ABSTRACT

          This study was conducted to determine the effects of
gainful employment on the academic performance of full-time community
college students. A measurement called activity units was created.
One hour of academic credit equals three activity units on the basis
of one hour in class and two hours of preparation. An hour of gainful
employment equals one activity unit. The winter 1974 grade point
averages (GPA's) of 722 full-time students enrolled at Delaware
County Community College, Media, Pennsylvania, were analyzed to
determine if there was a significant relationship between number of
activity units and GPA for eight separate categories of students
(16-19-year-old single female, 16-19-year-old single male,
20-23-year-old single female, 20-23-year-old single male, 24 years of
age or older single female, 24 years of age or over single male, 20
years of age or older married female, and 20 years of age or older
married male). As a result of the data analysis, it was concluded
that at the .05 level of significance, there was a relationship for
all categories except the single females aged 16-19 between number of
activity units and GPA. The data indicated that those students
carrying between 50 and 59 activity units had the highest level of
academic success, and all those carrying over 50 activity units
earned higher GPA's than did students carrying less; that married
students achieved higher GPA's than single students; that married
female students achieved much higher GPA's than any other category;
and that students carrying 80 or more activity units have almost
exactly the same level of success as the entire sample.
(Author/DB)

THE DEVELOPMENT OF AN ACTIVITY INDEX: AN
ANALYSIS OF HOURS WORKED AND CREDIT HOURS
CARRIED BY FULL TIME STUDENTS OF DELAWARE
COUNTY COMMUNITY COLLEGE

by

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TITLE: The Development of an Activity Index: An Analysis of Hours Worked and Credit Hours Carried by Full Time Students of Delaware County Community College.

PROBLEM: Are the Grade Point Averages (GPA's) of working students independent of the number of activity units when categorized by age, sex, and marital status?

EXPLANATION: The College handbook states that students should expect to spend between 2 and 3 hours of preparation for every student credit hour for which a student is enrolled per week. For the purpose of this study, we have defined one credit to be equivalent to three hours of effort. The combination of classroom obligations and gainful employment in hours per week is designated as the Activity Index, e.g. 40 hours of employment and 6 credit hours ($6 \times 3 = 18$) yields 58 Activity Units, i.e. total number of hours.

HYPOTHESIS: There is a significant relationship between Grade Point Average and Activity Units for certain full-time students.

BACKGROUND AND SIGNIFICANCE OF THE STUDY

A. The Employed Student at Delaware County Community College

The national literature concerning the working community college student has been reviewed in relation to the DCCC working student in terms of the effects of gainful employment and academic achievement. An attempt has been made to determine any significant relationships with regard to age, sex, or marital status, and academic achievement. In order to assist in the counseling of our students in terms of reasonable expectations for academic success, this study has sought to formulate guidelines by means of an Activity Index which could be used to predict academic success in relation to number of hours gainfully employed.

The faculty and administration, specifically, Dr. Vincent Darnowski, Vice President and Dean of the College and Dr. Kenneth Varcoe, Dean of Students, have indicated a need for a better counseling tool in aiding students to budget their time. This counseling tool was to have been in the form of an Activity Index. The general guidelines for counselors and academic advisors of the College recommend that full-time students should not be employed more than 15 hours per week. This is the only criterion of the nature for the counseling and advising of students. (For the philosophy and long range goals of Delaware County Community College, see Appendix D.)

B. The Employed Student and the National Literature

   1. Gainful Employment as Related to Academic Success

   There have been many studies with mixed results relating to remunerative employment and academic success.

   Trueblood (1957) indicated that the working student made a higher point average than the all-university average. He further found that grade point averages by hours worked did not reveal any well defined trends. Trueblood said that it was not possible to hypothesize a possible maximum number of hours which could be worked without affecting the grade point average. Budd (1954) said that academic counselors of freshman students need not be particularly concerned about the effect of outside work on the new student's adjustment to the college. Henry (1967) agreed with him conditionally by placing the condition "up to a reasonable work load."

   Hay, Evans and Lindsay (1970) more narrowly defined this concept by stating that students with jobs relevant to their major achieve better than students in non-relevant jobs, and that students working a moderate number of hours per week (1 to 15) achieve as well or better than non-working students.

   Beagle (1970) found that attendance as part-time or full-time working students had no significant influence on academic achievement. Bryant (1961) also said that students can work up to forty hours a week

carrying a load of 10 to 12 hours and still do successful work.
Augsburger (1971) said there was no significant difference in GPA's
for employed or unemployed students when the students worked 20
hours or less a week.

Dickinson and Newbegin (1957) found the opposite to be true,
finding a significant inverse relationship between credit load and
relative achievement. They surmised that the average student is not
fully aware of the demands on his time and learning capacity when he
assumes a heavier credit load. They went on to say that each additional
hour of credit requires only one extra hour per week of class time,
but also requires budgeting of at least two extra hours of study time;
however, planning of extra study time is optional and often neglected
compared with allocation of time for outside work where hours are
fixed by an employer. Fitch (1966) said that employment may be
considered as a primary cause for low grades for students at all levels
of verbal ability, but especially for students working over ten hours per
week. Davis (1960) found that full-time workers have quite high drop-
out rates, particularly among the more able students.

Hammond (1971) in a study on the part-time gainful employment of
high school students found the reasons for holding part-time jobs and
the reasons for academic success are highly individualized matters
with each student exerting his energy in the direction which he feels most

matters in the light of internal and external pressures. Comparisons of grades in six successive grading periods (four quarters of the junior year and the first two quarters of the senior year) indicated that there was no evidence that grades varied significantly between employed and non-employed students. Lower grades, however, were attained among employed males although employed females earned slightly higher grades than unemployed females.

2. Age and Academic Success

Beagle (1970) found that the mean academic performance of adult students (age 25 and older) was significantly higher p .01) than that of the regular college age students. This confirmed the findings of Sensor (1964) who said that mature women--25 years old or older, or married--had a Grade Point Average 0.5 higher than that of the total student body.

Davis (1962), however, found that the older a student is the lower the completion rates, particularly if there are children.

3. Marital Status and Academic Success

Jensen and Clark (1958) stated that married and single students who had been equated according to age were approximately of equal scholastic ability in terms of the mean scores on the A.C.E. The t-test showed no significant difference between the two groups. They

found that although the single students obtained a higher Grade Point Average than the married students, the difference was not statistically significant. Thus, in this study the results tend to suggest rejection of the hypothesis that married students achieve at a higher level than single students.

On the other hand, Beagle (1970) found that married adult students are more apt to achieve at a higher level than single adult students. Dickinson and Newbegin (1959) found that older and married students tend to be over-achievers leading to the belief that motivation is a key factor in college success. They further stated that the students carry significantly fewer credits, work substantially more, remain longer with one employer, and obtain higher grades relative to their potential than do single students.

