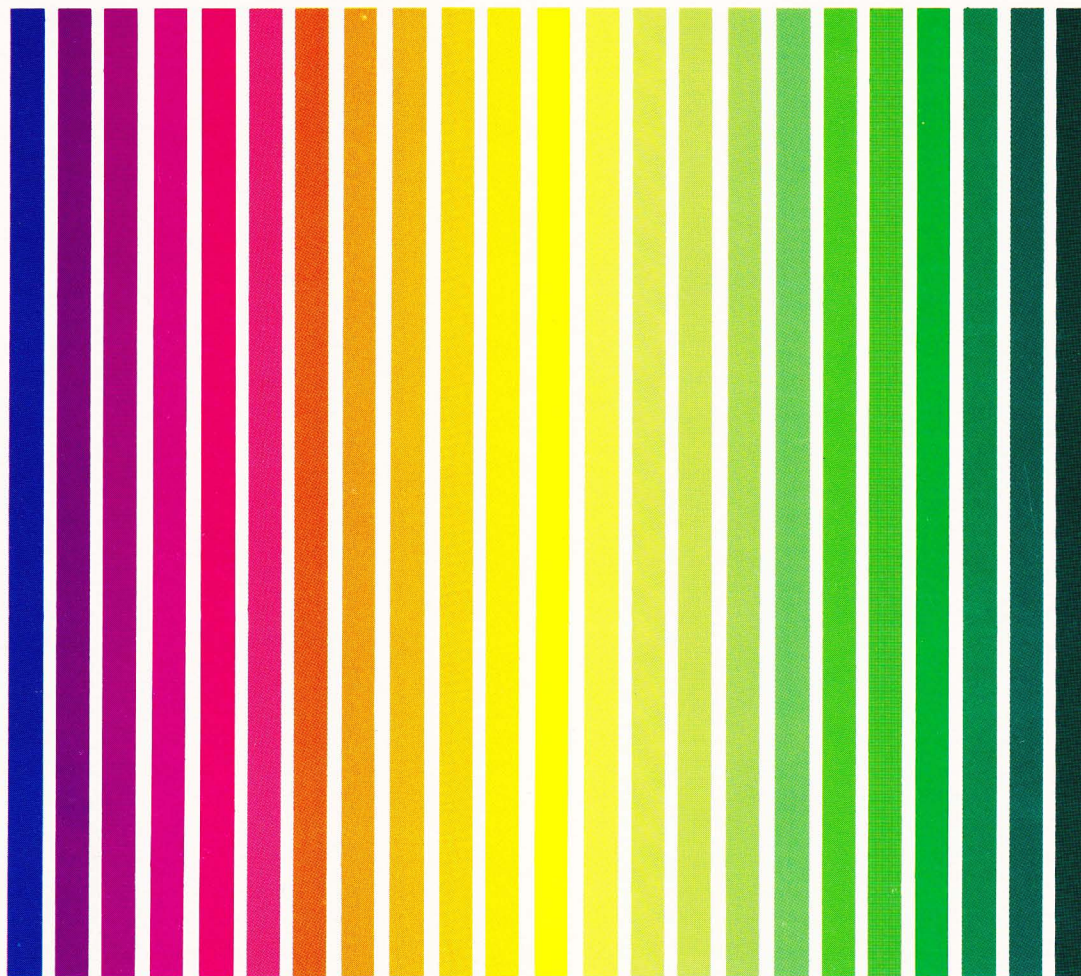# APX

ATARI® PROGRAM EXCHANGE

Jerry Falkenhan

FAMILY BUDGET

A budget analyzer for use with FAMILY CASH FLOW

Diskette: 32K (APX-20108)

User-Written Software for ATARI Home Computers

FAMILY BUDGET

by

Jerry Falkenhan

Program and Manual Contents © 1982   Jerry Falkenhan

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```
IMPORTANT!


