

A STUDY OF THE AVERAGE MONTHLY INCOME AND EXPENDITURES  
OF MARRIED DARTMOUTH STUDENTS RESIDING IN SACHEM VILLAGE,  
WIGWAM CIRCLE, MIDDLE AND SOUTH FAYERWEATHER HALLS  
OCTOBER 1946 - APRIL 1947

*Very good job*  
*A*

*HD*  
*6*  
*care*

By:  
Thomas J. Murray  
Leonard E. Morrissey

May 30, 1947

## TABLE OF CONTENTS

Chapter I - Introduction	Page 1
Chapter II - Findings	Page 9
Section 1 - College Average	Page 10
Section 2 - Area Comparisons	Page 13
Section 3 - Family Size Comparisons	Page 24
Section 4 - Findings Classified by Area and Family Size	Page 33
Chapter III - Conclusions	Page 46
Chapter IV - Sample Questionnaire	Page 61

## CHAPTER I

## INTRODUCTION

### Purpose of Study

The primary purpose in conducting this study among married Dartmouth students was to ascertain an overall picture of the average family's income and expenditures on a monthly basis during the period from October, 1946, through April, 1947. Further, in respect to income, it was felt desirable to determine the various sources of income, what per cent of the families depend on each of these sources,<sup>and</sup> how much is received by the imaginary average or typical family. A similar analysis of expenditures was made to determine expenditure habits of this typical family unit, variations in their habits, and reasons for these variations.

A secondary purpose of the study was to compare the above mentioned factors of income and expenses among the three housing units for married veterans at Dartmouth - Wigwan Circle, Sachem Village, and Middle and South Fayerweather Halls. It was felt by many on campus that there was considerable variation in costs among the three areas, primarily due to different housing facilities and varying utility costs. The study bore out this general contention.

Finally, a comparison of income and expense habits by family size was deemed necessary. The number of married students with two or more children is

negligible. However, it was found that approximately 30 per cent of the couples have one child. Therefore, 30 per cent of our ultimate sample was selected from this group.

### Definitions

Income was defined as the average amount received in dollars each month, both in total and by category. The following sources of income were included:

1. Government allowances
2. Savings
3. Advances from relatives
4. Self-support
  - Husband
  - Wife
5. Other income

Originally a category "return on investments" was included. However, this source was found to be of relatively little importance and hence was combined with gifts and insurance to form "other income". No source, other than these three, is included in "other income".

Expenditures were defined in a similar fashion, that is, both in total and by categories. The following classifications were made for monthly expenditures:

1. Food
2. Household operations
3. Household furnishings
4. Clothing
5. Entertainment and social
6. Transportation
7. Miscellaneous items

"Food" included both meals at home and meals out in Hanover. "Household operations" consisted of rent, all utilities not included in rent, household cleaning supplies, and laundry and cleaning services. "Household furnishings" was defined as expenses for the purchase of furniture, kitchenware, and appliances. The item "clothing" includes expenditures on a monthly basis for all members of the family. "Entertainment and social" was broadly treated in that it contains monthly expenditures for a variety of items ranging from movies and athletic events to beverages and periodicals. However, it was felt that one broad category of this nature would show greater stability and be more indicative of actual conditions than a number of smaller categories each with high dispersion. "Transportation" was defined as all transportation expenses whether incurred on a public conveyance or in the operation of a private automobile. A comparison was made between the transportation expenses of car owners and non-car owners in the belief that automobile ownership could seriously bias this category. The "miscellaneous" classification was intended as a catch-all, although, as will be pointed out later, it consists for the most part of three items, insurance, tobacco, and medical and dental expenses.

### The Sample

College records indicated that 273 families were residing in the three areas provided for married students. These 273 families were distributed among these areas as follows:

Wigwam Circle	161
Sachem Village	48
Middle Fayerweather Hall	41
South Fayerweather Hall	<u>23</u>
	273

It was agreed that a sample of 25 per cent or 68 families would be sufficiently large to assure consistent results. This sample was stratified in two ways in conjunction with the purposes of the study. The first stratification was according to living areas. Since the 161 families residing in Wigwam Circle constituted approximately 60 per cent of the total number of families residing in the three areas, 60 per cent of the sample was selected from Wigwam Circle. It was determined by questioning one or more residents of each building in Wigwam Circle that 20 per cent of the families in Wigwam Circle have one child. Therefore, of the 40 families selected from Wigwam Circle (60 per cent of 68) 8 families, or 20 per cent, had one child. A similar technique was followed in Sachem Village and Middle and South Fayerweather Halls.