4. Sex and Academic Success

Fitch (1966), Beagle (1970) and Bryant (1961) all found that female students earned a higher Grade Point Average than did males.

Horner (1972) and Bardwick (1971) on the other hand said that high achievement-motivated women are inhibited by a "motive to avoid success." Isaacson and Amos (1957) said that women students perceived no effect on their Grade Point Average due to working.

A comparison between amount of work and achieved grades by Dickinson and Newbegin (1959), however, showed a non-significant correlation for both men and women.

Hammond (1971) cited the fact that the employed female high school students did achieve slightly greater academic success than non-employed females. The reverse was true concerning employed males and non-employed males. Employed females worked an average of approximately four hours less per week than males.

DEFINITIONS

1. <u>academic advisor</u> -- faculty member who is officially assigned by the college to guide students in their scholastic endeavors at the college. He/she would not be a member of the Student Personnel staff, but could be a college administrator or a teaching faculty member.

2. <u>academic house</u> -- one of the three instructional areas of the college. An academic house is a division of the academic area of the institution.

3. <u>academic load</u> -- the number of credit hours carried per semester by a student.

4. <u>academic success</u> -- a G.P.A. consisting of 2.0 or better.

5. <u>Activity Index</u> -- this is the table which charts the activity units.

6. <u>activity units</u> -- one hour equals one activity unit. For instance, for each activity unit (hour) in the classroom, a student is expected to spend two activity units (hours) in preparation for that class. An hour worked in gainful employment is also equated at one activity unit.

7. <u>counselor</u> -- a member of the Student Personnel staff who is specifically designated to advise students. He/she may be an admissions counselor, special counselor or a counselor attached to one of the academic houses.

8. <u>Faculty Advisors Handbook</u> -- guide issued to help the academic advisors to realistically deal with their student advisees.

9. <u>Freshman</u> -- first year college student.

10. <u>full-time student</u> -- any student who takes twelve or more credits per semester.

11. <u>gainful employment</u> -- work performed by a student for which he is paid.

12. <u>G.P.A.</u> -- Grade Point Average; A =4.0; B =3.0; C =2.0; D =1.0; F =0

13. <u>hours worked per week</u> -- amount of hours spent in gainful employment.

14. <u>Incomplete grade</u> -- a course for which a student receives an I (Incomplete) pending completion of all course requirements.

15. <u>mean G.P.A.</u> -- average of G.P.A.s in each designated category: sex, age, married, single, hours worked per week, activity units.

16. <u>Policy Manual</u> -- This is the official college guide to policy regulations of the institution. It is an in-depth volume which promulgates all official regulations and procedures of Delaware County Community College. It is constantly up-dated as the academic year (July 1-June 30) progresses.

17. <u>Sophomore</u> -- second year college student.

18. <u>Student Credit Hours</u> -- classroom hours for which a student earns credits. One lecture hour of a course per week for fifteen weeks equals one credit hour. Two laboratory hours per week equal one credit hour. In cooperative education, a student is enrolled for three credit hours for full-time gainful employment assigned by the college.

19. <u>Student Handbook</u> -- a brief manual issued to students to guide their academic success. It includes the facts and regulations of the college.

LIMITATIONS OF THE STUDY

In any study, there emerges a series of variables which cannot be controlled. This study has been no exception. Therefore, the following should be noted as limitations to this study:

1) The type of gainful employment engaged in by the student has not been analyzed. Job pressures, shifts, job descriptions and responsibilities have not been examined with an eye to possible modifications in the study.

2) Curricula demands have not been taken into consideration. For instance, no effort has been made to equate degree of difficulty of liberal arts, engineering, occupational, etc. curricula to each other.

3) Personal motivation of individual students has not been analyzed for comparative purposes.

4) No comparison has been made concerning individual course demands made by instructional personnel.

5) IQ's of students were not taken into consideration.

6) The precise relevance of a student's gainful employment to his curricular pattern was not examined.

7) Freshmen and sophomore students have not been discriminated.

8) The study was conducted toward the end of the second semester and did not include withdrawals from courses.

9) Previous educational background of the responding students was not analyzed.

BASIC ASSUMPTIONS

This study made the following basic assumptions:

1) That student responses on all requested items were accurate.

2) That current G. P. A.s (Grade Point Averages) were distributed normally within the population sample.

3) That homogeneity of variance was operative by virtue of the assumption that the population in the sample was distributed normally.

4) That normal distribution of the sample also denoted that there was no significant ability differential between students gainfully employed and students who were not gainfully employed.

5) That students spent two hours (activity units) on outside study for each credit hour for which they were matriculated.

6) That incomplete (I) grades when converted to permanent grades would not significantly affect a student's G. P. A.

PROCEDURES FOR COLLECTING DATA

1. Through a brief questionnaire (see Appendix A), the student--identified
    by Delaware County Community College student number--indicated
    age, sex, marital status and number of hours gainfully employed.
    These questionnaires were administered by the faculty in all classes
    meeting on Tuesday, April 30 and Wednesday, May 1. These days of the
    week were chosen since virtually all classes met on one or the other of
    these days. See Appendix B for the letter sent to all teaching faculty
    requesting their assistance in administering the questionnaire.

2. All duplicate questionnaires were discarded.

3. All questionnaires returned by part-time students were removed from
    the sample.

4. All questionnaires returned with insufficient data upon them were
    rejected.

5. Through the master computer list obtained from the Records Office of
    the college, the student number was checked with the student's name.
    Incorrect student numbers were removed from the sample.

6. The academic advisor's copy of the student's Winter Semester transcript was manually sorted into student number order. The student's academic G.P.A. for this one semester was then affixed to the questionnaire, which had been sorted into the several categories required by the twenty-eight sub-hypotheses.

7. The Activity Units were determined for each individual of the sample by multiplying the number of academic credits attempted by three and adding the product to the number of hours recorded as gainfully employed. This sum was recorded in the corner of the questionnaire, as was the academic G.P.A. for the semester.

PROCEDURES FOR TESTING DATA

The general Null Hypothesis is that there is no relationship between Grade Point Average and Activity Units for certain full-time students. In order to determine this, the following sub-hypotheses, null and alternative, were to be tested:

H_o1 For the 16 to 19 year old single male student, there is no significant relationship between G. P. A. and Activity Units.

H_a1 For the 16 to 19 year old single male student, there is a significant relationship between G. P. A. and Activity Units.

H_o2 For the 16 to 19 year old single female student, there is no significant relationship between G. P. A. and Activity Units.

H_a2 For the 16 to 19 year old single female student, there is a significant relationship between G. P. A. and Activity Units.

H_o3 For the 16 to 19 year old married male student, there is no significant relationship between G. P. A. and Activity Units.

