CodeWriter Corporation

Apple/Franklin

Adventure Writer ™

A CodeWriter™ Program

AdventureWriter™

for the Apple II, II+, IIe, IIc and
Franklin Ace 1000 computers

CΩdeWriter™ Corporation

from CodeWriter Corporation in association with Gilsoft

written by Graeme Yeandle

Acknowledgments

Technical

James Liu   Alan Citterman
Steven Rutherford   Warren Shore
Mark Tanaka   Paul Helgeson
Christopher Rider   Kevin Rutherford
John Blume

A special thanks to Graeme Yeandle and the master adventurers at Gilsoft

Documentation

Karen Hunter
Alan Citterman
Steven Rutherford
Paul Helgeson
Mark Tanaka
David Ray

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The AdventureWriter manual consists of 3 principal sections:

introductory section:

This section gives a brief overview of what AdventureWriter is and what it does. Also included is a part called "Standard Procedure", a quick outline of the procedure you will use every time you design an adventure. You will find this outline to be particularly helpful if you are creating an elaborate adventure and forget just where you are within the creation process and what needs to be done next.

tutorial section:

The tutorial provides a sample adventure for you to create by following step-by-step procedures. There are three phases, each expanding upon the development of previous ones to make your adventure more interesting. The procedures used in Phase II and III will be similar to those of Phase I. Be sure to read Chapter IV, "Getting Started", for information important to the success of your program! Symbols accompany each command to assist you. An explanation of these symbols is found in the next part of this chapter.

reference section:

This section expands the program capabilities learned in the tutorial with a detailed description of AdventureWriter. We recommend that you read this section after you have worked through the tutorial and before you create your own adventure program. Included in this section are tables and explanations of the Interpreter, the Editor, and the Database. You will also find information on adventure sounds, adventure capacities and limitations, and diagnostic flags.

THE RESCUE

We have also included a completed adventure entitled **Rescue** for you to experiment with and try to solve. This adventure was created from the AdventureWriter program. To play this adventure, select the '**p**' option from the first menu. The object of the adventure is to rescue the princess and return her to the throne. Enjoy!

KEY TO SYMBOLS

keyboard indicates that you are to type a word, command, or sentence involving multiple keystrokes rather than a single keystroke.

single key prompts a single entry: one letter, symbol, or number.

function key designates that a particular function key is to be struck: RETURN, SHIFT, CTRL, etc.

paired symbols indicate that a single keystroke is to be followed by striking a function key, usually the RETURN key.

disk signals a disk change. You will be required to remove the current disk from the drive and insert another one.

screen alerts you to what will appear on your computer screen following a particular action.

INIT HELLO **underlined phrases** present a command or entry EXACTLY as you are to type it. These phrases must be typed in uppercase (capital letters) only.

Type in name of file

shaded box displays a partial screen. Sometimes only one word or line changes on a screen after you have made an entry. Rather than presenting the entire screen again and again, we will present only that significant part of information that has changed.

A WORD ABOUT SOFTWARE PROTECTION

CodeWriter Corporation has strong ideas about protecting software. We feel that both the software developer and the software customer have rights which must be protected. The developer must be protected from "unauthorized use" of his work. After all, if the marketplace does not reward the developer for his work, the work will not be produced, not be supported and not be improved.

But workable software protection cannot exclude the customer's rights. The paying customer makes all new software possible. Thus, the customer should be able to use the software freely and with confidence. A "back-up" copy of your **Apple/Franklin** AdventureWriter disk is available at a small cost (see the coupon included with your system). Also, a one year guarantee is part of your system cost. If your AdventureWriter disk ever fails to operate for any reason during this period, we'll replace it at no charge. Once your purchase is registered, you'll be notified of our toll-free help line for any questions you might have concerning AdventureWriter.

Have fun creating your own adventures with AdventureWriter. We have developed it to be the best!

DEFINITION: What is AdventureWriter?

AdventureWriter is a CodeWriter <u>program creation system</u>
which allows a person with no programming experience to create
adventures in Assembly language.

DESCRIPTION: What is an Adventure?

An **adventure** can be described as a computerized version of the
game Dungeons and Dragons. In Dungeons and Dragons™ one person
is nominated as the dungeon master, and he invents a dungeon for
other players to explore to try to retrieve hidden treasures, usually
protected by monsters of various shapes and sizes. Each player
states his proposed actions to the dungeon master who decides on
the outcome, sometimes with the help of dice to introduce a random
element.

With an adventure, the computer takes the place of the dungeon
master and the player or players explore a predefined dungeon.
Most adventures will contain a **vocabulary** of words which the
computer "understands", a variety of **locations** in which a player
may wander around, and **objects** which have to be used in the
correct way to enable the adventure to be solved. The computer
will describe a situation to the player and invite him to decide on a
course of **action**. The computer then tells the player the result of
his action.

Everyone who plays an adventure has the problem of making the
computer understand his **commands**. The computer will have only a
limited vocabulary of perhaps a few hundred words and finding the
right words can sometimes be a problem. For example, if you are
playing Dungeons and Dragons™ and the dungeon master tells you
"There is a lamp nearby", then if you decide to "Pick up the light",
the dungeon master should know what you mean. If the same
situation occurs when playing an adventure, the computer may
understand "Get lamp" but may not know that "light" is **synonomous**
with "lamp" or that "Pick up" means the same thing as "Get" on this

occasion. Even so, most players will very quickly get the knack of finding the correct words. It should be noted, however, that it is up to you, the adventure designer, to decide which words are to be included in the computer's vocabulary.

HOW ADVENTUREWRITER WORKS

The AdventureWriter system is made up of three parts :

- A **Database** which contains all the information relevant to an adventure such as object descriptions, locations, messages, and a variety of tables.

- A database **Editor** which enables data to be inserted, amended or deleted from the database.

- An **Interpreter** (this is the "Dungeon master") that uses the data in the database to control the adventure.

STANDARD DESIGN PROCEDURE

The procedure for designing an adventure may initially seem long and complex. Actually, the complexity is up to you and depends upon the kind of adventure you're developing. The procedures of inserting, altering, saving, etc. follow much the same pattern, and after the first several times become easy.

The principal challenge is to plot each ingredient and course of action methodically. Skipping a simple step could prove disastrous later in the program. For that reason we provide this outline as a quick reference to the steps in all their sequential tedium!

I. Preliminary Procedures (on paper)

A. Read the **entire** manual and work through the example adventure
B. Draw a map of your adventure including location numbers and directions
C. Make a list of the objects you want in your adventure
D. Make a list of the messages needed in your adventure
E. Make a list of all the words and their synonyms that you will use
F. Decide which flags to use and their purposes
G. Write down all the Vocabulary Action Table entries
    -Show conditions and actions
    -Make sure that you have entries with the same word value in the correct order

H. Write down all the Status Table entries
    -Show conditions and actions
    -Plan the order of the entries. The Editor will arrange them in ascending order of word value, assigned when inserted in the Vocabulary Text Table
    -Make additons to the Vocabulary Text Table as needed

II. Build Database (<u>save Database regularly</u>)

A. Enter Location Descriptions
B. Build Movement Table
C. Enter Object Descriptions
D. Enter Object Starting Locations
E. Enter Messages
F. Build Vocabulary (insert new words as needed)
G. Build Vocabulary Action Table
    -Test Adventure (make changes as needed)
H. Build Status Table
    -Test Adventure (make changes as needed)
J. Expand Adventure (if desired)
    -Test Adventure (make changes as needed)
I. Save Adventure
    -Test Adventure thoroughly
K. Have Fun Adventuring ! ! !