As was noted earlier approximately 30 per cent

of the total families have one child. This figure varies from the above mentioned 20 per cent in Wigwam Circle and the Fayerweather Halls to nearly 75 per cent in Sachem Village.

### Collection of Data

A questionnaire-interview technique was employed in collecting the data. The questionnaires were left with each family for a period of from two days to a week. The interviewer explained the study to each family sampled, briefly went through the questionnaire, and then left the questionnaire to be picked up in a few days. Families sampled were asked to refrain from replying to any questions about which they were doubtful until the interviewer returned and explained the question more fully. In a few instances this meant an additional call, but it was felt well worthwhile, since more accurate information was ultimately obtained.

Questionnaires were distributed in both the afternoon and the evening. It was deemed particularly desirable to distribute some questionnaires in the evening to avoid overlooking families where the wife works during the day. Similarly, it was thought that distribution of some questionnaires in the afternoon would avoid missing people who are frequently out in the evening.



Cooperation and interest were very gratifying to the interviewers. Of the 68 questionnaires distributed, 64 were returned.

The questionnaire itself was as brief as possible, and yet suggestive enough to include nearly all possible sources of income and types of expenditures. Income was requested on a purely monthly basis. Expenditures were requested as either "average monthly", "total since October 1, 1946", or "total for 12 months." Such items as household furnishings, transportation, and clothing were requested as "total amount spent since October 1, 1946." They were then divided by 7 to obtain a monthly average for the period. Automobile registration and repair expense was for a 12 month period. These figures were then divided by 12 to obtain the average monthly expenditure.

### Editing

Of the 64 Completed questionnaires, 10 were discarded as inconsistent. For the most part the monthly income on these discarded questionnaires was far less than expenditures, in a few instances as much as \$60 - \$70. The 54 remaining suitable questionnaires constituted a final sample of 20%. It should be noted that the same relative weights in respect to living area and family size were maintained in this final sample as in

the original 25% sample. It was necessary to edit several of the 54 acceptable questionnaires. As might be expected on only one or two of the questionnaires did income exceed expenditures. However, in several cases expenditures exceeded income by \$5 - \$10. Generally, in this latter case, income figures were corrected to equal expenditures, although the opposite was done in one or two cases where it appeared more likely to be the actual case. Questionnaires were discarded where this discrepancy between income and expenditures exceeded \$10. Generally the two were nearly equal. This fact may be attributed to the fact that most of the people interviewed maintained a budget or some other record of income and expenses.

#### Tabulation and Presentation of Data

The data was tabulated according to the above mentioned stratification. The final results are all arithmetic means, and, as such, are liable to considerable dispersion. Within each living area, and in comparing families with and without children this dispersion was not found to be excessive.

It is felt that a graphic and tabular presentation of the final data is more clearly understood and effective than a written explanation of the findings. The following tables and charts present an overall picture of the income and expenditures of the "typical" Dartmouth family, followed by a breakdown according to place of residence, and family size.

CHAPTER III  
CONCLUSIONS

## Introduction

From this survey and the results which have been presented, it becomes apparent that any conclusions from the figures must be tempered by many qualifications before they are put forward as truth. Although being a serious drawback to any form of generalization, this very fact puts the figures in a new light. They become not only abstract averages from a series of reports but also represent stories in themselves - with as much in the way of dispersion in back of them as conciseness in their final form. For this reason, it would be well to study the most important results and see what lies in back of them.

## The College Average

The most interesting and easiest to remember conclusion from this survey was that the college average of income and expenses was \$218. To illustrate the previous point, we here have a concise figure - easy to express and easy for the layman to interpret - "The average married G. I. up at Dartmouth shells out \$218 to get by living an average month." How easy it would be if we could allow the findings to be expressed so easily. However the story behind this average is quite interesting. \$218 per month refers to a family

with 1/3 of a child living in a composite of Wigwam Circle, Sachem Village, South Fayerweather Hall and Middle Fayerweather Hall at Dartmouth College. There are other variances behind this average but the foregoing will bear out the need for caution in the interpretation of our results.

Breaking down this overall average into an area comparison, we find that there is a \$52 spread from the most expensive to the least expensive living areas:

Wigwam Circle	\$208
Sachem Village	\$260
Fayerweather Halls	\$212

This shows that although Wigwam Circle and the Fayer-Weathers are quite close in approximate living costs, the Sachem Village area is quite expensive and vitiates moreso the use of any average to represent the college as a whole.

