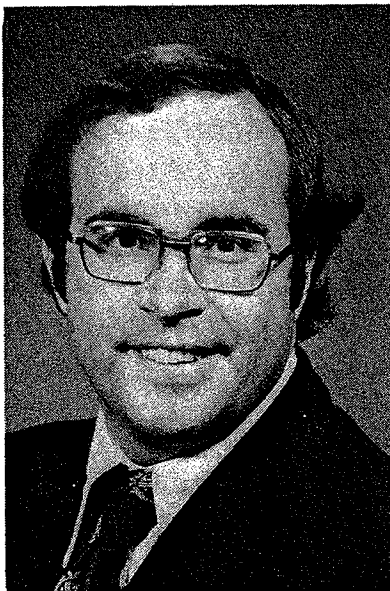


# RESIDUAL EFFECTS OF SELF-HELP AID ON THE LIVES OF COLLEGE GRADUATES

by *Timothy R. Sanford*

Of the four general types of student financial aid — scholarship, grant, loan, and work — two are considered self-help (loans and work) because the student awarded these types of aid incurs an obligation along with the actual funds received. Loan awards require that the recipient repay the money in the future, while work awards, obviously, are actual payment for services performed. Scholarships and grants, on the other hand, are not considered self-help because the student assumes no obligation in accepting the funds other than to remain in school. Scholarships usually reward past achievement whether it be academic, athletic, or artistic, and grants provide opportunity for otherwise needy or deserving students. The distinction between scholarships and grants and the self-help aids is not of particular importance outside of the student aid field because the primary emphasis is on the *providing* of financial assistance to needy students rather than on the *type* of aid provided.

For administrators in the field of student aid and for the students who receive aid, however, the types of aid awarded are important. Counselors try not to overburden any student with loans or work, and most students usually prefer to borrow as little as possible and to keep work to a minimum. Although loans generally have no direct impact on students while they are in college and because work may affect time available for extra study or leisure activities during the college years, both loans and work have the potential for affecting students after they graduate from or leave college. The purpose of this paper is to explore the impact which loans and work have on the lives of students after they graduate from college. Such a study is particularly timely in light of the recent Carnegie Council report (1979) which urges an explicit self-help component of all students' financial aid awards.



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### *Theoretical Framework*

When one considers the potential impact of self-help aid on college graduates, the general impression is that loans and work are likely to have a negative impact on graduates. Bender (In *College Scholarship Service*, 1962:93) exemplifies this line of thought. "I wish we had a good study of the *impact* of the present system of student financial aid on students and their families. What pressures and burdens, what distortions of careers and lives are caused by it?... How does it affect the student's values, his attitude toward intellectual activity and his college? Does it increase the tendency to measure all things in material terms?"

Loans, in particular, seem to suggest a negative relationship between receiving such aid and the lives of graduates. Ashworth (1972:47) cautions that loans may force graduates to be concerned with "making a fast buck" so that they can pay off their debts quickly, and he uses the term "reverse dowries" in echoing the sentiments of Chambers (1962:21) who labels loans as "cruelly discriminatory against women." More recently the directors of student aid at the Massachusetts Institute of Technology and the University of North Carolina at Chapel Hill have both noted possible objectives to the assuming of large loans by undergraduates in terms of its possible affect on attending graduate school and other future activities (Winkler, 1976:3; Gardner, 1977:2). The most extensive review of the potential dangers of over-reliance on loans, and the last to be mentioned here, lists four particular dangers of loans before concluding, "Heavy use of loans is an impediment to opportunity; it results in serious inequities between upper and lower-income groups" (Hanford and Nelson, 1970:21).

The primary basis for the possible negative impact of work on the lives of college graduates rests on the notion that students who work to get through college do not have the same time for study or socializing as non-working students (Kimball, 1968). One wonders if students who work their way through college, despite our natural affection for this ideal, are not sacrificing a significant part of the college experience. Whether it be good grades or good social connections, the necessity to sacrifice such intangibles in order to work during college may put the working undergraduate at a slight disadvantage in competition with other graduates who did not have to work while in college.