H_a3 For the 16 to 19 year old married male student, there is a significant relationship between G. P. A. and Activity Units.

H_o4 For the 16 to 19 year old married female student, there is no significant relationship between G. P. A. and Activity Units.

H_a4 For the 16 to 19 year old married female student, there is a significant relationship between G. P. A. and Activity Units.

H_o5 For the 20 to 23 year old single male student, there is no

significant relationship between G.P.A. and Activity Units.

H_a5 For the 20 to 23 year old single male student, there is a

significant relationship between G.P.A. and Activity Units.

H_o6 For the 20 to 23 year old single female student, there is no

significant relationship between G.P.A. and Activity Units.

H_a6 For the 20 to 23 year old single female student, there is a

significant relationship between G.P.A. and Activity Units.

H_o7 For the 20 to 23 year old married male student, there is no

significant relationship between G.P.A. and Activity Units.

H_a7 For the 20 to 23 year old married male student, there is a

significant relationship between G.P.A. and Activity Units.

H_o8 For the 20 to 23 year old married female student, there is no

significant relationship between G.P.A. and Activity Units.

H_a8 For the 20 to 23 year old married female student, there is a

significant relationship between G.P.A. and Activity Units.

H_o9 For the 24 to 27 year old single male student, there is no

significant relationship between G.P.A. and Activity Units.

H_a9 For the 24 to 27 year old single male student, there is a

significant relationship between G.P.A. and Activity Units.

H_o10 For the 24 to 27 year old single female student, there is no

significant relationship between G.P.A. and Activity Units.

H_a10 For the 24 to 27 year old single female student, there is a

significant relationship between G.P.A. and Activity Units.

H_O11 For the 24 to 27 year old married male student, there is no significant relationship between G. P. A. and Activity Units.

H_a11 For the 24 to 27 year old married male student, there is a significant relationship between G. P. A. and Activity Units.

H_O12 For the 24 to 27 year old married female student, there is no significant relationship between G. P. A. and Activity Units.

H_a12 For the 24 to 27 year old married female student, there is a significant relationship between G. P. A. and Activity Units.

H_O13 For the 28 to 31 year old single male student, there is no significant relationship between G. P. A. and Activity Units.

H_a13 For the 28 to 31 year old single male student, there is a significant relationship between G. P. A. and Activity Units.

H_O14 For the 28 to 31 year old single female student, there is no significant relationship between G. P. A. and Activity Units.

H_a14 For the 28 to 31 year old single female student, there is a significant relationship between G. P. A. and Activity Units.

H_O15 For the 28 to 31 year old married male student, there is no significant relationship between G. P. A. and Activity Units.

H_a15 For the 28 to 31 year old married male student, there is a significant relationship between G. P. A. and Activity Units.

H_O16 For the 28 to 31 year old married female student, there is no significant relationship between G. P. A. and Activity Units.

H_a16 For the 28 to 31 year old married female student, there is a significant relationship between G. P. A. and Activity Units.

H_o17 For the 32 to 35 year old single male student, there is no

significant relationship between G. P. A. and Activity Units.

H_a17 For the 32 to 35 year old single male student, there is a

significant relationship between G. P. A. and Activity Units.

H_o18 For the 32 to 35 year old single female student, there is no

significant relationship between G. P. A. and Activity Units.

H_a18 For the 32 to 35 year old single female student, there is a

significant relationship between G. P. A. and Activity Units.

H_o19 For the 32 to 35 year old married male student, there is no

significant relationship between G. P. A. and Activity Units.

H_a19 For the 32 to 35 year old married male student, there is a

significant relationship between G. P. A. and Activity Units.

H_o20 For the 32 to 35 year old married female student, there is no

significant relationship between G. P. A. and Activity Units.

H_a20 For the 32 to 35 year old married female student, there is a

significant relationship between G. P. A. and Activity Units.

H_o21 For the 36 to 39 year old single male student, there is no

significant relationship between G. P. A. and Activity Units.

H_a21 For the 36 to 39 year old single male student, there is a

significant relationship between G. P. A. and Activity Units.

H_o22 For the 36 to 39 year old single female student, there is no

significant relationship between G. P. A. and Activity Units.

H_a22 For the 36 to 39 year old single female student, there is a

significant relationship between G. P. A. and Activity Units.

$H_o 23$ For the 36 to 39 year old married male student, there is no significant relationship between G. P. A. and Activity Units.

$H_a 23$ For the 36 to 39 year old married male student, there is a significant relationship between G. P. A. and Activity Units.

$H_o 24$ For the 36 to 39 year old married female student, there is no significant relationship between G. P. A. and Activity Units.

$H_a 24$ For the 36 to 39 year old married female student, there is a significant relationship between G. P. A. and Activity Units.

$H_o 25$ For the single male student aged 40 or over, there is no significant relationship between G. P. A. and Activity Units.

$H_a 25$ For the single male student aged 40 or over, there is a significant relationship between G. P. A. and Activity Units.

$H_o 26$ For the single female student aged 40 or over, there is no significant relationship between G. P. A. and Activity Units.

$H_a 26$ For the single female student aged 40 or over, there is a significant relationship between G. P. A. and Activity Units.

$H_o 27$ For the married male student aged 40 or over, there is no significant relationship between G. P. A. and Activity Units.

$H_a 27$ For the married male student aged 40 or over, there is a significant relationship between G. P. A. and Activity Units.

$H_o 28$ For the married female student aged 40 or over, there is no significant relationship betwee G. P. A. and Activity Units.

$H_a 28$ For the married female student aged 40 or over, there is a significant relationship between G. P. A. and Activity Units.

Once our data was collected and categorized, however, we found

the foregoing to be impossible to statistically compute, since the student

body simply does not encompass the various categories in large enough

numbers to statistically analyze. There were just too many zero cells.

The sample encompasses 722 usable responses to our questionnaire

out of a total of 1417 full time students. There were an additional 181

questionnaires received that had to be eliminated due to any or all of the

following reasons: 1) Part-time students completed the form, but this

study dealt with full time students only. 2) Insufficient data was recorded

on the questionnaire, e.g.: no student number listed, no number of hours

gainfully employed entered. 3) Incorrect information was listed, e.g.:

an incorrect and therefore unmatchable student number set down. Due

to the sampling technique employed, an homogenous cross-section of the

total full-time student body can be assumed. Nevertheless, so many of the

students are between the ages of 16 and 23 and single that two separate

adaptions had to be incorporated in order to make the statistical interpre-

tations viable.