Another important departure from the overall average is found when we compare families with a child and those without children. Here we find a smaller range but yet one large enough to merit our attention. It amounts to \$29 as shown in the following table:

Families with children-----	\$238
Families without children--	209
	<u>-\$ 29</u>

## Income

What are the main reasons for this variance? In attempting to explain this and other variances, we might look at various income patterns to show us the whys and wherefores. However, on examining these, we found no definite indication to show us that differences in income produced differences in expenditures. Rather, we found, through conversation with the families, that differences in income were produced by different needed levels of expenditure. That is to say - a family spent more not because it had the available cash but because of commitments such as high rent, children came, etc. which forced it to live at a high level of spending. A point to bear this out is that families with children draw on savings twice as heavily as families without children. The families with children utilize savings to cover 37.5% of their budget while families without children depend on savings for only 17.5% of their income. This is also borne out ~~out~~ by studying the spending habits of the groups in the three areas. Here again Sachem Village had 35% of its income supplied from savings, while the Fayerweather group only derives 17.5% of its income from savings.

Having shown that income in itself is not the

determinant in setting expenditures but rather that the opposite prevails, we must turn our attention to the expenditures section of the study.

Before examining the expenditures, a few interesting facts on income are presented. It was found that the G. I. Bill provides only 41% of the total income of the average family here at school. This varies on an area basis from 34.5% for Sachem Village and 43% for both the Fayerweathers and Wigwam Circle. Also a family with children only receives 30% from this source and a family without children still receives only 43%. However, the G. I. Bill is still the most important source of income for these students and in being so negates the fear of many masculine members on our campus that the fairer sex is here to stay - one way or the other. A good word must be said for the wives of Dartmouth men because on the average they contribute 14% to the family till each month. However some wives do not work at all and a much more meaningful average is found when we say that 40% of the wives work and make, on the average, \$75 per month. The prevalence of wives working is highest in the Fayerweathers where the wives without children are represented in the town working force at the rate of four (4) out of every five (5).

Another important source of income is receipts from relatives. We found 40% of the student body residing in the mentioned areas.<sup>received funds from relatives.</sup> The average amount received from relatives each month figured out to be \$60. Again this varied considerably for individuals, but as far as the area and family comparison was concerned, we found that there was no appreciable difference with the average amount accounting for approximately 11% of the budget.

Savings have already been treated and the dispersion illustrated. In passing we may say that next to the G. I. bill this was the most important source of income. Also it was second most popular with 75% of the families relying on savings and drawing on them at the rate of \$70 per month.

The rest of the incomes were made up of very small contributions on the average from husband's earnings, returns on investments, insurance and gifts being incidentally reported by a few families but not in sufficient numbers to merit our attention here which must be restricted to the high points of the results.

## Expenditures

### General

It must be borne in mind in the following discussion that any explanation that is offered is meant



to explain the variances in averages. Explaining the differences between individuals would take us into many sociological and psychological discussions that would shed little light on the overall picture and monopolize too much time. It will be attempted to show why variances were found in the general patterns.

### Individual Items

#### 1. Food

In this category we find much of the variance between the families with children and those without children. The average of the college as a whole was \$63 per month or 29% of the total expenditures. The families with children however spent \$69 per month as compared to those families without children that spent only \$60 per month. Therefore we find a range of \$9 that explains in part the difference in expenditures per size of family.

In going from area to area, there is no appreciable difference. The Sachem Village area did spend a lower percentage on food than the other areas but this was due to other high expenses prevailing in that area and not due to any increase in absolute amounts.

An interesting sidelight is that 97% of the food budget is consumed at home and only 3% in the downtown and outlying areas.

## 2. Household Operations

The college average for this item was found to be \$55 and it accounted for 26% of the budget. It was spent as follows:

Rent	\$36.30	- 65%
Utilities	12.40	- 22%
Laundry & Cleaning	6.30	- 13%
	<u>\$55.00</u>	<u>100%</u>

Within this item can be found much of the story behind the area and family dispersion. By areas the following figures were found:

Wigwam Circle	\$48
Sachem Village	59
Fayerweather Halls	59

This shows a dispersion of \$29 from the highest to the lowest cost living area. This item is mainly different from area to area because of rent and not the other items. It was found that although Fayerweathers had low utility costs in comparison with the other areas, the results for utilities and laundry and cleaning were fairly stable. The main reason for the wide difference between Sachem Village and Wigwam Circle can be found in the fact that Wigwam Circle offers many units at only \$20 per month while Sachem Village has quite a few units where \$55 per month rent is charged. However the same absolute difference is maintained from area to area in regard to the spread between rent and household operation.