DUPLICATE
  THIS
DISKETTE
 BEFORE
  USING
  THIS
PROGRAM!
```
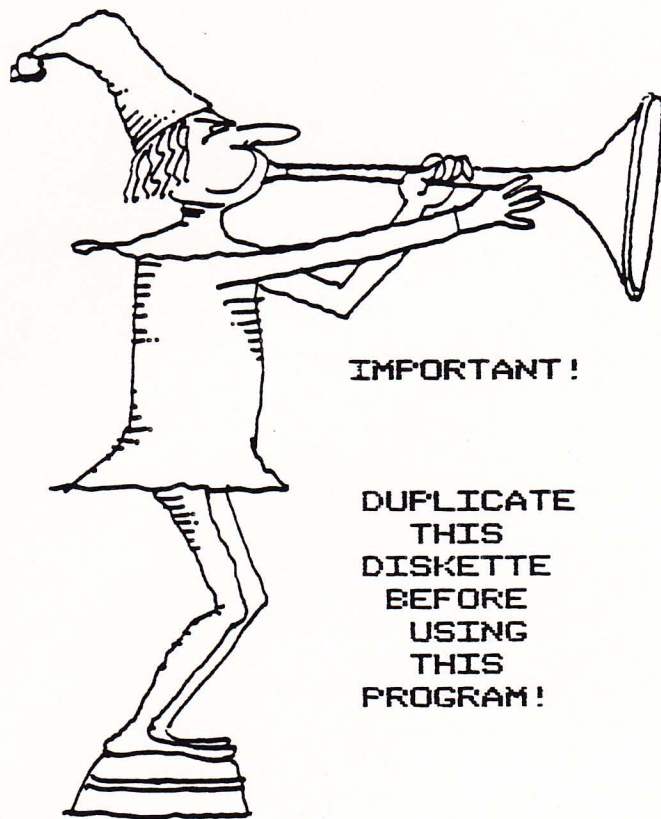
This APX diskette is unnotched to protect the software against accidental erasure. However, this protection also prevents a program from storing information on the diskette. The program you've purchased involves storing information. Therefore, before you can use the program, you must duplicate the contents of the diskette onto a notched diskette that doesn't have a write-protect tab covering the notch.

To duplicate the diskette, call the Disk Operating System (DOS) menu and select option J, Duplicate Disk. You can use this option with a single disk drive by manually swapping source (the APX diskette) and destination (a notched diskette) until the duplication process is complete. You can also use this option with multiple disk drive systems by inserting source and destination diskettes in two separate drives and letting the duplication process proceed automatically. (Note. This option copies sector by sector. Therefore, when the duplication is complete, any files previously stored on the destination diskette will have been destroyed.)

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FIGURES

INTRODUCTION

OVERVIEW

How much am I spending on food in the summer? What are my utilities costing in the
winter? Am I budgeting enough for clothing?

With FAMILY BUDGET you can answer these questions and many more. FAMILY BUDGET is
designed to take advantage of information to help you set up a practical budget based on
your real data. After the "setup" procedure, you use a number of displays to evaluate
your performance. The program uses your own category names in the displays.

REQUIRED ACCESSORIES

32K RAM
ATARI 810 Disk Drive
ATARI BASIC Language Cartridge
FAMILY CASH FLOW APX-20080

OPTIONAL ACCESSORIES

ATARI printer or equivalent printer

CONTACTING THE AUTHOR

Users wishing to contact the author about FAMILY BUDGET may write to him at:

6130 McAbee Road
San Jose, CA 95120

GETTING STARTED

SETTING UP

1. Insert the ATARI BASIC Language Cartridge into the cartridge slot of your computer.
2. Turn on your disk drive.
3. When the BUSY light goes out, open the disk drive door and insert the FAMILY BUDGET diskette with the label in the lower right-hand corner nearest to you. (Insert it in disk drive one if you have more than one drive.)
4. Turn on your computer and your TV set.
5. If you're planning to use your printer, turn it and the ATARI 850 Interface Module, if applicable, on.
6. As the program automatically loads into the computer memory, this message displays:

```
          I'M LOADING
          'BUDGET' NOW
          PLEASE STANDBY

          COPYRIGHT 1981 BY
          JERRY FALKENHAN
```

Then the question "HAVE YOU CHANGED YOUR CATEGORY NAMES? Y/N" appears. For now press the "N" key. The last question, "DO YOU HAVE NEW DATA" should also be answered by pressing the "N" key. These two "N" key presses cause the following message to appear and the main program to run:

```
          I'M WORKING HARD
          LOADING STUFF

            ...STANDBY...
```

Then the Main Menu displays:

```
-------------------------------
|$|   FAMILY BUDGETS    |$|
-------------------------------
|$|(A) REVIEW BUDGETS  |$|
|$|(B) CHANGE ENTRIES  |$|
|$|(C) PRINT BUDGETS   |$|
|$|(D) SETUP BUDGETS   |$|
|$|(E) LEAVE PROGRAM   |$|
-------------------------------
|$| WHICH CHOICE?(A-E)|$|
-------------------------------
```

Figure 1   Main Menu

ENTERING INFORMATION AND RESPONDING TO PROMPTS

You pick menu options by pressing the letter corresponding to the option you want (e.g., press "A" if you want to review your entries). Similarly, you respond to prompted questions requiring a "yes" or "no" answer by pressing "Y" or "N". Pressing the RETURN key isn't necessary in these instances. When you enter data (for example, a new dollar amount), you need to press the RETURN key to notify the program that you've completed your input. A prompt reminds you whenever pressing the RETURN key is necessary.

SAMPLE SESSION

Your diskette contains a set of budget and actual file entries for January through September, as well as category names from FAMILY CASH FLOW (APX-20080). You can use these entries to familiarize yourself with the program's activities and introduce yourself to the workings of FAMILY BUDGET. Let's assume you want to review your budget. You select option A, REVIEW BUDGETS, by pressing the "A" key. The presentation menu now appears as follows:

```
-----------------------------------------------
|YEARLY PRESENTATIONS-REVIEW BUDGETS |
-----------------------------------------------
|(A)BUDGET EXPENSE vs ACTUAL EXPENSE |
|(B)ACTUAL INCOMES vs BUDGET INCOMES |
|(C)INCOMES BUDGET vs EXPENSES BUDGET|
|(D)INCOMES ACTUAL vs EXPENSE ACTUAL |
|(E)SINGLE CATEGORY INCOMES          |
|(F)SINGLE CATEGORY EXPENSE          |
-----------------------------------------------
|MONTHLY PRESENTATIONS-REVIEW BUDGETS|
-----------------------------------------------
|(G)ACTUAL INCOMES vs BUDGET INCOMES |
|(H)ACTUAL EXPENSE vs BUDGET EXPENSE |
-----------------------------------------------
   REVIEW WHICH PRESENTATION?(A-H)
   PRESS 'X' TO CHANGE FUNCTION

      Figure 2  Presentation Menu
```

With this menu, you can choose the presentation that best suits your current needs. Pressing the "X" key returns you to the Main Menu. To see your budgeted expenses against your actual expenses, press the "A" key (OPTION A-BUDGET EXPENSE vs ACTUAL EXPENSE). The following months menu displays:

```
               REVIEW ENTRIES
               BUDGET EXPENSE
                     vs
               ACTUAL EXPENSE

                  (A) JAN
                  (B) FEB
                  (C) MAR
                  (D) APR
                  (E) MAY
                  (F) JUN
                  (G) JUL
                  (H) AUG
                  (I) SEP
                  (J) OCT
                  (K) NOV
                  (L) DEC

        START MONTH? (A-L) OR 'X' TO EXIT
```

Figure 3 Months Menu

With this menu, you choose any month, any consecutive set of months, or press the "X" key to return to the Presentation Menu. The program displays a prompt asking you to choose a "start month". Once you press the letter corresponding with the desired month a prompt appears requesting the "stop month". If you accidently press a letter not listed in the display, a warning sign flashes indicating an invalid choice.

If you choose January as the start month and November as the stop month, the following table appears:

```
                       EXPENSE

      MON  BUDGET   -   ACTUAL  = VARIANCES
      ---  --------     --------   ---------
      JAN $ 4218.00  $ 5898.14  -  1680.14
      FEB $ 4218.00  $ 3679.56  +   538.44
      MAR $ 4218.00  $ 3476.34  +   741.66
      APR $ 4218.00  $ 6480.07  -  2262.07
      MAY $ 4218.00  $ 4418.42  -   200.42
      JUN $ 4218.00  $ 4583.72  -   365.72
      JUL $ 4218.00  $ 4156.23  +    61.77
      AUG $ 4218.00  $ 4860.80  +   642.80
      SEP $ 4218.00  $ 1107.25  +  3110.75
      OCT $ 4218.00  $     .00  +  4218.00
      NOV $ 4218.00  $     .00  +  4218.00
           ========   ========    =======
      TOT $46398.00  $38660.53  +  7737.47
      AVG $ 4218.00  $ 3514.59  +   703.41
           PRESS 'C' TO CONTINUE
```

Figure 4 Summary Table

As you can see, the budgeted expenses for each month of the sample budget are set at $4,218.00. You see no expenses incurred in the months of October or November. September is a partial month's data. You see the AVERAGE EXPENSES calculated on the TOTAL MONTHS presented. Hence, a display from January to August gives a more accurate picture of average monthly expenses. To obtain this more desirable range, press the "C" key and the MONTH MENU reappears. Then choose January for the start month and August for a stop month and the following table displays:

```
                     EXPENSE
     MON     BUDGET   -  ACTUAL   =  VARIANCES
     ---     -------     -------     ---------
     JAN  $  4218.00  $  5898.14  -   1680.14
     FEB  $  4218.00  $  3679.56  +    538.44
     MAR  $  4218.00  $  3476.34  +    741.66
     APR  $  4218.00  $  6480.07  -   2262.07
     MAY  $  4218.00  $  4418.42  -    200.42
     JUN  $  4218.00  $  4583.72  -    365.72
     JUL  $  4218.00  $  4156.23  +     61.77
     AUG  $  4218.00  $  4860.80  -    642.80
             ========    =======     ========
     TOT  $ 33744.00    37553.28  -   3809.28
     AVG  $  4218.00  $  4694.16  -    476.16
            PRESS 'C' TO CONTINUE
```

Figure 5 Summary Table

It is now apparent that you have expenditures averaging $476.16 beyond the planned amounts. January's and April's excesses contributed to this situation. To identify the major over-budget items in January, press the "C" key to return to the Month Menu. Press the "X" key to return to the Presentation Menu. After the Presentation Menu appears, ask for the single month presentation of Expenses by pressing th "H" key. The Months Menu reappears (Figure 3) with the question, "WHICH MONTH? (A-L) or 'X' TO EXIT". Press A for January. The following table appears:

```
                EXPENSE FOR JAN
        CATEGORY          ACTUAL        BUDGET
        ---------------------------------------------
     (A) Automotive    $  2441.99   $     120.00
     (B) Gas/Oil       $    31.09   $     100.00
     (C) Business      $      .00   $      27.00
     (D) Clothes       $    21.19   $      67.00
     (E) Utilities     $   115.62   $     124.00
     (F) Pleasure      $   250.22   $     215.00
     (G) Food          $   190.13   $     360.00
     (H) Home Impr.    $   653.49   $     460.00
     (I) Taxes         $   627.95   $     970.00
     (J) Insurances    $   121.05   $     125.00
     (K) Mortgage      $  1410.00   $    1414.00
     (L) Misc.         $    35.41   $     150.00
     (M) Medical       $      .00   $      86.00
                       ===========   ==========
        JAN TOTALS     $  5898.14   $    4218.00
           PRESS 'C' TO CONTINUE
```

Figure 6 Single Month Presentation

It should be apparent after scanning this presentation that the major over-budget
expenditure is in the Automotive category. At this point we can do several things.

(1) We can change the budgeted amount for this category in the month, or (2) we can
check to see if this is a trend throughout the rest of the year.

We choose to see the trend more clearly by pressing "C" to return to the Month Menu, and
then "X" to return to the Presentation Menu. There we choose Option F-SINGLE CATEGORY
EXPENSE. The Category Menu appears with a prompt asking which category to display.

```
                EXPENSE CATEGORIES

             (A) Automotive
             (B) Gas/Oil
             (C) Business
             (D) Clothes
             (E) Utilities
             (F) Pleasure
             (G) Food
             (H) Home Impr.
             (I) Taxes
             (J) Insurance
             (K) Mortgage
             (L) Misc.
             (M) Medical

    WHICH FOR REVIEW?(A-M) OR 'X' TO EXIT
```

Figure 7 - Category Menu

Pressing "A" causes the Month menu to reappear requesting the range of months to review.
Remembering September is only partly full, we choose January to August to review. The
following summary table now appears:

```
                    AUTOMOTIVE
      MON   BUDGET   -   ACTUAL   =  VARIANCES
      ---   ------       ------      ---------
      JAN  $ 120.00  $  2441.99   -   2321.99
      FEB  $ 120.00  $   125.18   -      5.18
      MAR  $ 120.00  $      .00   +    120.00
      APR  $ 120.00  $   487.47   -    367.47
      MAY  $ 120.00  $      .00   +    120.00
      JUN  $ 120.00  $   137.27   -     17.27
      JUL  $ 120.00  $    39.00   +     81.00
      AUG  $ 120.00  $   139.19   -     19.19
           =======      =======       =======
      TOT  $ 960.00  $  3370.10   -   2410.10
      AVG  $ 120.00  $   421.26   -    310.26
```

           PRESS 'C' TO CONTINUE

          Figure 8   Summary Table

From this summary table, it appears January's Automotive expenditures were unforseen
outlays. Based on that we can check the trend, without the January data clouding the
issue, by pressing "C" and choosing the range of months from February to August to get
the following display:

```
                  AUTOMOTIVE
      MON    BUDGET  -  ACTUAL  =  VARIANCES
      ---    ------     ------     ---------
      FEB  $ 120.00  $  125.18  -      5.18
      MAR  $ 120.00  $     .00  +    120.00
      APR  $ 120.00  $  487.47  -    367.47
      MAY  $ 120.00  $     .00  +    120.00
      JUN  $ 120.00  $  137.27  -     17.27
      JUL  $ 120.00  $   39.00  +     81.00
      AUG  $ 120.00  $  139.19  -     19.19
           ======     ======     ========
      TOT  $ 840.00  $  928.11  -     88.11
      AVG  $ 120.00  $  132.59  -     12.59
```

           PRESS 'C' TO CONTINUE

          Figure 9 - Summary Table

With January removed, the budgeted amount for automotive expenses is $12.59 per month too low. We can change the budgeted amount for each month for this category, one month at a time,

    (1) by using Option B-CHANGE ENTRIES of the Main Menu, or
    (2) by using Option D-SETUP BUDGET of the Main Menu.

The more financially sound decision is to retain the budgeted amounts and plan to spend less on transportation.

You've now gone through a sample session and are ready to embark on your own financial planning. Refer to this sample session as you start using FAMILY BUDGET for your own analysis.

USING FAMILY BUDGET

INTRODUCTION

Using the sample session points out a number of features about FAMILY BUDGET. You review already existing budgets with Option A (REVIEW BUDGETS) of the main menu. You change budgeted amounts for a category with OPTION-B CHANGE ENTRIES. By choosing Option E-LEAVE PROGRAM, the program records any changes on your diskette. You can print any budget from the Presentation Menu by choosing Option C-PRINT BUDGETS.

The more months of entries you have on FAMILY CASH FLOW, the more meaningful the information is when presented by FAMILY BUDGET. Enter at least two complete months of information in FAMILY CASH FLOW before setting up your budget. Now we'll review each of the Main Menu options.

OPTION A-REVIEW BUDGETS

Use this function to display the Presentation Menu (Figure 2). A prompt appears below the menu that asks:

    REVIEW WHICH PRESENTATION?(A-H)
    PRESS 'X' TO CHANGE FUNCTION

After you select your presentation, the months menu displays. You can now choose to see any of the eight budgets for any or all months.

OPTION B-CHANGE ENTRIES

Use this function to change entries in any month for any budget. Selection of this function causes the Presentation Menu (Figure 2) to display with a prompt

    CHANGE WHICH PRESENTATION?(A-H)
    PRESS 'X' TO CHANGE FUNCTION

Once you decide on the presentation, the months menu appears. Choose the desired month(s) and you'll see the appropriate budget with prompts guiding you through the editing process.

OPTION C-PRINT BUDGETS

Use this option to print your choice of budgets. The program tests to see if the printer and interface module, if applicable, are on. The Presentation Menu appears with the prompt

    PRINT WHICH PRESENTATION?(A-H)
    PRESS 'X' TO CHANGE FUNCTION

After you select your presentatin, the months menu displays. Choose the desired month(s) by pressing the corresponding letters and the appropriate budget appears with a prompt

    PRESS 'C' KEY TO CONTINUE

You stay in the PRINT OPTION until you press the "X" key to return to the main menu.

OPTION D-SETUP BUDGETS

Use this option for the creation of your budgets. The program requests you to load the
FAMILY CASH FLOW diskette into the disk drive. All the data is read and you're asked to
put the FAMILY BUDGET diskette back into the disk drive. The data is written to FAMILY
BUDGET files and the program file called SETUP loads into the computer.

You now create your budget.

Upon entering the SETUP program, you see data files loading and then animations
indicating that some number crunching is occurring. The question,

ARE INCOME CATEGORY AMOUNTS THE SAME FROM MONTH TO MONTH? Y/N

appears. Pressing the "Y" key tells the program to fill in the rest of the year after
you've filled in January. It also presents you with "Average Category Amounts" from
FAMILY CASH FLOW to aid in setting up January. If you choose "N", you fill each category
of each month and your "Actual Category Amounts" display.

We'll select a "Y" for the first budget setup. The following budget displays.