In the first place, it was necessary to collapse the categories

drastically. The four categories 16-19 single male, 16-19 single female,

20-23 single male and 20-23 single female had large enough samples to

stand on their own; everything else had to be collapsed. All married

males--all aged 20 and older as it turned out--had to be placed in one

single category instead of the planned seven separate ones. The same was true of married females, and there also the age span ran from 20 years old on up. Furthermore, all single males over 23 had to be collapsed into a single category, as did all females over 23. This left just eight categories: single males 16-19, single females 16-19, single males 20-23, single females 20-23, single males 24 and older, single females 24 and older, married males 20 and over and married females 20 and older.

The other adaption required was to develop the expected frequency for each cell by deriving the percentage of students in each cell for the entire sample of 722. With a sample this large it was safe to assume both the homogeneity of the total distribution and further the homogeneity of each separate category could be assumed since, by collapsing the categories, these samples became sufficiently large. The expected frequency for each cell of a given category was then competed by multiplying the expected percentage for that cell as derived from the total sample by the total number of responses for that category as described by Blalock (1960, p. 238 f), among others. (See Table IX-A, Appendix C.)

Each category's sample was then analyzed. The frequencies for each cell were determined by appropriate manual sorting. These were then compared to the expected frequency derived as described and Chi Squares determined for each of the eight categories (see Tables I-A - VIII-B, Appendix C).

The statistical technique used in testing all null hypotheses was the Chi Square test for significance at the .05 level. Calculators were used for these analyses.

RESULTS

The results of the statistical calculations dictate that the null hypotheses should be rejected for all categories except the sixteen to nineteen year old single female grouping where the data indicated a failure to reject the null hypothesis. With six rows and four columns, there are five times three or fifteen degrees of freedom. According to the Chi Square Table (Blalock, p. 452), any finding greater than 24.996 is significant. The single female sixteen to nineteen Chi Square was calculated to be 23.4741 and thus failed to reject the null hypothesis. The others ranged from 25.2924 for single males, twenty-four and older, up to 72.2691 for the married females, and thus do cause the various null hypotheses to be rejected. Therefore, the alternative hypotheses must be accepted. (See Appendix C, Tables I-A through VIII-B for specific frequencies and statistics.).

Careful examination of the various tables in Appendix C reveals that almost every category of students has the greatest percentage of individuals carrying between fifty and seventy-nine activity units. The exception is the category of the sixteen to nineteen single female category (which is the one group failing to reject the null hypothesis); here the basic range drops to forty to seventy-nine. Further inspection shows that for every grouping of activity units for all categories, students demonstrate a very high percentage of success as measured by earning a grade point average for the semester of 2.0 or better; indeed, almost 85% of all

students in the sample succeeded. In fact, 36.3% earned 3.0 or better.
When we examine all students with 80 or more activity units, these
percentages hold up nearly exactly: almost 85% succeeded with 2.0 or
better and 38% earned over 3.0 (See Table IX-B, Appendix C, for percent-
ages for all activity unit groupings.)

This study was conducted to attempt to develop an activity index which
would suggest a maximum number of activity units in which students could
engage with reasonable expectations for academic success. The statistics
were aimed at such findings. The findings do indicate a significant relation-
ship between activity units and academic success--but what the relationship
appears to be is that students need to carry more activity units than a simple
full time academic load alone involves. Part or full-time gainful employment
appears to enhance academic success.

RECOMMENDATIONS

This study did not attempt to deal with such intervening variables as motivation and calibre of students, variety of academic curricula or grading methods of instructors. It only dealt with activity units and expectations of academic success. The results of the study do show a significant relationship between these two factors, but not in the anticipated manner. Follow-up studies including some of these intervening variables are obviously needed before any valid activity index could possibly be derived.

The findings do suggest that some gainful employment is not at all harmful to expectations for academic success--that even full-time employment is entirely possible and the student still has a very great likelihood of achieving good to high grades. It would seem that having some financial independence increases student motivation, but that remains to be tested by further research.

One category of student ranked much higher than any or all other categories--the married female. Exactly two-thirds achieved a 3.0 grade point average and 96.7% were academically successful regardless of activity units. We dealt only with gainful employment outside of the academic setting, but most of these women were also caring for young children, operating a home and gainfully employed. The number of hours of free-time for them must be extremely limited, yet they succeeded overwhelmingly. Again,

motivation is probably the answer and should be explored. Even the married males succeeded 91.1% of the time with 44.4% earning a 3.0 or better grade point average. Perhaps Delaware County Community College ought to urge all student to get married.

It is obvious that further clarification is needed. With such a high percentage of students ranging between 2.0 and 4.0 grade point averages, enlightening data might be derived by dividing the ranges down into much smaller units, e.g. 2.0 - 2.19, 2.2 - 2.39, etc., rather than simply 2.0 to 2.99 and over 3.0. Perhaps it would be more meaningful if all external and internal responsibilities were calculated, e.g. home life responsibilities or student government duties, in the activity units. An analysis of student ability via ACT scores or class ranking and activity units might also be helpful. Further study is necessary to determine if certain academic curricula lend themselves to gainful employment where as others might detract. For instance, a nursing student employed in a hospital in some nursing capacity may well endance academic learning whereas an art student might be hindered. Another area for possible fruitful study would be to analyze activity units by semester in college. First term freshmen might well need more time for academic preparation than, for instance, second semester sophomores.

Until further study is completed to clarify this situation, it would appear that any imposed limits or even suggested guidelines on gainful employment can only be imposed arbitarily and/or intuitively. Currently,

the Delaware County Community College has an informal and difficult-to-
enforce limit of fifteen hours of gainful employment per week for full-time
students. The data of this study suggests that, pending further clarification,
these guidelines ought to be reconsidered and other criteria developed if
any such limits are to be suggested.

RESIDUAL FINDINGS

For the sample of full time students (722) attending Delaware County Community College for the Winter Semester, 1974, the following data was extracted:

1.

Semester G.P.A.	N	%
0.0 - 0.99	28	4
1.0 - 1.99	83	12
2.0 - 2.99	349	48
3.0 and above	262	36
	722	100

2.   All Students Mean G.P.A. = 2.62

3.

Sex	N	%	$\overline{X}$ G.P.A.
Female	292	40.44	2.80
Male	430	59.56	2.50

4.

Marital Status	N	%	$\overline{X}$ G.P.A.
Married Female	37	5.12	3.07
Married Male	44	6.09	2.75
Single Female	255	35.32	2.77
Single Male	386	53.46	2.47
All Married	81	11.22	2.90
All Single	641	88.78	2.59

5.

Hours Worked	N	%	$\overline{X}$ G.P.A.
0	159	22.02	2.74
1 - 14	101	13.99	2.82
15 and over	462	63.99	2.54

6.

Age	N	%	$\overline{X}$ G.P.A.
16 - 19	317	43.91	2.57
20 - 23	286	39.61	2.56
24 and over	119	16.48	2.91

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APPENDIX A

This questionnaire is designed to gather information for future advising of students. All information will be kept strictly confidential. In conjunction with our doctoral studies at Nova University, we are attempting to develop some recommended guidelines for part-time employment in terms of numbers of hours - for full time students. If you are not a full time student or if you have already filled this questionnaire out in another class, please do not complete this. Please, be honest, the validity of our project depends on your cooperation!