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SELLING YOUR CREATED ADVENTURES

If you intend to sell your adventures, test them thoroughly with the help of as many people as possible.

In particular:

A) Check the spelling of every word

B) Check to see that the score does not exceed 100%

C) Try to move in every direction from every location

D) Try to GET, DROP, WEAR and REMOVE each object

E) It should be possible to solve the adventure each time it is played, provided the correct commands are used. For example: poison gas which has a 1% chance of appearing and killing the player should be avoided unless you also provide a gas mask.

A great deal of time has been spent testing AdventureWriter and we believe that you should have no trouble creating hundreds of bug-free adventures. If you have any problems or questions, please contact us at CodeWriter and we'll be glad to give you a helping hand.

Thank you for your interest in the CodeWriter series of programs. Good luck with your Adventuring !

If you do intend to sell an adventure written with AdventureWriter, we require that you mention within the program that it was designed with CodeWriter Corporation's AdventureWriter Program.

We will be happy to consider marketing adventures you have written. If you are interested, call CodeWriter at (312) 470-0700 and ask about the Author's Program. Adventures must be accompanied by a completed submission form, a detailed map of all locations, and a list of all objects and vocabulary used.

<div align="right">

CodeWriter Corp.
7847 N. Caldwell
Niles, IL 60648

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Read this chapter thoroughly before beginning Phase I. It contains information needed to design and run an adventure program successfully.

The objective of our sample adventure "Jewel Thief" is to find and return the jewel to the living room in less than 21 turns.

EQUIPMENT AND MATERIALS NEEDED

- Apple][,][+,][e,][c or
- Franklin Ace 1000 Computer
- 1 Disk Drive
- Monitor
- Printer (optional)
- Diskettes:
    - **AdventureWriter** Disk
    - Blank, formatted disk to contain adventure program

PRELIMINARY PROCEDURES

You will be creating a sample adventure program in this tutorial as a means of learning how to use the AdventureWriter Program. Before you begin the actual design process, you must have a blank, **formatted diskette** to contain the new program. The following instructions explain the procedure for fomatting a disk.

1) **BOOT** the System Master disk which came with the computer. With many computers, placing the disk in the drive and turning on the power will boot the disk.

2) **REMOVE** that disk and **INSERT** a disk to be formatted into the disk drive.

3) **TYPE** FP and **PRESS** RETURN

4) **TYPE** INIT HELLO and **PRESS** RETURN
   Formatting will take about 30 seconds . . .

This concludes formatting procedures.

Loading Procedure:

BOOT the AdventureWriter Disk

ENTER A to load AdventureWriter

You will see the credits, then:

PRESS any key to call up the Main Menu.

REMOVE AdventureWriter Disk and **INSERT** your application disk into the drive. No further disk swaps are required.

USING ADVENTUREWRITER

The Main Menu

When AdventureWriter is loaded, you will be presented with the **Editor's Main Menu** which gives you a number of options. Some of these options (such as "Memory available") will perform a function and return you to the Main Menu while others (such as "Location text") will give you a sub-menu. The "Return to BASIC" option is an exception, as it executes a command which resets the computer.

The Input Routine

AdventureWriter uses only uppercase characters and has its own screen editor. When you type from the keyboard, the characters are placed into a large storage area and the contents of that area are then printed on the screen. You may enter flashing mode by pressing (ctrl-f) (CONTROL and F simultaneously), inverse mode by pressing (ctrl-i), and normal mode by pressing (ctrl-n).

CURSOR LEFT (or ctrl-h) and **CURSOR RIGHT** (or ctrl-u) are used to move the cursor through the storage area. **CURSOR UP** (or ctrl-k) and **CURSOR DOWN** (or ctrl-j) will move the cursor up to 40 characters or to the end of the text, whichever comes first. **CTRL-C** will clear the entire keyboard storage area, while **CTRL-D** will delete a single character.

To **insert** characters, simply position the cursor at the appropriate place and type in the characters to be inserted. It is not possible to type over characters that are already present.

Whenever you press RETURN, the Editor checks your typing for correct **syntax**. If the Editor finds an invalid entry, it prints a "?" after the error as the cursor and allows you to correct the error. The only valid options on the Main Menu are **single letters** in the range **A** to **Q** and **+**. Try typing in the number "3" and pressing RETURN, then delete the "3" by pressing (ctrl-d) and type in "ABC" followed by RETURN. In each case a syntax error will be detected.

Memory Available

Let's now try one of the options on the Main Menu. If you clear the keyboard storage area (CTRL-C), and type the letter **O** for Memory available and press RETURN, you will get a display which tells you how many **bytes** are unused in the database.

SAVE, VERIFY & LOAD DATABASE

Save, verify, and **load** are three options on the Main Menu which allow the database to be saved or reloaded. In each case, the computer prompts you to "Type in name of file". When loading or verifying, the computer will search for a file with the name you specified. A failure to verify will be reported as an I/O ERROR. Disk users should note that filenames may not start with @: and that the disk error message is printed on the screen after every disk operation.

SETTING UP AN ADVENTURE

Phase I of the tutorial sets the stage for the entire adventure. The database you will create in this phase will be expanded in each successive phase. Consequently, you must methodically work through each step. If you wish to break part of the way through, please save the database so that you can continue later where you left off.

LOCATION DESCRIPTIONS

The **location** setting is the core for playing any adventure. It is also the foundation for designing an adventure. Once established, objects, commands, and other intricacies are added. It is crucial that you **first** design your adventure locations on paper ! This map is an important reference for creating the rest of your adventure.