```
             INCOME BUDGET FOR JAN

CATEGORY     AVG ACTUAL    BUDGET
-----------------------------------------
Paychecks    $ 3854.38  $3650.00
Interests    $  128.38
Dividends    $  123.44
Cash         $  252.28
Misc.Income  $  404.61
=========================================
JAN  TOTAL   $ 4763.09

      IS THIS ENTRY CORRECT?Y/N

    Figure 10   Budget Income Entry Table
```

You see $3650.00 entered as the budgeted amount for the "Paychecks" category. This
amount comes from the FAMILY CASH FLOW information. The question, IS THIS ENTRY
CORRECT?Y/N, refers to this amount. A "Y" key press causes the next amount to appear
under the BUDGET column in the Interests category with the same question below. If you
answer "N", a black rectangle replaces the amount and the prompt, PRESS RETURN AFTER
ENTRY, appears. Fill in the new amount and press the RETURN key. The question, IS THIS
ENTRY CORRECT?Y/N, reappears. Pressing the "N" key causes the rectangle to display
again. Pressing the "Y" key causes the program to proceed to the next category. After you
enter all the budget income category amounts, Figure 12 looks like:

INCOME BUDGET FOR JAN

```
CATEGORY    AVG  ACTUAL   BUDGET
-------------------------------------
Paychecks     $ 3854.38  $3650.00
Interests     $  128.38  $ 100.00
Dividends     $  123.44  $ 100.00
Cash          $  252.28  $  50.00
Misc.Income   $  404.61  $ 340.00
=================================
JAN  TOTAL    $ 4763.09  $4240.00
```

IS ALL CORRECT Y OR N

Figure 11 Figure 10's Completed Table for Jan. Setup

Answering the question with "N" causes the entire process to start over. Pressing the "Y" key causes the question,

ARE EXPENSE CATEGORY AMOUNTS THE SAME FROM MONTH TO MONTH?Y/N

to appear. This time we'll answer "N" and see the following table:

INCOME BUDGET IN JAN IS $ 4240.00

EXPENSE BUDGET FOR JAN

```
CATEGORY        ACTUAL    BUDGET
-------------------------------------
Automotive  $ 2441.99  $120.00
Gas/Oil     $   31.09
Business    $     .00
Clothes     $   21.19
Utilities   $  115.62
Pleasure    $  250.22
Food        $  190.13
Home Impr.  $  653.49
Taxes       $  627.95
Insurances  $  121.05
Mortgage    $ 1410.00
Misc.       $   35.41
Medical     $     .00
=================================
JAN  Total $ 4694.75
```

IS THIS ENTRY CORRECT?Y/N

Figure 12 Budget Expense Entry Table

If you don't agree with the budgeted amount, press "N" and the black rectangle appears for changes. When you press the RETURN key, the program again checks with you to see if this entry is correct. If you press "Y", the question,

IS THIS AMOUNT THE SAME FOR THE REST OF THE YEAR?Y/N

appears. If you press "N" the program proceeds to the next entry. Pressing "Y" causes the program to fill in that amount for the rest of the year and then proceed to the next entry. Repeat these steps until you fill all the category amounts. Then the question,

IS ALL CORRECT? Y OR N

appears. Pressing the "N" key causes the entire procedure to repeat. A "Y" causes February to display.

In Figure 12 the total amount of budgeted income for January is brought forward for reference. Also, you don't see averaged amounts as the actual amounts. These amounts become averaged amounts when you either encounter a month with no entries or a month with the lowest amount. When you do run into an averaged amount, the inverse video flag AVG appears next to the word ACTUAL in the heading.

When you complete all the entries, the Budget Summary Table appears. You can now examine the difference between your income and expenses for each month.