Note should be made as well that not everyone sees self-help forms of aid as detrimental. Adams and Stephens (1970:2) state, "Schools should be concerned that students have a background which includes work, either paid or unpaid, which will enable them to take their proper places in an adult society as contributing members to that society." This position is best summarized by the previously mentioned work of the Carnegie Council (1979:6): "We believe that an explicit self-help component is an important aspect of developing in students a sense of responsibility for their own advancement and of encouraging a more acutely sensed necessity for prudent use of time and money." The purpose of this paper is to test, not to discredit, these statements.

### *Literature Review*

A number of studies have been done on the relationship between aid and undergraduates during college (see Astin, 1977; Bowen, 1977; and Sanford, 1978b for a good review), but few studies have focused on self-help aid and its residual effects on college graduates.

Baird (1973) surveyed 21,000 graduates in the class of 1971 from 94 colleges and universities across the country. One of the many issues explored by his study was the extent to which indebtedness from undergraduate study influenced graduates to find jobs instead of pursuing graduate degrees. While his results are not conclusive in this area, Baird surmised that "the amount students had borrowed as undergraduates and the amounts remaining to be paid were very similar for students who planned to continue their educations and those who did not" (pp. 71, 73).

Golladay and Noell (1978:136) report some figures from the National Longitudinal Study which show that in 1976, 13.8 percent of those students who had received financial aid as undergraduates were attending, or had attended, graduate or professional school as compared to 8.6 percent of those students who had not received aid. The relationship was not affected by independent controls for ability, educational aspirations, race, sex, or family social economic status (SES); however, no consideration was given to the type of aid or the amount received.

The final study (Sanford, 1978a) reports the findings of a one year follow-up study of one-third of the May, 1976 bachelor's graduates of the University of North Carolina at Chapel Hill. Using analyses which closely parallel those which are reported in this paper, the study found: 1. that attendance at graduate or professional school generally was not related to type or amount of aid received, except that scholarship recipients were slightly more likely to continue their education (p.1); 2. that graduates who had borrowed under the National Direct Student Loan Program (NDSL) were slightly less satisfied with their educational experiences (pp. 1-2); 3. that NDSL recipients, loan recipients in general, and aid recipients in general were slightly less satisfied with their jobs in terms of challenge, salary, and long-range plans (p. 2); and, 4. that aid recipients in general were slightly more likely to consider themselves underemployed (p. 2) (all findings significant at the 0.05 level).

### *Method*

The National Longitudinal Study of the High School Class of 1972 (NLS) forms the data base for this study. Sponsored by the National Center for Education Statistics of the Department of Health, Education, and Welfare, the project is conducted by the Research Triangle Institute (RTI), Research Triangle Park, NC. A base-year survey conducted in spring, 1972 and three follow-up surveys conducted in fall 1973, 1974, and 1976 comprise the information contained in the data base. Approximately 20,000 students representing more than 1,000 high schools participated in the project, and the response rate to the various questionnaires has been 100 percent. A more complete description of the NLS Survey with a detailed description of the instruments, sample, methodology, and data collection procedures can be found in the NSL User's Manual (Levinsohn, Henderson, Riccobono, Moore, 1978). Only those NLS participants who had received a bachelor's degree by the time of the third follow-up (October, 1976) are included in this study (N=3,136).

The student aid variables are operationalized two ways. First, the two self-help types of aid — loans and work — are used as simple dichotomies: graduates either had them (Yes) or they did not (No). Second, the two types were categorized by the actual amount of aid received from \$0 to more than \$5000 (six categories).

## Findings

### Attending Graduate School

Several authors and studies (Baird, 1973; College Scholarship Service, 1962; Hanford and Nelson, 1970; Schultz, 1969; Southern Regional Office, 1968; Winkler, 1976) have questioned the effect of long-term indebtedness from educational loans. Given a relationship between having loans to repay and attending graduate or professional school, graduates with loans who do not attend graduate school may do so because they do not wish to increase their debt or because they wish to reduce their debt before undertaking additional study which might require new loans. Stated succinctly, recent college graduates with loans are less likely to attend graduate or professional school than are graduates without loans.