For the mini adventure you will create, we already provide you with a map:

MAP OF SAMPLE ADVENTURE
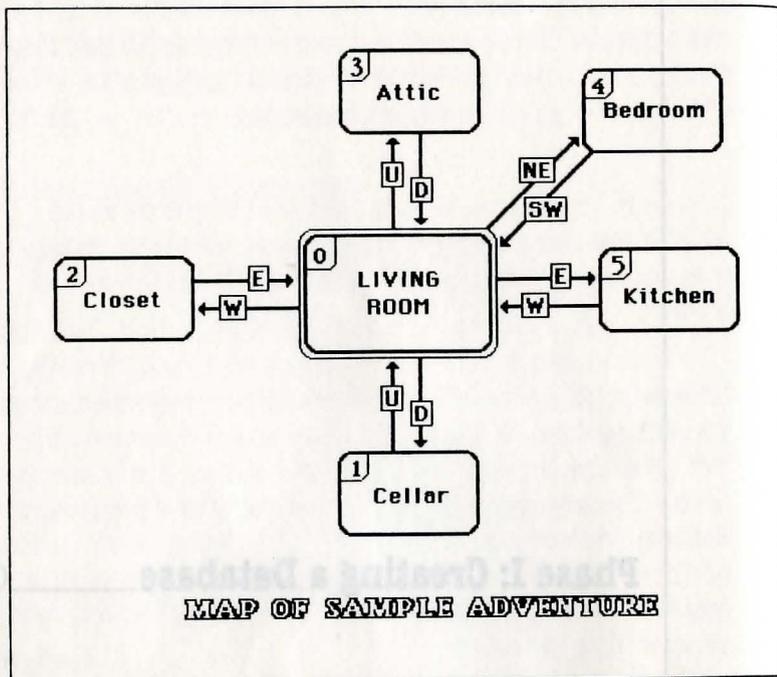
The objective of the adventure is to find the jewel and return with it to the Living Room. The map shows all of the locations in the adventure and how they are inter-connected. Each location has been given a location number, shown in the corner.

ENTER C and **PRESS** RETURN

```
        LOCATION   DESCRIPTIONS

   ** Format **        ** Description **

   I                      Insert desc

   A   loc #             Alter desc

   P   loc # optional    Print on Screen

   L   loc # optional    List to Printer

   Z                     Return to Main menu
```

Right column

ENTER P and **PRESS** RETURN

```
Location 0

I am in a prison cell.  The walls are
painted Black and Yellow and are
perfectly smooth.  The only way out is
through a trapdoor in the ceiling which
is 30 feet high.  There is a bright
light in one corner




Press any key to continue
```

You will see that a default description of location 0 already exists. Notice that the location names are flashing and the directions are in reverse video text. We suggest that you follow this format in order to make your adventure easier to follow and a bit more exciting. Because a description for location 0 is already present, we must alter it to describe location 0 of our adventure (the living room).

ENTER any key

TYPE: A 0 and **PRESS** RETURN

```
Location 0




I am in a prison cell.  The walls are
painted Black and Yellow and are
perfectly smooth.  The only way out is
through a trapdoor in the ceiling which
is 30 feet high.  There is a bright
light in one corner ▮
```

PRESS <u>CTRL-C</u> (Depress Control and C keys simultaneously)

You will type the following paragraph using the CONTROL key in combination with F, I and N to highlight important words. (ctrl-f) indicates that you will simultaneously press CONTROL and F. Do not type the brackets () or the information inside. <u>Underlined words</u> represent words that flash (ctrl-f), and **bold** words represent words in inverse (ctrl-i).

TYPE   I am in a (ctrl-f) <u>living room</u> (ctrl-n) . Stairs lead (ctrl-i) **Up** (ctrl-n) to the (ctrl-f) <u>attic</u> (ctrl-n) and (ctrl-i) **Down** (ctrl-n) to the (ctrl-f) <u>cellar</u> (ctrl-n) . A (ctrl-f) <u>closet</u> (ctrl-n) lies to the (ctrl-i) **West** (ctrl-n) . The (ctrl-f) <u>kitchen</u> (ctrl-n) is to the (ctrl-i) **East** (ctrl-n) and a (ctrl-f) <u>bedroom</u> (ctrl-n) is to the (ctrl-i) **NE** (ctrl-n) .

PRESS <u>RETURN</u>

Location   0 Altered

Press any key to continue

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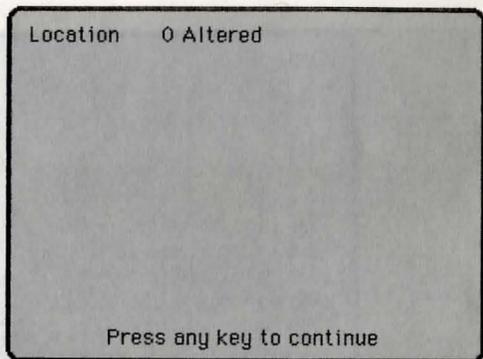
ENTER any key

Since there is no description for location 1 present, it must be inserted. After it is inserted it can be altered if you desire.

ENTER <u>I</u> and **PRESS** <u>RETURN</u>

Location   1
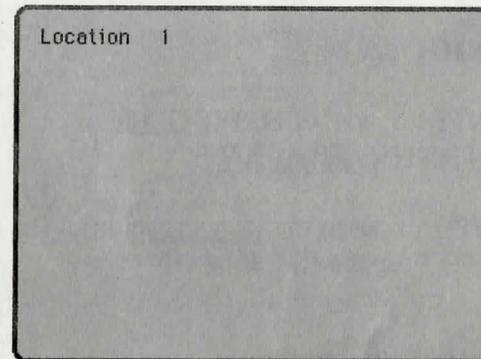
You will continue to use the control key in conjunction with F, I or N. To shorten our instructions we will include only the specific key, but you will use both keys.

TYPE   I am in a damp (f) <u>cellar</u> (n) . Stairs lead (i) **Up** (n) to the (f) <u>living room</u> (n) .

PRESS <u>RETURN</u>
ENTER any key

Descriptions for the remaining locations must be inserted using the same format as location 1.

ENTER <u>I</u> and **PRESS** <u>RETURN</u>
ON SCREEN: location 2

TYPE   I am in the (f) <u>closet</u> (n) . The (f) <u>living room</u> (n) is directly to the (i) **East** (n)

PRESS <u>RETURN</u>
ENTER any key

I am in a damp   <u>cellar</u> . Stairs lead **Up** to the <u>living room</u> .

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ENTER I and **PRESS** RETURN
ON SCREEN: `location 3`
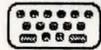
TYPE I am in a dusty [f] <u>attic</u> (n) . Stairs lead [i] **Down** (n)
to the [f] <u>living room</u> (n) .

PRESS RETURN

ENTER any key

ENTER I and **PRESS** RETURN .
ON SCREEN: `location 4`

TYPE I am in the [f] <u>bedroom</u> (n) . The [f] <u>living room</u> (n) is
to the [i] **SW** (n) .

PRESS RETURN

ENTER any key

ENTER I and **PRESS** RETURN
ON SCREEN: `location 5`

TYPE I am in the [f] <u>kitchen</u> (n) . The [f] <u>living room</u> (n) is
directly to the [i] **West** (n) .

PRESS RETURN
ENTER any key

At this point you should have entered descriptions for
locations 0-5. To see the location descriptions on screen:

ENTER P and **PRESS** RETURN

To send the location descriptions to your printer:
ENTER L and **PRESS** RETURN

To return to the main menu:
ENTER Z and **PRESS** RETURN

AdventureWriter Main Menu

```
A ... Vocabulary text
B ... Message text
C ... Location descriptions
D ... Movement table
E ... Object descriptions
F ... Object starting locations
G ... Vocabulary action table
H ... Status table
I ... Save a data base
J ... Verify a data base
K ... Load a data base
L ... Test this adventure
M ... Save this adventure
N ... Verify this adventure
O ... Memory available
P ... # of portable objects
Q ... AdventureWriter messages
+ ... Return to Basic
```

Select an Option and Press **RETURN**

THE MOVEMENT TABLE

The next step in creating our adventure is to interconnect the
locations we have just described. This is done by means of the
Movement Table.