```
                    INCOMES BUDGET
                         vs
                    EXPENSE BUDGET

    MON      INCOME  - EXPENSE = VARIANCES
    ---      ------    -------   ---------
    JAN   $ 4240.00  $ 4218.00  +    22.00
    FEB   $ 4240.00  $ 4218.00  +    22.00
    MAR   $ 4240.00  $ 4218.00  +    22.00
    APR   $ 4240.00  $ 4218.00  +    22.00
    MAY   $ 4240.00  $ 4218.00  +    22.00
    JUN   $ 4240.00  $ 4218.00  +    22.00
    JUL   $ 4240.00  $ 4218.00  +    22.00
    AUG   $ 4240.00  $ 4218.00  +    22.00
    SEP   $ 4240.00  $ 4218.00  +    22.00
    OCT   $ 4240.00  $ 4218.00  +    22.00
    NOV   $ 4240.00  $ 4218.00  +    22.00
    DEC   $ 4240.00  $ 4218.00  +    22.00
          =========  =========     ========
    TOT   $50880.00  $50616.00      264.00
    AVG   $ 4240.00  $ 4218.00  +    22.00


              IS EVERYTHING OK? Y/N

         Figure 13   Budget Summary Table
```

If you answer "Y", the SETUP program writes all the information you've added or revised to the diskette files. Pressing the "N" key causes the following question to appear,

WANT TO CHANGE INCOME AMOUNTS?Y/N

Pressing the "N" key causes letters A-L to appear, vertically replacing the "$" under EXPENSE. Then the question,

WHICH MONTH(A-L) OR 'M' FOR ALL,

appears. To redo all entries, press the "M" key. For a single month, press the letter associated with that month and the BUDGET EXPENSE TABLE (Figure 12) reappears. After completing the entries, the Budget Summary Table reappears (Figure 13). You can adjust any budgeted amount in any month under incomes or expenses until you have what you want.

OPTION E-LEAVE PROGRAM

Use Option E to exit from FAMILY BUDGET. You'll see the following screen.