The total of \$79 in Sachem Village minus the \$55 rent gives \$24 as other operating costs. The same result may be secured when we compare the same figures for Wigwan Circle. ( $\$48 - \$24 = \$24$ ). This "other operating cost" of \$24 did not become the college average however because of the low utility costs in the Fayerweathers' of \$5.00 and the presence of some higher priced apartments in Wigwan Circle and a few low-priced units in Sachem Village.

The living area is also responsible for much of the difference between families with and without children. Here an observed range of \$17 was found:

Families with children-----	\$67
Families without children--	50
	<u>\$17</u>

This too can be explained because of rent. Families with children are never found in the \$24 units in Wigwan Circle and are found for the most part in the \$55 units in Sachem Village. Sachem Village houses approximately half of the Dartmouth students' children. Because of this, it is small wonder that we find a spread of \$17. The whole spread of \$30 did not register because some families with children reside in the \$30 Wigwan Circle units. The range of \$17 was also influenced by a slightly higher laundry expense among the families with children. However its effect was quite

small when compared to the difference in rents.

With the two factors already discussed - food and housing - we have covered the main reasons for variance between the areas and size of the family. However in other categories, dispersion was found and a discussion is needed to qualify the given averages.

### 3. Furnishings

The college average monthly expense for this item was \$13 or 6% of total expenses. There was a great amount of dispersion behind this and we found some people spending nothing on furnishings since October 1, 1946 and a few averaging close to \$60 per month.

In analyzing this, we found it could not be explained by difference in size of the family. Whether a family has children or not has a very small effect on their furniture expenditure. It is a little high for families with children but the difference is so small that it can be safely ignored.

In analyzing the areas, a difference is found with Wigwam spending an average of \$18 per month and families in the Fayerweathers spending only \$5 or 2% of the budget. In interviewing the families, it was found that the newly-arrived people are in Wigwam and the long-term residents are in the Fayerweather Halls.

The Fayerweather residents had their furniture fully installed at the starting point of this survey while the Wigwam residents were in the process of purchasing theirs. This fact, although apparently slight, was verified as being the chief reason for the variance.

#### 4. Clothing

The college average for this item was \$16 and was found to account for 7% of the total expenses.

Dispersion of a slight nature was found among the original schedules but in taking a ratio of clothing to total expenses we found a striking result. In practically all cases this ratio was 7%. We found, in the high expense areas a higher expenditure for clothes but the percentage was still the same. Children accounted for \$3 a month average expenditure for clothing but the families with children still had the same average of 7%.

This might lead one to say that one spends according to his income here at Dartmouth which we discounted in the early part of the discussion. That statement is still refuted because although in general it does pertain, the differences we discovered were due to circumstances that may have been elected by the party in question but still compel him to seek other income to match many fixed expenses beyond his control. However in this item of clothing we may conclude in saying that

the reason for the constant percentage is due mainly to increasing costs for clothing in direct relationship to increasing costs of all categories.

#### Fr. Entertainment and Social

The college average for this item is \$22 per month and represents 10.5% of the families' expenses. The dispersion that was noted in this category followed a general pattern divided between families with and without children.

Families without children----	\$25.00	12%
Families with children-----	17.50	7.5%

The reason for this higher expenditure on the part of the childless couples may easily be explained by the fact that they have more time to go to movies, parties, etc. than the families with children. Their entertainment is restricted to home affairs and the expense is held down. This reasoning may be validated by examining the difference between the areas and the proportion of children in these areas. Sachem Village has a very high proportion of families with children to the total population in the area. It is approximately 75% as compared to the 20% figure in both Wigwam Circle and the Fayerweathers. The entertainment item in Sachem is only \$18 as compared to the combined average of \$23 in the other two areas. Although families with children have generally higher expenses, this is one compensating feature.

## 6. Transportation

This item accounts for .5% of the budget as it takes about \$18 per month to keep the average Dartmouth family moving. In analyzing differences we found that families with children and families residing in Sachem Village had the highest expenditure when compared to their counterparts. This can be seen from the following illustrations:

<u>Family Comparison</u>		
Families with children	\$32	10.5%
Families without "	16	7.5%
Range	16	3.0%
<u>Area Comparison</u>		
Sachem Village	\$31.50	12.0%
Fayerweather Halls	15.50	7.5%
Wigwam Circle	15.25	7.5%
Range	16.25	5.0%

In explaining the size of family difference, it became apparent that the presence of a baby gives an impetus to travel. Most families desire to see the baby and usually the new mother does go off on a long trip after the baby is about 3-6 months old. This fact was discovered in talking with many of the Dartmouth mothers.

