.	
		Include total and partial.	
Less than 2,500	0	None	0
2,500-4,999	1		
5,000-9,999	2		1
10,000-24,999	3		2
25,000-49,999	4	Information missing	X
50,000-99,999	5	Present occupation ² —Columns 11, 12, 13, 14,	
100,000-249,999	6	15, 16, and 17.	
250,000-499,999	7		
500,000-999,999	8	First salary (in hundreds)—Columns 18-19.	
1,000,000 or over	9	\$4,550	45
Information missing	X	625	06
		3,899 or over	99
		Information missing	XX
Date of birth—Column 4-5.			
Code last two figures			
1893	93	¹ Including home economics, library science, kindergarten, and social service training.	
1902	02	² The occupational code will appear in a later bulletin.	
Information missing	XX		

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Date first salary (full time)—Columns 20-21. Code last two figures.		Amount of own investment in the business (in thousands)—Columns 34-35.	
1899	99	\$10,000	Code
1902	02	2,000	10
Information missing	XX	99,000 or over	02
		Information missing	99
			XX
Total number of years worked—Columns 22-23.		Amount of income from special work—Column	
Less than 1 year	00	36.	
Two years	02	0-99	0
27 years, etc.	27	100-199	1
Information missing	XX	200-299	2
		300-399	3
Number of different occupations—Column 24.		400-499	4
One	0	500-599	5
2	1	600-699	6
3	2	700-799	7
4	3	800-899	8
5	4	900-999	9
6	5	None	b
7	6	Information missing	X
8	7		
9	8	Amount of income from gifts and inheritance—Column 37.	
10 or over	9	0-99	0
Information missing	X	100-199	1
		200-299	2
Number of different types of work—Column 25.		300-399	3
One	0	400-499	4
2	1	500-599	5
3	2	600-699	6
4	3	700-799	7
Etc.		800-899	8
10 or over	9	900-999	9
Information missing	X	None	b
		Information missing	X
Number of years with present employers— Column 26.		Amount of income on savings invested—Col- umn 38.	
0-1.9	0	Same as 37.	
2-3.9	1	Amount of yearly savings from own income— Column 39.	
4-5.9	2	0-199	0
6-7.9	3	200-399	1
8-9.9	4	400-599	2
10-11.9	5	600-799	3
12-13.9	6	800-999	4
14-15.9	7	1,000-1,199	5
16-17.9	8	1,200-1,399	6
18 or over	9	1,400-1,599	7
Information missing	X	1,600-1,799	8
		1,800 or over	9
Number of years in present position—Column 27.		None	b
0-0.9	0	Information missing	X
1-1.9	1	Mode of living—Column 40.	
2-2.9	2	Live with parents, pay board	0
3-3.9	3	Live with parents, pay no board	1
4-4.9	4	Have a house, meals in	2
5-5.9	5	Have a house, meals out	3
6-6.9	6	Have a house, some meals in and some meals out	4
7-7.9	7	Have an apartment, meals in	5
8-8.9	8	Have an apartment, meals out	6
9 or over	9	Have an apartment, some meals in and some meals out	7
Information missing	X	Have a room, light housekeeping	8
		Have a room, meals out	9
Present salary (in hundreds)—Columns 28-29. Same as 18-19.		Not elsewhere classified	b
		Information missing	X
Difference between first (full time) and present salary in hundreds.—Columns 30-31. Same as 18-19.		Monthly living expenses, persons with de- pendents—Column 41.	
Present net business earnings (in hundreds) —Columns 32-33.		0-24	0
\$4,550	45	25-49	1
625	06		
9,899 or over	99		
Information missing	XX		

EARNINGS OF WOMEN

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	Code		Code
50-74	2	50-54.9	8
75-99	3	55 or over	9
100-124	4	Information missing	X
125-149	5		
150-174	6	Number of hours overtime present position—	
175-199	7	Column 44.	
200-224	8	0-1.9	0
225 or over	9	2-3.9	1
Information missing	X	4-5.9	2
		6-7.9	3
Monthly living expenses, persons without de-		8-9.9	4
pendents—Column 42.		10-11.9	5
Same as 41.		12-13.9	6
		14-15.9	7
Number of working hours per week, present		16-17.9	8
position—Column 43.		18 or over	9
Less than 15	0	None	b
15-19.9	1	Information missing	X
20-24.9	2		
25-29.9	3	Overtime, paid or unpaid—Column 45.	
30-34.9	4	Unpaid	a
35-39.9	5	Paid	1
40-44.9	6	Not in category	b
45-49.9	7	Information missing	X

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2003-04

MICHIGAN BUSINESS STUDIES, Continued

VOLUME III

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