```
            I'M STORING THE
            CHANGED 'BUDGET'
            INCOMES        EXPENSE
            JAN            JAN
            FEB            FEB
            MAR            MAR
            APR            APR
            MAY            MAY
            JUN            JUN
            JUL            JUL
            AUG            AUG
            SEP            SEP
            OCT            OCT
            NOV            NOV
            DEC            DEC
```

This option is completed when you see the READY prompt.

NORMAL OPERATION

Once you've established a set of budgets, you'll want to review and/or revise them at the end of each month's entries on your FAMILY CASH FLOW diskette. To do this, follow the instructions in the SETTING UP section of this manual through step 6 (see page two). Then answer the questions as they appear. By answering

DO YOU HAVE NEW DATA

with a "Y", the data on your FAMILY CASH FLOW diskette, including changes, additions, and deletions, loads automatically onto your FAMILY BUDGET diskette. Remember, you'll be inserting both your FAMILY BUDGET and FAMILY CASH FLOW diskettes in order to have the information recorded.

SETUP OVERVIEW

The SETUP program uses four matrices and four arrays. You have two matrices and two arrays assigned to budget and The others are assigned to incomes. Figure 14 is the expense structure and Figure 15 is the income structure.

EXPENSE STRUCTURE

MONTHS

CATEGORY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
Automotive	(1,1)	(2,1)	(3,1)	(4,1)	(5,1)	(6,1)	(7,1)	(8,1)	(9,1)	(10,1)	(11,1)	(12,1)
Gas/Oil	(1,2)	(2,2)	(3,2)	(4,2)	(5,2)	(6,2)	(7,2)	(8,2)	(9,2)	(10,2)	(11,2)	(12,2)
Business	(1,3)	(2,3)	(3,3)	(4,3)	(5,3)	(6,3)	(7,3)	(8,3)	(9,3)	(10,3)	(11,3)	(12,3)

:

MISC.	(1,12)	(2,12)	(3,12)	(4,12)	(5,12)	(6,12)	(7,12)	(8,12)	(9,12)	(10,12)	(11,12)	(12,12)
MEDIC.	(1,13)	(2,13)	(3,13)	(4,13)	(5,13)	(6,13)	(7,13)	(8,13)	(9,13)	(10,13)	(11,13)	(12,13)

SUBTOTALS	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)

EXPENSE KEY-Labels used in program
Actual matrix name - EA(X,Y)
Actual array name - EAS(X)
Budget matrix name - EB(X,Y)
Budget array name - EBS(X)

Figure 14 Expense Structure

INCOME STRUCTURE

MONTHS

CATEGORY	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
Paychecks	(1,1)	(2,1)	(3,1)	(4,1)	(5,1)	(6,1)	(7,1)	(8,1)	(9,1)	(10,1)	(11,1)	(12,1)
Interests	(1,2)	(2,2)	(3,2)	(4,2)	(5,2)	(6,2)	(7,2)	(8,2)	(9,2)	(10,2)	(11,2)	(12,2)
Dividends	(1,3)	(2,3)	(3,3)	(4,3)	(5,3)	(6,3)	(7,3)	(8,3)	(9,3)	(10,3)	(11,3)	(12,3)
Cash	(1,4)	(2,4)	(3,4)	(4,4)	(5,4)	(6,4)	(7,4)	(8,4)	(9,4)	(10,4)	(11,4)	(12,4)
Misc.	(1,5)	(2,5)	(3,5)	(4,5)	(5,5)	(6,5)	(7,5)	(8,5)	(9,5)	(10,5)	(11,5)	(12,5)

SUBTOTALS	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)

INCOME KEY-Labels used in program
Actual matrix name - IA(X,Y)
Actual array name - IAS(X)
Budget matrix name - IB(X,Y)
Budget array name - IES(X)

Figure 15 Income Structure

The object of the Setup program is to let you fill in the budget information while using the actual data as a guide.

FAMILY CASH FLOW fills each of the actual matrix positions with data. In months having no available data, SETUP arranges your actual months' totals in descending order, removes the months without data and the lowest month from the list. The balance of the months becomes the basis for calculating the average amounts per category.

You fill in the budget matrix positions. The program takes care of the totals.

THE PROGRAMS OF FAMILY BUDGET

DATASTAT-Checks for the existence of the necessary files, gathers data from FAMILY CASH FLOW, checks for the proper diskette, and runs the proper program after examining the INITIFLAG file. If you're using two disk drives for FAMILY CASH FLOW, change line #12 of the DATASTAT program from G$="D:BUDGET." to read G$="D2:BUDGET.".

BUDGET-Main program for reviewing and printing budgets.

INITIAL-Referred to in the documentation as "SETUP".This program does all the initialization and filling in of the matrices and arrays associated with building the budgets.

DOS.SYS.-ATARI'S Disk Operating System (DOS 2.0).

DUP.SYS.-The other portion of DOS.

AUTORUN.SYS-Automatically loads "MUD" into computer memory.

MUD-The title screen that displays as "DATASTAT" loads.

THE FILES OF FAMILY BUDGET

INITFLAG-Tells DATASTAT which programs to run.

CATINC-Category names for incomes.

CATEXP-Category names for expenses.

BUDINC-Income budget amounts.

BUDEXP Expense budget amounts.

ACTINC-Actual income category amounts taken from FAMILY CASH FLOW by "DATASTAT".

ACTEXP-Actual expense category amounts taken from FAMILY CASH FLOW by "DATASTAT".

NOTE: All the programs are locked. FAMILY BUDGET handles all file manipulations. These files are open and should not be changed unless you've made a backup copy.

EXTRA INFORMATION

The following may be of some help with your programming.

    (1)Poke 752,X – X set to "1" turns off cursor
    (2)Poke 82,X – "X", an integer from 0 to 39, moves the left margin.
    (3)Poke 83,X – "X", an integer from 39 to 0, moves the right margin.
    (4)Poke 702,X – "X" set to "64" forces upper case letters.
    (5)Poke 694,X – "X" set to"0" forces normal video mode.
    (6)Poke 53774,64:Poke 16,64 – Disables the BREAK key.
    (7)The program accomplishes inverse presentatins by turning up the luminosity on the
border and the background and turning down the luminosity on the characters with all
three set to the same color.(e.g., SE.2,X,10:SE.1, X,0:SE.4,X,10.))

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1. Name and APX number of program _____

2. If you have problems using the program, please describe them here.

_____

_____

_____

3. What do you especially like about this program?

_____

_____

_____

4. What do you think the program's weaknesses are?

_____

_____

_____

5. How can the catalog description be more accurate and/or comprehensive?

_____

_____

6. On a scale of 1 to 10, 1 being "poor" and 10 being "excellent", please rate the following aspects of this program?

_____ Easy to use
_____ User-oriented (e.g., menus, prompts, clear language)
_____ Enjoyable
_____ Self-instructive
_____ Useful (non-game software)
_____ Imaginative graphics and sound

7. Describe any technical errors you found in the user instructions (please give page numbers).

8. What did you especially like about the user instructions?

_____

_____

9. What revisions or additions would improve these instructions?

_____

_____

10. On a scale of 1 to 10, 1 representing "poor" and 10 representing "excellent", how would you rate the user instructions and why?

_____

_____

11. Other comments about the software or user instructions:

_____

_____

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