ENTER D from the main menu and **PRESS** RETURN

```
                    MOVEMENT  TABLE

        ** Format **              ** Description **

   A   [loc #]                    Alter an entry

   P   [loc #  optional]          Print on Screen

   L   [loc #  optional]          List to Printer

   Z                              Return to Main menu
```

You will see that movements can be <u>altered</u> but not inserted. This is because the Editor automatically inserts null entries in the movement table for every entry made in the Location Description Table.

ENTER P and press <u>RETURN</u>

```
Location   0
Location   1
Location   2
Location   3
Location   4
Location   5




        Press any key to continue
```

You can see that null entries for locations 0-5 are already present in the Movement Table.

ENTER any key

Refer to the map of our mini-adventure to see how the locations are interconnected. You will see the movements from location 0:

Down	goes to location 1	(cellar)
West	goes to location 2	(closet)
Up	goes to location 3	(attic)
NE	goes to location 4	(bedroom)
East	goes to location 5	(kitchen)

To enter these directions in the movement table:

TYPE: A 0 and **PRESS** <u>RETURN</u>

TYPE: D 1 W 2 U 3 NE 4 E 5

PRESS <u>RETURN</u>
ON SCREEN: location 0 altered

ENTER any key
Repeat this same procedure to alter the entries for locations 1-5.

TYPE: A 1 and **PRESS** <u>RETURN</u>
TYPE: U 0 and **PRESS** <u>RETURN</u>

ON SCREEN: location 1 altered
ENTER any key

TYPE: A 2 and **PRESS** <u>RETURN</u>
TYPE: E 0 and **PRESS** <u>RETURN</u>

ON SCREEN: location 2 altered
ENTER any key

TYPE: A 3 and **PRESS** <u>RETURN</u>
TYPE: D 0 and **PRESS** <u>RETURN</u>.

ON SCREEN: location 3 altered
ENTER any key

TYPE: A 4 and **PRESS** <u>RETURN</u>
TYPE: SW 0 and **PRESS** <u>RETURN</u>

ON SCREEN: location 4 altered
ENTER any key

TYPE: A 5 and **PRESS** <u>RETURN</u>
TYPE: W 0 and **PRESS** <u>RETURN</u>

ON SCREEN: location 5 altered
ENTER any key

To see all the entries you altered in the movement table:

ENTER P and **PRESS** <u>RETURN</u>

```
Location   0        D    to    1
                    W    to    2
                    U    to    3
                    NE   to    4
                    E    to    5
Location   1        U    to    0
Location   2        E    to    0
Location   3        D    to    0
Location   4        SW   to    0
Location   5        W    to    0

        Press any key to continue
```

ENTER any key

ENTER Z and **PRESS** <u>RETURN</u> to return to the Main menu

OBJECT DESCRIPTIONS

The next step in creating our small adventure is to describe the objects we want to be present in our adventure. **Object descriptions** are entered in exactly the same way as location descriptions. The objects we want to include in the first phase of our adventure are:

> An old hat
> A sparkling jewel
> A sharp knife
> A bottle of wine

To enter these descriptions, from the main menu:

ENTER <u>E</u> and **PRESS** <u>RETURN</u>

```
              OBJECT  DESCRIPTIONS

   ** Format **              ** Description **

   I                         Insert object desc
   A   obj *                 Alter object desc
   P   obj *  optional       Print on Screen
   L   obj *  optional       List to Printer
   Z                         Return to Main menu
```

As with the location descriptions, there is a <u>default</u> object description for object O. To see it:

ENTER <u>P</u> and **PRESS** <u>RETURN</u>

```
   Object    O
   A source of light.



                 Press any key to continue
```

Note: The Interpreter always considers **object O** to be a **source of light**. Object O's presence in a dark location will enable the adventurer to see. We will use object O later in phase 3 so don't alter it yet.

PRESS any key

To enter a description for object 1:

ENTER <u>I</u> and **PRESS** <u>RETURN</u>

We suggest that you make the object descriptions flash (as you did with the location descriptions) to make it easier for the player to read and follow the adventure.

TYPE (f) <u>An old hat</u> (n) and **PRESS** <u>RETURN</u>
ON SCREEN: Object 1 Inserted

PRESS any key, **ENTER** <u>I</u> and **PRESS** <u>RETURN</u>

TYPE (f) <u>A sparkling jewel</u> (n) and **PRESS** <u>RETURN</u>
ON SCREEN: Object 2 Inserted

PRESS any key, **ENTER** <u>I</u> and **PRESS** <u>RETURN</u>

TYPE (f) <u>A sharp knife</u> (n) and **PRESS** <u>RETURN</u>
ON SCREEN: Object 3 Inserted.

PRESS any key, **ENTER** <u>I</u> and **PRESS** <u>RETURN</u>

TYPE [f] <u>A bottle of wine</u> [n] and **PRESS** <u>RETURN</u>
ON SCREEN: `Object 4 Inserted.`
In this example we have made all of the object descriptions
flash. You can make any of the text flash, inverse or normal
after the descriptions are inserted by choosing the alter
option from the Object Descriptions Menu. Position the cursor
before the section of text that you wish to change and PRESS
the CONTROL key and F, I or N. Notice that all of the text
following the cursor changes. You may reposition the cursor
and press another combination to get exactly what you want.

OBJECT STARTING LOCATIONS

When you insert an object description the Editor automatically
inserts a start location of 252 "not created" in the Object
Starting Location Table. These starting locations must be
altered for our adventure. We want:

> The hat to start in the closet
> The jewel to start in the bedroom
> The knife to start in the kitchen
> The wine to start in the cellar

To do this from the Main menu:
ENTER <u>F</u> and **PRESS** <u>RETURN</u>

```
          OBJECT STARTING LOCATIONS

  ** Format **          ** Description **

  A  obj #  loc #        Alter starting loc
                         of an object.
                         Special location #'s
                                252=Not created
                                253=Worn
                                254=Carried

  P                      Print on Screen
  L                      List to Printer
  Z                      Return to Main menu
```