Age - Check appropriate box:

16-19 ____; 20-23 ____; 24-27 ____; 28-32 ____; 32-35 ____;

36-39 ____; 40 or over ____.

Sex: Male ____; Female ____.

Marital Status: Single ____; Married ____.

Number of hours per week worked (gainful employment): _____
(number)

John F. Mc Cormack
Eugene J. Kray
Bruce T. Wyman

APPENDIX B

24 April 1974

MEMO TO: All Teaching Faculty

FROM: E.J. Kray, J.F. Mc Cormack, B.T. Wyman

SUBJECT: Assistance in Gathering Data

We need a favor! As a part of our graduate studies at Nova University, we are attempting to gather data for a research project which has the hypothesis that there is an optimum number of hours that full time students should work and still be academically successful. We are, further, trying to draw a relationship between sex, age, marital status and numbers of hours gainfully employed. We plan to share the results of this study with all members of the college community.

In order to attempt to reach all full time students, we are asking that you administrate the enclosed questionnaires to all of your sections that meet on Tuesday (April 30) and Wednesday (May 1). If some of your students have already completed a form in an earlier class, they need not fill one out in your section.

Upon completion, could you please return these questionnaires to the box provided in the mailroom by Thursday (May 2) noon.

Thank you very much for your help and if you have any questions relative to this, contact any of us. Thanks again.

Gene, Jack & Bruce

/ddd

APPENDIX C

TABLE I-A

16 - 19 Single Female

OBSERVED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0	1	2	3
40 - 49	0	1	12	11
50 - 59	0	4	23	15
60 - 69	1	5	29	20
70 - 79	0	2	9	7
80 +	0	0	0	4

N =   151

EXPECTED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0.83	1.25	4.18	3.55
40 - 49	0.42	2.72	10.04	8.79
50 - 59	0.63	3.35	16.52	13.80
60 - 69	2.10	5.01	20.70	15.05
70 - 79	1.04	3.76	15.05	8.40
80 +	0.83	1.25	6.48	5.22

TABLE I-B

16 - 19 Single Female

CELL	f_o	f_e	f_o-f_e	$(f_o-f_e)^2$	$(f_o-f_e)^2/f_e$
A	0	0.83	-0.83	0.6889	0.8300
B	1	1.25	-0.25	0.0625	0.0500
C	2	4.18	-2.18	4.7524	1.1369
D	3	3.55	-0.55	0.3025	0.0852
E	0	0.42	-0.42	0.1764	0.4200
F	1	2.72	-1.72	2.9584	1.0876
G	12	10.04	1.96	3.8416	0.3826
H	11	8.79	2.21	4.8841	0.5556
I	0	0.63	-0.63	0.3969	0.6300
J	4	3.35	0.65	0.4225	0.1261
K	23	16.52	6.48	41.9904	2.5418
L	15	13.80	1.20	1.4400	0.1043
M	1	2.10	-1.10	1.2100	0.5762
N	5	5.01	-0.01	0.0001	0.0000
O	29	20.70	8.30	68.8900	3.3280
P	20	15.05	4.95	24.5025	1.6282
Q	0	1.04	-1.04	1.0816	1.0400
R	2	3.76	-1.76	3.0976	0.8238
S	9	15.05	-6.05	36.6025	2.4321
T	7	8.40	-1.40	1.9600	0.2333
U	0	0.83	-0.83	0.6889	0.8300
V	0	1.25	-1.25	1.5625	1.2500
W	2	6.48	-4.48	20.0704	3.0973
X	4	5.22	-1.22	1.4884	0.2851

$$= 23.4741$$

CHI Square not significant at the .05 level.

TABLE II-A

16 - 19 Single Male

OBSERVED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	1	4	5	0
40 - 49	0	4	10	5
50 - 59	2	4	14	6
60 - 69	5	10	28	21
70 - 79	2	5	21	5
80 +	0	1	8	5

N =   166

EXPECTED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0.91	1.38	4.60	3.90
40 - 49	0.46	2.99	11.04	9.66
50 - 59	0.70	3.69	18.16	15.17
60 - 69	2.31	5.51	22.76	16.55
70 - 79	1.15	4.13	16.55	9.23
80 +	0.91	1.38	7.12	5.74

TABLE II-B

16 - 19 Single Male

CELL	f_o	f_e	f_o-f_e	$(f_o-f_e)^2$	$(f_o-f_e)^2/f_e$
A	1	.91	.09	.0081	.0089
B	4	1.38	2.62	6.8644	4.9742
C	5	4.60	.4	.16	.0348
D	0	3.90	-3.90	15.21	3.9000
E	0	.46	-.46	.2116	.4600
F	4	2.99	1.01	1.0201	.3412
G	10	11.04	-1.04	1.0816	.0980
H	5	9.66	-4.66	21.7156	2.2480
I	2	.70	1.30	1.69	2.4143
J	4	3.69	.31	.0961	.0260
K	14	18.16	-4.16	17.3056	.9530
L	6	15.17	-9.17	84.0889	5.5431
M	5	2.31	2.69	7.2361	3.1325
N	10	5.51	4.49	20.1601	3.6588
O	28	22.76	5.24	27.4576	1.2064
P	21	16.55	4.45	19.8025	1.1965
Q	2	1.15	.85	.7225	.6283
R	5	4.13	.87	.7569	.1833
S	21	16.55	4.45	19.8025	1.1965
T	5	9.23	-4.23	17.8929	1.9386
U	0	.91	-.91	.8281	.9100
V	1	1.38	-.38	.1444	.1046
W	8	7.12	.88	.7744	.1088
X	5	5.74	-.74	.5476	.0954

$$= 35.3612$$

CHI Square is significant at the .05 level.