However the main variance was in the area comparison with the \$16 spread. We found that this was due to the much higher proportion of car ownership in Sachem Village than in the other areas. The average for the campus was 35%, but more than half of the Sachem

Village residents owned cars and this counted for the wide range because we found that the average monthly expense in operating a car was \$35 which was twice as much as was spent by people without cars on transportation - \$17.50. The above reasons are the main causes for this range in transportation costs.

#### 7. Miscellaneous

Lumped into this category we find certain items looming large such as:

Insurance	\$8.60
Medical and Dental	6.25
Tobacco and Candy	6.00

Seeing that this category was for miscellaneous items, little can be said about any reasons for the dispersion in the total. Reasons for variance in the individual items such as tobacco, gifts, etc. are many and varied but add little to the interpretation of the average.

However it must be pointed out that the families with children spent more in this category because they have higher medical and dental expenses and also carry more insurance.

#### Conclusions

To some these averages may appear high but the fact must be carried in mind that these averages include



all conceivable expenses. For the benefit of those who think along a line of thinking of a current budget, only, the following averages for the college are presented to be compared with our original estimate of \$218:

Food	\$ 63.25
Household operations	<u>55.75</u>
Entertainment and Social	22.50
Miscellaneous,	29.00
	<u>\$170.50</u>

This is not presented to illustrate a minimum budget , but is given to compare Dartmouth living costs to the average living costs that so many people immediately think of excluding furnishings, transportation and clothing.

✓

CHAPTER IV

SAMPLE QUESTIONNAIRE

# ESTIMATED EXPENDITURES AND RECEIPTS OF MARRIED DARTMOUTH STUDENTS

(Please look over all questions before answering any)

## GENERAL INFORMATION

1. Class (numerals) -----
2. Residence (Wigwam, Sachem, etc.)-----
3. Number of children -----
4. Age -----
- Husband-----
- Wife -----
5. Terms remaining-----

## INCOME (monthly)

1. Government allowances-----
2. Amount from savings-----
3. Current self-support -----
- Husband-----
- Wife-----
4. Advances from relatives-----
5. Return from investments (ave. month) -----
6. Other (please specify) -----

## EXPENDITURES

1. Food (monthly)
  - Meals at home-----
  - Meals out (in Hanover)-----
2. Household operations
  - Rent (monthly)-----
  - Fuel (monthly)-----
  - Gas (monthly)-----
  - Electricity (monthly)-----
  - Ice (monthly)-----
  - Cleaning supplies (monthly)-----
  - Laundry and cleaning (monthly)-----
  - Telephone (monthly)-----
3. Household equipment
  - Furnishings (past year) \*\*
    - (chairs, desks, lamps, bedding, etc)
    - Kitchen utensils & appliances (past yr)
4. Clothing
  - Husband (past year)-----
  - Wife " " -----
  - Children " " -----

\*\* NOTE: Past year refers to the period October 1,  
1946 to present unless otherwise specified.  
page 1

5. Entertainment & social
  - Movies (monthly)-----
  - Sporting goods (past year)-----
  - Spectator at athletic events (past yr)-----
  - Concerts & plays (past year)-----
  - Fraternity taxes & dues (past year)-----
  - Out-of-town trips (past year)
    - (include all expenses excluding
    - regular college vacations)-----
  - Beverages, soft & alcoholic (past yr)-----
6. Educational fees
  - Tuition & extra fees (past year)
    - (not covered by G. I. Bill)-----
7. Books, periodicals, music, etc. (past yr)
  - Books (not text books past year) ----
  - Periodicals & newspapers-----
  - Music (including records) -----
  - Other-----
8. Transportation (regular vacations of
  - past year)-----
9. Automobile operation
  - Gas, oil, garage, etc. (monthly)-----
  - Registration, insurance, repairs,
  - etc. (12 month period)-----
10. Miscellaneous (average monthly)
  - Insurance-----
  - Contributions (church & charity)-----
  - Medical & dental-----
  - Tobacco-----
  - Candy-----
  - Toilet articles & cosmetics-----
  - Barber & hairdressing services-----
  - Shoe repairs-----
  - Jewelry-----
  - Other (please specify)
    - 
    - 
    -

THANK YOU