ENTER <u>P</u> and **PRESS** <u>RETURN</u>

```
     Object  0  not created
     Object  1  not created
     Object  2  not created
     Object  3  not created
     Object  4  not created




              Press any key to continue
```
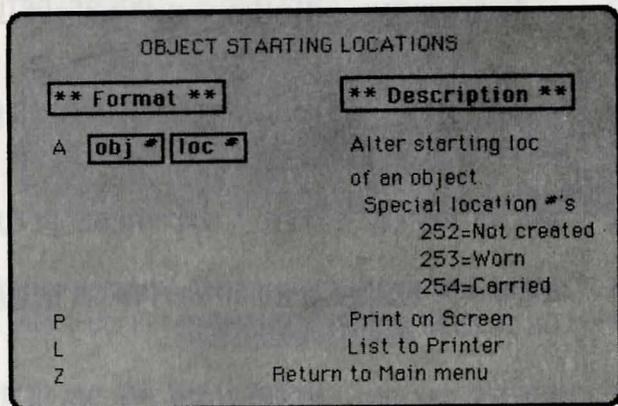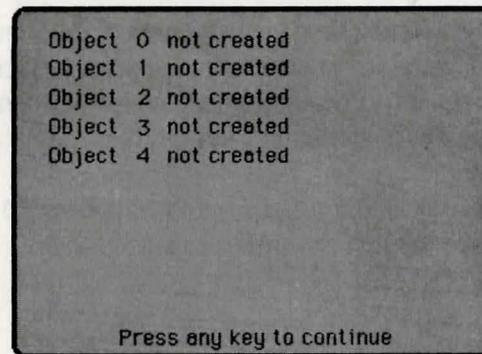
PRESS any key

To alter Object starting locations 1-4:
TYPE <u>A 1 2</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `Altered.`
PRESS any key, **TYPE** <u>A 2 4</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `Altered`
PRESS any key, **TYPE** <u>A 3 5</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `Altered`
PRESS any key, **TYPE** <u>A 4 1</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `Altered`
PRESS any key

To see the alterations you made:

ENTER <u>P</u> and **PRESS** <u>RETURN</u>

```
     Object  0  not created
     Object  1  at location  2
     Object  2  at location  4
     Object  3  at location  5
     Object  4  at location  1




              Press any key to continue
```
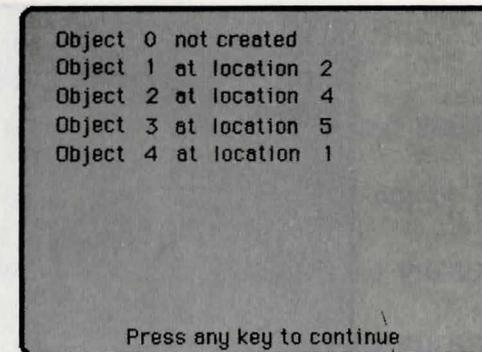
Your Object Starting Locations should look exactly like the ones
above. If they differ, alter them.
To return to the Main Menu:
PRESS any key, **ENTER** <u>Z</u> and **PRESS** <u>RETURN</u>

VOCABULARY TEXT ADDITIONS

The **vocabulary** contains an entry for every word that the computer is to understand. Each entry consists of up to **four** letters followed by a number (or word value). Entries with the same word value are **synonyms**.

The vocabulary already contains over 30 words that will be used in most adventures. To see them:

ENTER A and **PRESS** RETURN

```
            VOCABULARY  TEXT

    ** Format **        ** Description **

  I  word word *        Insert a word

  D  word               Delete a word

  S  word               Show synonyms

  P                     Print on Screen

  L                     List to Printer

  Z                     Return to Main menu
```

ENTER P and **PRESS** RETURN

```
N         1
NORT      1
S         2
SOUT      2
E         3
EAST      3
W         4
WEST      4
NE        5
NW        6
SE        7
SW        8
U         9
UP        9
CLIM      9
ASCE      9
D         10
DOWN      10
DESC      10
GET       100
TAKE      100
DROP      101
REMO      102
More . . .
```

```
SE        7
SW        8
U         9
UP        9
CLIM      9
ASCE      9
D         10
DOWN      10
DESC      10
GET       100
TAKE      100
DROP      101
REMO      102
WEAR      103
I         104
INVE      104
R         105
REDE      105
QUIT      106
STOP      106
SAVE      107
LOAD      108

     Press any key to continue
```

Notice that U, UP, CLIM, and ASCE all have a word value of 9. This shows that they are all synonyms and mean the same thing to the computer.

When you insert a word into the vocabulary, only the first four letters are inserted unless of course the word is less than four letters in length. The benefit is using less memory.

To return to the Vocabulary Text Menu:

PRESS any key

You must make some additions to the vocabulary in order for the Editor to later understand the entries we have to make in the Vocabulary Action Table.

The words we want in our vocabulary are:

WINE, BOTTLE, HAT, JEWEL and KNIFE

TYPE I WINE 21 and **PRESS** RETURN
ON SCREEN: WINE Inserted

PRESS any key, **TYPE** I BOTTLE 21 and **PRESS** RETURN
ON SCREEN: BOTT Inserted

PRESS any key, **TYPE** I HAT 22 and **PRESS** RETURN
ON SCREEN: HAT Inserted

PRESS any key, **TYPE** I JEWEL 24 and **PRESS** RETURN
ON SCREEN: JEWE Inserted

PRESS any key, **TYPE** I KNIFE 25 and **PRESS** RETURN
ON SCREEN: KNIF Inserted

PRESS any key
To see the words you just added to the vocabulary:
ENTER P and **PRESS** RETURN

```
N                    1
NORT                 1
S                    2
SOUT                 2
E                    3
EAST                 3
W                    4
WEST                 4
NE                   5
NW                   6
SE                   7
SW                   8
U                    9
UP                   9
CLIM                 9
ASCE                 9
D                   10
DOWN               10
DESC               10
WINE               21
BOTT               21
HAT                22
JEWE               24

More . . .
```

```
ASCE                 9
D                   10
DOWN               10
DESC               10
WINE               21
BOTT               21
HAT                22
JEWE               24
KNIF               25
GET               100
TAKE              100
DROP              101
REMO              102
WEAR              103
I                 104
INVE              104
R                 105
REDE              105
QUIT              106
STOP              106
SAVE              107
LOAD              108

Press any key to continue
```

To return to the main menu:
ENTER Z and **PRESS** RETURN

DECODING THE PLAYER'S COMMANDS

Each time the player types in a command during an adventure
the Interpreter has to decode it. Decoding is accomplised by
searching the command for words which are in the
Interpreter's vocabulary. The **word value** of the first word
recognized is stored in a variable called **W1** and similarly the
word value of the second word recognized is stored in W2.

This means that commands like TURN ON THE FLASHLIGHT can
be reduced to ON FLAS provided that the words TURN and THE
are not in the vocabulary and that ON and FLAS are included in
the vocabulary. The Interpreter scans the entire phrase, but
will look for the first two recognizable words and try to act
upon them. You can see that it is important to consider which
words are excluded from the vocabulary as well as those
which are included. The Interpreter can only recognize two
words per command and will only act upon the first two words
it recognizes.

If no words are recognized, the Interpreter gives the reply "I
don't understand...". If the Interpreter recognizes a word or
words, but they neither cause movement (because of no entry
in the Movement Table) nor cause an action to be performed (to
be explained later), then the Interpereter gives one of the
following replies.

"I can't"   when the value of W1 is
                                 greater than 12

"I can't go in that direction"   when the value of W1 is
                                 less than 13.