As shown in Table 1, this hypothesis is not supported and, in fact, the opposite relation is true: graduates with loans are slightly *more* likely to be attending graduate or professional school than graduates who did not have loans as undergraduates.

Table 1  
Percentage Distribution of Attendance at Graduate  
or Professional School by Having Had Loans

Attendance at Graduate School	Had Loans		Total
	No	Yes	
No	77.9	73.4	76.2
Yes	22.1	26.6	23.8
	(n=1665)	(n=1025)	

**Note**

Chi Square = 6.93  $p < .01$   
 Gamma = 0.12  
 Eta = 0.05  
 Pearson's R = 0.05  $p < .01$

Because it seems reasonable that the amount of a graduate's debt may influence any decision concerning advanced study, Table 2 examines the relationship between amount of loan debt and attending graduate school. The positive relationship between having loans and attending graduate school holds for each of the amount of debt categories in that more graduates with loans are attending graduate school than are graduates without loans.

<sup>1</sup>Achieving statistical significance is greatly enhanced by the large size of the sample. While this need not make one apologetic for using a large sample or for achieving statistical significance, it does call for a certain amount of restraint in interpretation of the findings. Most of the findings in this study are significant for what they do not support rather than for the small relationships reported.

**Table 2**  
Attendance at Graduate or Professional School by Amount of Loans

Amount of Loan	Attendance at Graduate School	
	No	Yes
None	1297 (77.9) <sup>a</sup>	368 (22.1)
\$ 500	75 (72.1)	29 (27.9)
\$ 500-999	94 (74.6)	32 (25.4)
\$1000-1999	201 (74.7)	68 (25.3)
\$2000-4999	297 (73.0)	110 (27.0)
\$4999	85 (71.4)	34 (28.6)
Total	2049 (76.2)	641 (23.8)

Note

Chi Square = 7.93

Gamma = 0.10

Eta = 0.05

Pearson's R = 0.05  $p < .01$

<sup>a</sup>Figures in parentheses denote percentages by amount of loan.

In order to clarify the relationship between loans and attending graduate school and to reduce the chance that additional factors may be influencing the relationship, graduates' cumulative grade point average (GPA) and family social economic status (SES) were used as controls. GPA was used because graduates with high GPA's may have been more likely to get scholarships rather than loans, and may have been more likely to pursue graduate study. SES was used because lower SES graduates were more likely to have needed and received loans as undergraduates and may have been somewhat less likely to attend graduate school.

Multiple crosstabs using the three categories of SES as control showed that the positive relationship between loans and graduate school was statistically significant only for the middle SES group of graduates. This was true when both having a loan debt and the amount of debt were used against attendance at graduate school. When partial correlations were used, the first-order partial controlling for SES produced  $r = 0.07$ ,  $p < .001$ , for the relationship between amount of loan and attendance at graduate or professional school. Despite the expected difference in the relationship between loans and attendance for different SES graduates as mentioned earlier, there is no marked difference among the three SES categories. Higher percentages of graduates indicate attendance going from the low to high SES categories, but this holds for both those graduates who had loans and those who did not have loans. The preliminary indication, then, is that loans do not appear to have a differential impact on low SES students as theorized.

When the five categories of GPA were used as controls in multiple crosstabs the findings showed a negative relationship between loans and attendance ( $r=0.21$ ,  $p<.05$ ) for the lowest category of GPA (1.75-2.24), a positive relationship ( $r=0.08$ ,  $p<.01$ ) for the 3.25-3.74 category, and insignificant relationships for the other three categories of GPA. Partial correlation analysis showed a first order partial of 0.06,  $p<.01$ , when controlling for GPA. A second order partial, controlling for both SES and GPA, showed the positive relationship between loans and attendance still in evidence ( $r=0.07$ ,  $p<.001$ ).

No relationship was evident between attending graduate school and undergraduate work; similar insignificant results appeared when amount of work was used.