TABLE III-A

20 - 23 Single Female

OBSERVED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0	1	2	2
40 - 49	1	5	8	1
50 - 59	0	2	8	14
60 - 69	0	2	14	10
70 - 79	1	2	7	6
80 +	0	1	3	0

N = 90

EXPECTED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0.50	0.75	2.49	2.12
40 - 49	0.25	1.62	5.99	5.24
50 - 59	0.38	2.00	9.85	8.23
60 - 69	1.25	2.99	12.34	8.97
70 - 79	0.62	2.24	8.97	5.00
80 +	0.50	0.75	3.86	3.11

TABLE III-B

20 - 23 Single Female

CELL	f_o	f_e	$f_o - f_e$	$(f_o - f_e)^2$	$(f_o - f_e)^2 / f_e$
A	0	.50	- .50	.2500	0.5000
B	1	.75	.25	.0625	0.0833
C	2	2.49	- .49	.2401	0.0964
D	2	2.12	- .12	.0144	0.0068
E	1	.25	.75	.5625	2.2500
F	5	1.62	3.38	11.4244	7.0521
G	8	5.99	2.01	4.0401	0.6745
H	1	5.24	-4.24	17.9776	3.4308
I	0	.38	- .38	.1444	0.3800
J	2	2.00	.00	.0000	0.0000
K	8	9.85	-1.85	3.4225	0.3475
L	14	8.23	5.77	33.2929	4.0453
M	0	1.25	-1.25	1.5625	1.2500
N	2	2.99	- .99	.9801	0.3278
O	14	12.34	1.66	2.7556	0.2233
P	10	8.97	1.03	1.0609	0.1183
Q	1	.62	.38	.1444	0.2329
R	2	2.24	- .24	.0576	0.0257
S	7	8.97	-1.97	3.8809	0.4327
T	6	5.00	1.00	1.0000	0.2000
U	0	.50	- .50	.2500	0.5000
V	1	.75	.25	.0625	0.0833
W	3	3.86	- .86	.7396	0.1916
X	0	3.11	-3.11	9.6721	3.1100

$= 25.5623$

CHI Square is significant at the .05 level.

TABLE IV-A

20 - 23 Single Male

OBSERVED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	2	0	7	1
40 - 49	0	3	9	9
50 - 59	1	6	22	15
60 - 69	2	5	21	13
70 - 79	0	7	22	4
80 +	3	3	9	9

N = 174

EXPECTED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0.96	1.44	4.82	4.09
40 - 49	0.49	3.13	11.57	10.13
50 - 59	0.73	3.86	19.04	15.90
60 - 69	2.42	5.78	23.86	17.35
70 - 79	1.20	4.33	17.35	9.67
80 +	0.96	1.44	7.46	6.02

TABLE IV-B

20 - 23 Single Male

CELL	f_o	f_e	$f_o - f_e$	$(f_o - f_e)^2$	$(f_o - f_e)^2 / f_e$
A	2	.96	1.04	1.0816	1.2800
B	0	1.44	-1.44	2.0736	1.4400
C	7	4.82	2.18	4.7524	.9860
D	1	4.09	-3.09	9.5481	2.3345
E	0	.49	- .49	.2401	.4900
F	3	3.13	- .13	.0169	.0054
G	9	11.57	-2.57	6.6049	.5709
H	9	10.13	-1.13	1.2769	.0013
I	1	.73	.27	.0729	.0999
J	6	3.86	2.14	4.5796	1.1864
K	22	19.04	2.96	8.7616	.4602
L	15	15.90	- .90	.8100	.0509
M	2	2.42	- .42	.1764	.0729
N	5	5.78	- .78	.6084	.1053
O	21	23.86	-2.86	8.1796	.3428
P	13	17.35	-4.35	18.9225	1.0906
Q	0	1.20	-1.20	1.4400	1.2000
R	7	4.33	2.67	7.1289	1.6464
S	22	17.35	4.65	21.6225	1.2463
T	4	9.67	-5.67	32.1489	3.3246
U	3	.96	2.04	4.1616	4.3350
V	3	1.44	1.56	2.4336	1.6900
W	9	7.46	1.54	2.3716	.3179
X	9	6.02	2.98	8.8804	1.4751

$$= \quad 25.7524$$

CHI Square is significant at the .05 level.

TABLE V-A

24 and over Single Female

OBSERVED

G.P.A. Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0	0	0	3
40 - 49	0	0	3	3
50 - 59	0	0	1	4
60 - 69	0	0	0	2
70 - 79	0	0	1	4
80 +	0	0	0	0

N =   21

EXPECTED

G.P.A. Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0.12	0.17	0.58	0.49
40 - 49	0.06	0.38	1.40	1.22
50 - 59	0.09	0.47	2.30	1.92
60 - 69	0.29	0.70	2.88	2.09
70 - 79	0.14	0.52	2.09	1.17
80 +	0.12	0.17	0.90	0.73

TABLE V-B

24 and over Single Female

CELL	f_o	f_e	f_o-f_e	$(f_o-f_e)^2$	$(f_o-f_e)^2/f_e$
A	0	.12	- .12	.0144	.1200
B	0	.17	- .17	.0289	.1700
C	0	.58	- .58	.3364	.5800
D	3	.49	2.51	6.3001	12.8573
E	0	.06	- .06	.0036	.0600
F	0	.38	- .38	.1444	.3800
G	3	1.40	1.60	2.5600	1.8286
H	3	1.22	1.78	3.1684	2.5970
I	0	.09	- .09	.0081	.0900
J	0	.47	- .47	.2209	.4700
K	1	2.30	-1.30	1.6900	.7348
L	4	1.92	2.08	4.3264	2.2533
M	0	.29	- .29	.0841	.2900
N	0	.70	- .70	.4900	.7000
O	0	2.88	-2.88	8.2944	2.8000
P	2	2.09	- .09	.0081	.0039
Q	0	.14	- .14	.0196	.1400
R		.52	- .52	.2704	.5200
S	1	2.09	-1.09	1.1881	.5685
T	4	1.17	2.83	8.0089	6.8452
U	0	.12	- .12	.0144	.1200
V	0	.17	- .17	.0289	.1700
W	0	.90	- .90	.0081	.9000
X	0	.73	- .73	.5329	.7300

= 35.9286

CHI Square is significant at the .05 level.

TABLE VI-A

24 and over Single Male

OBSERVED

G. P. A. Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0	0	2	1
40 - 49	0	0	3	5
50 - 59	0	0	4	4
60 - 69	2	2	2	1
70 - 79	1	1	6	3
80 +	0	1	2	5

N =   45

EXPECTED

G. P. A. Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0.25	0.37	1.25	1.06
40 - 49	0.13	0.81	2.99	2.62
50 - 59	0.19	1.00	4.92	4.11
60 - 69	0.63	1.49	6.17	4.49
70 - 79	0.31	1.12	4.49	2.50
80 +	0.25	0.37	1.93	1.56

TABLE VI-B

24 and over Single Male

CELL	f_o	f_e	$f_o - f_e$	$(f_o - f_e)^2$	$(f_o - f_e)^2 / f_e$
A	0	0.25	-0.25	0.0625	0.2500
B	0	0.37	-0.37	0.1369	0.3700
C	2	1.25	0.75	0.5625	0.4500
D	1	1.06	-0.06	0.0036	0.0034
E	0	0.13	-0.13	0.0169	0.1300
F	0	0.81	-0.81	0.6561	0.8100
G	3	2.99	0.01	0.0001	0.0000
H	5	2.62	2.38	5.6644	2.1620
I	0	0.19	-0.19	0.0361	0.1900
J	0	1.00	-1.00	1.0000	1.0000
K	4	4.92	-0.92	0.8464	0.1720
L	4	4.11	-0.11	0.0121	0.0029
M	2	0.63	1.37	1.8769	2.9792
N	2	1.49	0.51	0.2601	0.1746
O	2	6.17	-4.17	17.3889	2.8183
P	1	4.49	-3.49	12.1801	2.7127
Q	1	0.31	0.69	0.4761	1.5358
R	1	1.12	-0.12	0.0144	0.0129
S	6	4.49	1.51	2.2801	0.5078
T	3	2.50	0.50	0.2500	0.1000
U	0	0.25	-0.75	0.5625	0.2500
V	1	0.37	0.63	0.3969	1.0727
W	2	1.93	0.07	0.0049	0.0025
X	5	1.56	3.44	11.8336	7.5856

$$= 25.2924$$

CHI Square is significant at the .05 level.