Therefore, the words in the vocabulary which relate to
directions should have word values in the **range 1 to 12**.

THE VOCABULARY ACTION TABLE

Both the Vocabulary Action Table and the Status Table are
difficult concepts to understand, so this section of the manual
is devoted to explaining how to use them.

The Vocabulary Action Table is created by you; it is used to
tell the Interpreter what to do when the player types in a
command.

There are a few default entries already present in the table that will be used in most adventures. To see them from the main menu:

ENTER G and **PRESS** RETURN

```
           VOCABULARY ACTION TABLE

  ** Format **            ** Description **

A  word1   word2          Alter entry

I  word1   word2          Insert entry

P  word1   word2  opt     Print on Screen

L  word1   word2  opt     List to Printer

Z                         Return to Main menu
```

We want to use the **P option** to print the table on the screen. Notice that you have the option of typing "P" followed by two words. If you enter only "P," the entire table will be listed. However, if your table is especially long, you may want a partial listing. Type two words in the places designated as "word 1" and "word 2." Only those words and the entries following will be displayed.

ENTER P and **PRESS** RETURN

```
GET   I     Conds
            Acts    INVENT
I     *     Conds
            Acts    INVENT
R     *     Conds
            Acts    DESC
QUIT  *     Conds
            Acts    QUIT
                    TURNS
                    END
SAVE  *     Conds
            Acts    SAVE
LOAD  *     Conds
            Acts    LOAD




          Press any key to continue
```

Notice the entries that are already present. These are built-in commands that you will want in most adventures. Their functions will be explained a little later.

Look at the two left columns on the screen. The first column holds one word and the second column holds either a word or an asterisk (*). **WORD/WORD** combinations prompt the Interpreter to look for two words. **WORD/*** combinations prompt the Interpreter to look for a one-word command and the player need enter only one word for the action to take place. Any words following it will be ignored.

Action INVEN

This action will print "I have with me: - " and give a list or **inventory** of what the player has with him.

Action DESC

This action will clear the screen and attempt to **describe** the current location. If it is dark the Interpreter will print "Everything is dark. I can't see."

Actions SAVE and LOAD

These actions will copy and restore a game position. For example, if a player is in the middle of an adventure but doesn't have time to continue playing, he can **save** his current position within the game and **load** it later when he has more time to play the game.

Actions QUIT, TURNS and END

The **QUIT** action will print "Are you sure you want to quit now?".

The action **TURNS** will print "You have taken x turn(s)."

The action **END** is very important, it prints "END OF GAME Do you want to try again?". If the player replies 'N' he is returned to the Editor. The only way to return to the Editor, after testing an adventure is to include the action END in the Vocabulary Action Table.

The first line in the Vocabulary Action Table should read:

GET   I   CONDS

Translation: Get or Take Inventory of the player's
              Objects according to Conditions Set (if any)

If the first line does not appear as shown here, you have added some lines of your own into the table.

The first two words represent a command that the player types in. These words are present in the list of Vocabulary Text (option A from the Main Menu). You could enter "TAKE I" rather than "GET I," because the Editor knows which words are synonyms.

If the player were to type the command "TAKE INVE," the Interpreter would check each entry in the Vocabulary Action Table until it found comparable words, "GET I." In this case, these words are the first ones in the list.

After the Interpreter finds the entry, it checks for conditions before attempting to act upon the words typed in by the player. Since in this example there is nothing following "CONDS," the Interpreter knows there are no conditions and it will proceed to act upon the entered words.

The next line should read "ACTS   INVEN." The Interpreter considers anything following "ACTS" to be an action or actions. The Interpreter knows what to do when it encounters "INVEN" and it prints a list of objects that the player has with him.

Let's stop and take a look at the entire entry. When the player types "TAKE INVE" (or any equivalent), the Interpreter checks for any conditions, finds none and then takes the action INVEN.

The next entry in the table should read:

I   *   CONDS

Translation: Take Inventory of any and all of the player's
              Objects according to Conditions Set (if any)

This entry causes the Interpreter to perform the inventory action. Functionally, it performs the same way for this action entry as for the previous entry GET   I CONDS.

The "I" is a synonym of "INVE." The "*" is like a wild card; it stands for any word or even no word at all. If the player were to type "I JUNK," "I," "INVENTORY" or "INVE CARRIED" it would all mean the same thing to the Interpreter.
There are no conditions for "I *," and the only action is "INVEN." Combining this and the first entry in the table, you can see that typing "INVE," "TAKE INVE," "I," or "I JUNK" will all result in the same thing: a list of what the player is carrying.

Look over the other entries in the table to see what they do. A table of conditions and actions is included in the Reference Section to assist in your understanding of this table.

Now it is time for you to make some additions to the Vocabulary Action Table for our adventure. We want the player to be able to "GET" and "DROP" all the objects in our adventure.

TYPE I GET WINE and **PRESS** RETURN

TYPE GET 4 OK and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key, **TYPE** I GET HAT and **PRESS** RETURN

TYPE GET 1 OK and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key, **TYPE** I GET JEWEL and **PRESS** RETURN

TYPE GET 2 OK and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key, **TYPE** I GET KNIFE and **PRESS** RETURN

TYPE GET 3 OK and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key, **TYPE** I DROP WINE and **PRESS** RETURN

TYPE DROP 4 OK and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key, **TYPE** I DROP HAT and **PRESS** RETURN

TYPE DROP 1 OK and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key, **TYPE** I DROP JEWEL and **PRESS** RETURN
TYPE DROP 2 OK and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key, **TYPE** I DROP KNIFE and **PRESS** RETURN

TYPE DROP 3 OK and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key

We are finished with our entries in the Vocabulary Action
Table for Phase 1 of our adventure. To see the entries:

ENTER P and **PRESS** RETURN

GET	WINE	Conds		
		Acts	GET	4
			OK	
GET	HAT	Conds		
		Acts	GET	1
			OK	
GET	JEWE	Conds		
		Acts	GET	2
			OK	
GET	KNIF	Conds		
		Acts	GET	3
			OK	
GET	I	Conds		
		Acts	INVEN	
DROP	WINE	Conds		
		Acts	DROP	4
			OK	
DROP	HAT	Conds		
		Acts	DROP	1
			OK	
DROP	JEWE	Conds		
		Acts	DROP	2
More . . .				

DROP	HAT	Conds	OK	
		Acts	DROP	1
			OK	
DROP	JEWE	Conds		
		Acts	DROP	2
			OK	
DROP	KNIF	Conds		
		Acts	DROP	3
			OK	
I	*	Conds		
		Acts	INVENT	
R	*	Conds		
		Acts	DESC	
QUIT	*	Conds		
		Acts	QUIT	
			TURNS	
			END	
SAVE	*	Conds		
		Acts	SAVE	
LOAD	*	Conds		
		Acts	LOAD	
Press any key to continue				

If your table does not look like the one shown above make the
appropriate changes.