The results from a multiple regression analysis on attending graduate school are shown in Table 3. Amount of loans is the first student aid variable to enter the analysis, but none of the student aid variables can be considered particularly important in helping to explain differences in attending graduate or professional school. Two additional student aid variables, amount of grants and whether or not a student had any aid at all, were included in the regression so that independent effects of loans and work could be examined.

**Table 3**  
Regression Analysis of Attending Graduate or Professional School with  
Variables Entered in Order of Significance

Variable	Multiple R	R <sup>2</sup>	Simple r	Beta
Educational Plans, 1973	0.366	0.134	0.366	0.295
GPA	0.398	0.158	0.245	0.159
Sex (Women)	0.405	0.164	-0.105	-0.072
Aptitude	0.408	0.167	0.162	0.054
Amount of Loans	0.411	0.169	0.044	0.037
Amount of Grants	0.413	0.170	0.086	0.035
SES	0.414	0.171	0.069	0.041
Amount of Work	0.414	0.172	0.000	-0.030
AID (Yes)	0.415	0.172	0.061	0.030
Race (White)	0.415	0.172	0.020	-0.016

### *Choosing a Job*

The primary influence which loans are suspected of having on job choice is that borrowers are more likely to choose more remunerative, less service-oriented jobs than non-borrowers (Chambers, 1962; College Scholarship Service, 1962; Hanford and Nelson, 1970; Schultz, 1969; Southern Regional Office, 1968; "Student Loan Explosion," 1978). This influence may reflect the added repayment burden on the borrower's take-home pay which the non-borrower does not have to face. Graduates repaying educational loans must either settle for a slightly lower standard of living than other graduates in similar jobs who are not repaying loans, or they must get jobs with somewhat higher salaries to compensate for the loan repayment. Because it is not possible to examine the job selection process exactly and because service-oriented jobs are normally lower paying positions for college graduates, the research emphasis is on salaries which working graduates report they are earning.

Analysis of the relationship between loans and salaries for those graduates working full-time yielded a zero order correlation of -0.02 which is not significant at the 0.05 level. Partial correlations controlling for SES, GPA, and both together showed no change. When undergraduate work was used, similar insignificant results were found. Regression analyses using salaries as the dependent variable showed no particular impact of self-help aid.

### *Forming a Family*

The most prevalent suggested effect of loans on students which is found in the literature is the "negative dowry" effect (Ashworth, 1972; Chamber, 1962; Hanford and Nelson, 1970; Maynard, 1975; Schultz, 1969; Sheehan, 1973); that is, women with loans are potential marriage partners who take something away from the material possessions of the family instead of bringing something (the dowry) to it. While the dowry is no longer a part of the marriage contract, the concept makes some sense in that graduates with loans may be somewhat hesitant to marry or begin a family until their financial situation seems more stable. Despite the dowry connotation, this relationship between loans and family formation is likely to have equal legitimacy for graduates of both sexes. The relationship, however, is not supported by the data and further examination using undergraduate work also produced insignificant results.

### *Summary*

This study appears to document clearly that the self-help forms of student aid (borrowing and working) are not detrimental to the behaviors of college graduates as studied here. This is important both because the current federal aid programs place a lot of emphasis on loans and work and because one might feel, intuitively at least, that loans and work might have a negative impact on students, given the need to repay loans from future earnings and the need to spend hours working during college that might have been spent studying. Despite the initial impetus for doing this study, the findings show no support for the belief that large loans (or work) hinder the decisions and choices made by college graduates. With this in mind, the findings do not suggest any reason for the default problem with educational loans. If borrowers were found to behave in much different fashion from non-borrowers and their behavior was seen as somewhat less desirable than that of non-borrowers, then we might see a possible reason for a high default rate.

Some uncertainty does exist, however, in any attempt to ascertain if self-help aid has any impact at all on college graduates. The results discussed in this paper apply solely to *recent* college graduates, and long-term effects of such aid have not been examined. Future research will be necessary to assess the long-term impact of self-help aid on college graduates, and the National Longitudinal Study promises to be a valuable source of data.

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