TABLE VII-A

20 and over Married Female

OBSERVED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	1	0	0	6
40 - 49	0	0	1	7
50 - 59	0	0	5	4
60 - 69	0	0	2	2
70 - 79	0	0	0	1
80 +	0	0	1	0

N = 30

EXPECTED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0.17	0.25	0.83	0.71
40 - 49	0.08	0.54	2.00	1.75
50 - 59	0.13	0.67	3.28	2.74
60 - 69	0.42	1.00	4.11	2.99
70 - 79	0.21	0.75	2.99	1.67
80 +	0.17	0.25	1.28	1.04

TABLE VII-B

20 and over Married Female

CELL	f_o	f_e	$f_o - f_e$	$(f_o - f_e)^2$	$(f_o - f_e)^2 / f_e$
A	1	.17	.83	.6889	4.0524
B	0	.25	- .25	.0625	0.2500
C	0	.83	- .83	.6889	0.8300
D	6	.71	5.29	27.9841	39.4142
E	0	.08	- .08	.0064	0.0800
F	0	.54	- .54	.2916	0.5400
G	1	2.00	1.00	1.0000	0.5000
H	7	1.75	5.25	27.5625	15.7500
I	0	.13	- .13	.0169	0.1300
J	0	.67	.67	.4489	0.6700
K	5	3.28	1.72	2.9584	0.9020
L	4	2.74	1.26	1.5876	0.5794
M	0	.42	- .42	.1764	0.4200
N	0	1.00	-1.00	1.0000	1.0000
O	2	4.11	-2.11	4.4521	1.0832
P	2	2.99	- .99	.9801	0.3278
Q	0	.21	- .21	.0441	0.2100
R	0	.75	- .75	.5625	0.7500
S	0	2.99	-2.99	8.9401	2.9900
T	1	1.67	- .67	.4489	0.2688
U	0	.17	- .17	.0289	0.1700
V	0	.25	- .25	.0625	0.2500
W	1	1.28	- .28	.0784	0.0613
X	0	1.04	-1.04	1.0816	1.0400

$= 72.2691$

CHI Square is significant at the .001 level.

TABLE VIII-A

20 and over Married Male

OBSERVED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0	0	2	1
40 - 49	1	0	2	1
50 - 59	0	0	2	4
60 - 69	0	0	3	3
70 - 79	1	1	6	9
80 +	1	0	6	2

N = 45

EXPECTED

G.P.A. / Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0.25	0.37	1.25	1.06
40 - 49	0.13	0.81	2.99	2.62
50 - 59	0.19	1.00	4.92	4.11
60 - 69	0.63	1.49	6.17	4.49
70 - 79	0.31	1.12	4.49	2.50
80 +	0.25	0.37	1.93	1.56

TABLE VIII-B

20 and over Married Male

CELL	f_o	f_e	$f_o - f_e$	$(f_o - f_e)^2$	$(f_o - f_e)^2 / f_e$
A	0	0.25	- .25	.0625	0.2500
B	0	0.37	- .37	.1369	0.3700
C	2	1.25	.75	.5625	0.4500
D	1	1.06	- .06	.0036	0.0034
E	1	0.13	.87	.7569	5.8223
F	0	0.81	- .81	.6561	0.8100
G	2	2.99	- .99	.9801	0.3278
H	1	2.62	1.62	2.6244	1.0017
I	0	0.19	- .19	.0361	0.1900
J	0	1.00	-1.00	1.0000	1.0000
K	2	4.92	-2.92	8.5264	1.7330
L	4	4.11	- .11	.0121	0.0029
M	0	0.63	- .63	.3969	0.6300
N	0	1.49	-1.49	2.2209	1.4900
O	3	6.17	-3.17	10.0489	1.6287
P	3	4.49	-1.49	2.2201	0.4945
Q	1	0.31	.69	.4761	1.5358
R	1	1.12	- .12	.0144	0.0129
S	6	4.49	1.51	2.2801	0.5078
T	9	2.50	6.50	4.2250	1.6900
U	1	0.25	.75	.5625	2.2500
V	0	0.37	- .37	.1369	0.3700
W	6	1.93	4.07	16.5649	8.5828
X	2	1.56	.44	.1936	0.1241

$$= \quad 30.2777$$

CHI Square is significant at the .05 level.

TABLE IX-A

Percentage of Students in Total Sample by Cells

G.P.A. Activity Units	0.0 - 0.99	1.0 - 1.99	2.0 - 2.99	3.0 - 4.0
00 - 39	0.55	0.83	2.77	2.35
40 - 49	0.28	1.80	6.65	5.82
50 - 59	0.42	2.22	10.94	9.14
60 - 69	1.39	3.32	13.71	9.97
70 - 79	0.69	2.49	9.97	5.56
80 +	0.55	0.83	4.29	3.46

N = 722 students

TABLE IX-B

Percentage of Success in Total Sample by Activity Units

Level of Achievement / Activity Units	Not Successful G.P.A. less 2.0	Successful G.P.A. = 2.0 or above	Highly Successful G.P.A. = 3.0 or above
00 - 39	21.20	78.80	36.10
40 - 49	15.40	84.60	40.10
50 - 59	11.60	88.40	40.20
60 - 69	16.60	83.40	35.10
70 - 79	18.00	82.00	30.80
80 +	15.10	84.90	37.90
TOTALS:	15.40	84.60	36.30

APPENDIX D

Delaware County Community College was opened in 1967 as a comprehensive two year public institution under the Pennsylvania Community College Act of 1963. The philosophy and long range goals of Delaware County Community College are as follows:

PHILOSOPHY

The Delaware County Community College is committed to the comprehensive community college philosophy of meeting the post-high school educational needs of the community it serves. Within this area of responsibility and available resources, the College is dedicated to the policy of providing educational opportunities that will permit the youth and adults of the area to enrich their lives, develop themselves personally, and advance their careers to the limit of their desires and capabilities.