To return to the Main Menu:

ENTER Z and **PRESS** RETURN

ADDING OBJECT DESCRIPTIONS

Phase II expands on the adventure developed in Phase I.
In this section you will add a few objects to your adventure.
The objects are :

> An open safe
> A big brass key
> A closed safe

Notice the safe is considered as <u>two</u> objects, but both are not
allowed to be present at the same time. You will start with a
closed safe; when the player opens the safe the closed safe is
"destroyed" and an open safe is "created." Don't worry if you
don't understand what we're saying right now; it will become
clear later.

To insert the new objects in the Object description table from
the Main menu:

ENTER E and **PRESS** RETURN

```
                OBJECT   DESCRIPTIONS

   ** Format **               ** Description **

   I                          Insert object desc

   A   [obj #]                Alter object desc

   P   [obj # optional]       Print on Screen

   L   [obj # optional]       List to Printer

   Z                          Return to Main menu
```

ENTER I and **PRESS** RETURN
ON SCREEN: Object 5

TYPE An open safe and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key, **ENTER** I and **PRESS** RETURN
ON SCREEN: Object 6

TYPE A big brass key and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key, **ENTER** I and **PRESS** RETURN
ON SCREEN: Object 7

TYPE A closed safe and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key

Note: Remember you can make your object description text
flash or inverse. This will make your adventure easier
to follow.

To return to the Main Menu:

ENTER Z and **PRESS** RETURN

CHANGING OBJECT STARTING LOCATIONS

Since you've added objects to your adventure, you must make
some changes in the Object Starting Locations Table.
Remember that the Editor automatically assigns a location
number of 252 to each object described. The number **252**
means that the starting location for an object has not yet been
created or defined.

We want **object 5** (An open safe) to remain "not created" so do
not alter it.

Object 6 (A big brass key) will start the adventure in the
attic so you must alter it.

Object 7 (A closed safe) will start in the bedroom and must
also be altered.

Object 2 (A sparkling jewel) will start in the closed safe and
will not be created until the safe is opened.

To make these changes from the Main menu:

ENTER F and **PRESS** RETURN

```
            OBJECT STARTING LOCATIONS

  ** Format **                    ** Description **

A   obj #  loc #              Alter starting loc
                             of an object.
                               Special location #'s
                                 252=Not created
                                 253=Worn
                                 254=Carried
P                            Print on Screen
L                            List to Printer
Z                            Return to Main menu
```

TYPE A 2 252 and **PRESS** RETURN
ON SCREEN: Altered
PRESS any key
TYPE A 6 3 and **PRESS** RETURN
ON SCREEN: Altered
PRESS any key
TYPE A 7 4 and **PRESS** RETURN
ON SCREEN: Altered
PRESS any key
To see the Altered Object Starting Locations:
PRESS P and RETURN

```
Object  0  not created
Object  1  at location  2
Object  2  not created
Object  3  at location  5
Object  4  at location  1
Object  5  not created
Object  6  at location  3
Object  7  at location  4



            Press any key to continue
```

If your entries don't look like the ones above make the appropriate changes.

Note: These locations mark the starting point for the objects in the adventure. Their locations will change throughout the adventure as the player carries them around or destroys them.

To return to the Main Menu:

ENTER Z and **PRESS** RETURN

VOCABULARY TEXT ADDITIONS

Since you are going to make some improvements to your adventure in this phase, you must also expand the Interpreter's vocabulary so it can understand the entries in other tables. You will add these words:

LIVI	(living room)
CELL	(cellar)
ATTI	(attic)
BEDR	(bedroom)
KITC	(kitchen)
SAFE	
KEY	
FINI	(finish)
OPEN	
UNLO	(unlock)
DRIN	(drink)

These entries must be present in the vocabulary in order to use them in the **movement**, **status**, and **vocabulary action tables**. To make these additions from the Main menu:

ENTER A and **PRESS** RETURN

```
            VOCABULARY   TEXT

     ** Format **        ** Description **

 I   word  word *           Insert a word
 D   word                   Delete a word
 S   word                   Show synonyms
 P                          Print on Screen
 L                          List to Printer
 Z                          Return to Main menu
```

TYPE I LIVI 30 and **PRESS** RETURN
ON SCREEN: LIVI Inserted
PRESS any key

TYPE I CELL 31 and **PRESS** RETURN
ON SCREEN: CELL Inserted
PRESS any key

TYPE I CLOS 32 and **PRESS** RETURN
ON SCREEN: CLOS Inserted
PRESS any key

TYPE I ATTI 33 and **PRESS** RETURN
ON SCREEN: ATTI Inserted
PRESS any key

TYPE I BEDR 34 and **PRESS** RETURN
ON SCREEN: BEDR Inserted
PRESS any key

TYPE I KITC 35 and **PRESS** RETURN
ON SCREEN: KITC Inserted.
PRESS any key

TYPE I SAFE 50 and **PRESS** RETURN
ON SCREEN: SAFE Inserted
PRESS any key

TYPE I KEY 51 and **PRESS** RETURN
ON SCREEN: KEY Inserted
PRESS any key

TYPE I FINI 55 and **PRESS** RETURN
ON SCREEN: FINI Inserted
PRESS any key

TYPE I OPEN 60 and **PRESS** RETURN
ON SCREEN: OPEN Inserted
PRESS any key

TYPE I UNLO 60 and **PRESS** RETURN
ON SCREEN: UNLO Inserted
PRESS any key

TYPE I DRIN 65 and **PRESS** RETURN
ON SCREEN: DRIN Inserted
PRESS any key

If you want to see the words you just inserted:
ENTER P and **PRESS** RETURN

ADDING MOVEMENT TABLE ENTRIES

You will make some additions to the **movement table** to
improve your adventure. You will enable the player to move
from one location to any other adjacent location by simply
typing in the name of that location. If you look at the map
you'll see that <u>all</u> locations are adjacent to location O. To
make these additions from the main menu:

ENTER D and **PRESS** RETURN

```
              MOVEMENT   TABLE

    ** Format **              ** Description **

    A    loc #                    Alter an entry

    P    loc #  optional          Print on Screen

    L    loc #  optional          List to Printer

    Z                        Return to Main menu
```

TYPE A O and **PRESS** RETURN
ON SCREEN: D 1 W 2 U 3 NE 4 E 5

Continuing on the same line:
TYPE ATTI 3 CLOS 2 CELL 1 KITC 5 BEDR 4
PRESS RETURN
ON SCREEN: Altered

PRESS any key
TYPE A 1 and **PRESS** RETURN
ON SCREEN: U O

On the same line **TYPE** LIVI O and **PRESS** RETURN
ON SCREEN: Altered

PRESS any key
TYPE A 2 and **PRESS** RETURN
ON SCREEN: E O
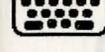
On the same line **TYPE** LIVI O and **PRESS** RETURN
ON SCREEN: Altered

PRESS any key
TYPE A 3 and **PRESS** RETURN
ON SCREEN: D O
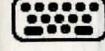
On the same line **TYPE** LIVI O and **PRESS** RETURN
ON SCREEN: Altered