The role of the College is to offer programs and services for which it is particularly capable. It seeks to complement, not duplicate unnecessarily, those offered by other community institutions and agencies. Further, the College aspires to be an accessible, comprehensive, community-centered and flexible institution.

The increased social and economic well being enjoyed by persons who avail themselves of these opportunities for individual growth will be reflected in the development of the business, industrial, professional, public service, and civic segments of the community.

LONG-RANGE INSTITUTIONAL GOALS

In adopting this statement of goals, the Board of Trustees wishes to provide the staff of the College with additional guidance for carrying out the mission of the College as set forth in the College Philosophy. They are long-range aspirations, which can come closer to reality as we give them attention and emphasis.

The Philosophy states that the College should be accessible, comprehensive, community-centered and flexible. Each of these major concepts needs further definition in order that the joint efforts of all concerned can be directed most effectively.

Accessibility

In stating the goal of accessibility, the Board desires that the College be geographically, economically, socially and educationally accessible to citizens of the community. Facilities are now and should continue to be conveniently located with respect to geographical and population centers of the area serviced, for a community college is an institution for commuters. The College should make every effort, in programs of financial assistance, to ensure that no applicant is denied admission to the College because of lack of funds. Educationally, the door of the College should be open to students with a wide diversity of backgrounds and abilities. Further diversity should be encouraged by making the College socially accessible to stimulate attendance by those who otherwise would not aspire to higher education.

Comprehensiveness

To be fully comprehensive means that the institution should be comprehensive in Instructional Programs, in Student Services, and in Educational Methods. In doing so, the College aims to be student-oriented rather than institution-oriented. To be comprehensive in program is to provide a broad range of offerings in response to student and community needs. In addition, student services are comprehensive when they provide the individual student not only a range of service but an integrated program aimed at assisting each student toward increasing maturity and personal development in his collegiate years. Comprehensiveness in method means that instruction should be presented in the most appropriate manner for the diversity of individuals and disciplines involved.

Recognizing that its Philosophy encourages the enrollment of people with differing abilities and objectives, the College will strive to offer a wide variety of curricula and courses. The College also recognizes that its basic Philosophy necessitates the inclusion of opportunities for experiences which will assist in the development of a more broadly educated person who has a better grasp in the interrelationship of knowledge fields, can think and express himself more effectively, can make more relevant judgments and discriminate among values, and can make more appropriate applications of his

knowledge. The opportunities to achieve commonly accepted goals of a good general education will be provided to the student in all of his activities at the College throughout his total College experience.

Once a student has clarified his career direction, the College will attempt to help him create, where feasible, an individually tailored curriculum from among those courses which the College offers. Recognizing that the process of education is a uniquely individual affair, the College should publish curricula patterns of courses only as guidelines to assist students in meeting minimum requirements in preparation for specific career objectives or the requirements of ot ier institutions or agencies.

In striving to be comprehensive, the College should provide:

- Courses whose purpose is to provide basic skills and knowledge for students to enable them to qualify for admission to the other programs. (Basic Education)

- Courses of a remedial nature designed with the objective of helping students to qualify for admission to a College and Univer: ty Parallel, an Occupational or General Program. (Developmental Education)

- General Education curricula of two years or less duration which are designed as discrete educational programs for students desiring additional education beyond secondary school but not necessarily with a particular occupational orientation. (General Education)

- Occupational curricula of two years or less duration which are designed as discrete educational experiences for students preparing for immediate employment in an area of specialization, for which there is a community need and an employment potential, upon completion of the curricula. (Occupational Education)

- The first two years of college instruction for students planning to transfer to four-year colleges or universities to complete the requirements for a baccalaureate degree. (College and University Parallel Education)

- Opportunities for citizens of the community to enrich their lives; to increase their potentialities as wage earners, as creative beings, and social individuals; and to realize the importance of individual excellence. These opportunities are provided through all of the other educational programs offered by the College as well as through specifically-designed courses, seminars, lecture series, workshops, and other types of educational and cultural activities. (Community Service Education)

The College accepts a diverse population of applicants representing a wide spectrum of abilities, interests, ages and socio-economic backgrounds. Each of these students has a broad span of unique characteristics that will affect his performance in and out of the college community. The College accepts responsibility for providing a structured student service program which has as its chief concern the overall growth and development of individual students.

These programs should include those which will help the student better understand himself, and others, both in the college community and in the larger society. First, each student needs to acquire a positive and realistic conception of his own abilities in the world of higher learning and in the world at large. Second, he needs to reach the point of being able to see the structure and inter-relations of knowledge so that he may begin the process of forming judgments on his own. Third, he needs to see the relevance of higher learning to the quality of his own life and to see that life in relation to the new kinds of judgments he now makes.

Concerning comprehensiveness in educational methods, the College accepts the responsibility for providing an instructional environment that is conducive to learning. This means the providing of appropriate physical facilities where faculty and students meet, the providing of learning resources to complement classroom experiences, and the organization of the instructional process so that it reflects the ways individuals learn best.

The College must develop a variety of methods to help students learn, encourage instructional innovation and accept its responsibility to provide ways to reach individual students.

Community-Centeredness

The third major goal is that the institution be truly community-centered. As a locally sponsored two-year college whose purpose is to meet community post-secondary needs, it is essential that these needs be defined and recognized, and two-way communication developed with the community. The College should be sensitive to the concerns of its many publics. The Board of Trustees, itself, as the representative of the Local Sponsor, should be the chief vehicle for coordinating communications with the Local Sponsor. Lay committees, to advise on curriculum development or liaison representatives from the sponsoring school districts, should facilitate communication. The College is obligated to the Local Sponsor to use wisely the resources provided. The ultimate goal of community-centeredness is the accountability of the College for carrying our the mission and charge given to it by its sponsor at the time of founding. Furthermore, the College should invite community involvement and interest and seek to become a community cultural center. Community use of the College facilities should be encouraged.

Flexibility

The goal of flexibility or adaptability should help to place a perspective on the College's role, particularly during any one period. Flexibility means that the College is a dynamic institution, which can truly adapt to changing needs, changing circumstances, changing aspirations. This implies a commitment to experimentation and innovation, but also an evaluation of the success of the projects carried out, with an understanding that some experiments may not be completely successful. The College should be committed to regularly evaluating present offerings in terms of need and effectiveness in addition to serving new needs. In fulfilling its educational mission and in aiming to be accessible, comprehensive, and community-centered, the College should be flexible in allocating its resources so that its institutional goals can be achieved in a planned program of emphasis and development.

Although the literature indicates that a range of fifty to eighty percent of community college students are employed part time or full time, and estimates at Delaware County Community College indicate that seventy to eighty percent of the students are employed, no actual studies have been conducted.