PRESS any key
TYPE A 4 and **PRESS** RETURN
ON SCREEN: SW 0

On the same line **TYPE** LIVI 0 and **PRESS** RETURN
ON SCREEN: Altered

PRESS any key
TYPE A 5 and **PRESS** RETURN
ON SCREEN: W 0

On the same line **TYPE** LIVI 0 and **PRESS** RETURN
ON SCREEN: Altered

To return to the Main Menu:

ENTER Z and **PRESS** RETURN

ADDING MESSAGE TEXT

To make our adventure more interactive you will add some
messages to be displayed in response to the player's actions.
The **message text** uses the same format as the location
descriptions, except that there is a **message number** instead
of location number. A default message 0 is already present;
to see it from the Main menu:
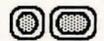
ENTER B and **PRESS** RETURN

```
              MESSAGE   TEXT


   ** Format **          ** Description **

   I                        Insert a msg

   A  [msg #]               Alter a msg

   P  [msg #  optional]     Print on Screen

   L  [msg #  optional]     List to Printer

   Z                        Return to Main menu
```

ENTER P and **PRESS** RETURN
ON SCREEN: 'I see nothing special'
To alter the default message 0:

PRESS any key
TYPE A 0 and **PRESS** RETURN

To clear the entry **PRESS** CTRL-C

TYPE You win ! ! ! Congratulations ! ! !   and **PRESS** RETURN
PRESS any key

Since there is no text present for messages 1 and 2, it must be
inserted. To do this:

TYPE I and **PRESS** RETURN
ON SCREEN: Message 1

TYPE Yum. An excellent wine. and **PRESS** RETURN
PRESS any key

TYPE I and **PRESS** RETURN
ON SCREEN: Message 2

TYPE The hat fits perfectly. and **PRESS** RETURN
PRESS any key

To see the messages you entered:
ENTER P and **PRESS** RETURN

```
  Message   0
  You win ! ! !  Congratulations ! ! !
  Message   1
  Yum. An excellent wine.
  Message   2
  The hat fits perfectly.




            Press any key to continue
```

Note: The message text can be inverse or flashing by using
the same procedure used for location and object
descriptions (CONTROL and F, I or N).

ADDING VOCABULARY ACTION TABLE ENTRIES

In the first phase of your adventure you didn't specify any conditions for the entries inserted in the **vocabulary action table**. You enabled the player to "GET," "DROP" objects. With these commands, the player carries objects from one location to another. The Interpreter knows what objects are present at each location and what objects the player is carrying or wearing. As a result, you don't have to check for these conditions in most entries.

However, the entries will get more complicated. For instance: we don't want the player to be able to open the safe unless he is carrying the key (object 6) and a closed safe (object 7) is present at the current location. (You can't open a safe that is already open). So we'll specify these as the conditions.

When these conditions are met, we want to destroy the closed safe, create the open safe and create the jewel. We'll also give him a score of 50% for opening the safe and describe the location for him again (since the objects present will have changed).

To Insert these entries into the Vocabulary Action Table from the main menu:

ENTER G and **PRESS** RETURN

```
        VOCABULARY ACTION TABLE

  ┌─ ** Format ** ─┐      ┌─ ** Description ** ─┐

  A  [word1] [word2]          Alter entry

  I  [word1] [word2]          Insert entry

  P  [word1] [word2] opt      Print on Screen

  L  [word1] [word2] opt      List to Printer

  Z                   Return to Main menu
```

TYPE I OPEN SAFE and **PRESS** RETURN

TYPE PRESENT 7 CARRIED 6 DESTROY 7 CREATE 5 CREATE 2 LET 30 50 DESC

PRESS RETURN
ON SCREEN: I OPEN SAFE Inserted

PRESS any key

Before we go further let's examine this entry:

TYPE P OPEN SAFE and **PRESS** RETURN

```
┌──────────────────────────────────────────┐
│  OPEN SAFE    Conds    PRESENT     7       │
│               Conds    CARRIED     6       │
│               Acts     DESTROY     7       │
│                        CREATE      5       │
│                        CREATE      2       │
│                        LET       30 50     │
│                        DESC                │
│  GET WINE     Conds                        │
│               Acts     GET         4       │
│                        OK                  │
│  GET HAT      Conds                        │
│               Acts     GET         1       │
│                        OK                  │
│  GET JEWE     Conds                        │
│               Acts     GET         2       │
│                        OK                  │
│  GET KNIF     Conds                        │
│               Acts     GET         3       │
│                        OK                  │
│  GET I        Conds                        │
│               Acts     INVEN               │
│  DROP WINE    Conds                        │
│                                            │
│  More . . .                                │
└──────────────────────────────────────────┘
```

Your entry should match the one shown above. If not, make the appropriate changes.

Notice that we specified two **conditions**:

| PRESENT 7 | Satisfied IF there is a closed |
| CARRIED 6 | safe and IF he is carrying the key |

We specified five **actions**:

DESTROY	7	THEN destroy the closed safe
CREATE	5	create the open safe
CREATE	2	create the jewel.
LET	30 50	give them a score of 50
		(flag 30 holds the player's score)
DESC		describe the location.

NOTE: Only if <u>all</u> the conditions for an entry are met will the actions for that entry be performed.

We have a few more entries to Insert so:
PRESS any key

In our adventure the player has to carry (GET) the wine before he can drink it. We also print a message when he does drink it.

TYPE <u>I DRINK WINE</u> and **PRESS** <u>RETURN</u>

TYPE <u>CARRIED 4 MESSAGE 1 OK</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `I DRINK WINE Inserted`
PRESS any key

We need an entry for the player to be able to "GET" the key:

TYPE <u>I GET KEY</u> and **PRESS** <u>RETURN</u>

TYPE <u>GET 6 OK</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `GET KEY Inserted`
PRESS any key

TYPE <u>I DROP KEY</u> and **PRESS** <u>RETURN</u>

TYPE <u>DROP 6 OK</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `I DROP KEY Inserted`

PRESS any key

TYPE <u>I WEAR HAT</u> and **PRESS** <u>RETURN</u>

TYPE <u>WEAR 1 MESSAGE 2 OK</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `I WEAR HAT Inserted`

PRESS any key

TYPE <u>I REMOVE HAT</u> and **PRESS** <u>RETURN</u>

TYPE <u>REMOVE 1 OK</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `I REMOVE HAT Inserted`

PRESS any key

To see the entries you made in the table:

ENTER <u>P</u> and **PRESS** <u>RETURN</u>

OPEN SAFE	Conds	PRESENT	7
	Conds	CARRIED	6
	Acts	DESTROY	7
		CREATE	5
		CREATE	2
		LET	30 50
		DESC	
DRIN WINE	Conds	CARRIED	4
	Acts	MESSAGE	1
		OK	
GET WINE	Conds		
	Acts	GET	4
		OK	
GET HAT	Conds		
	Acts	GET	1
		OK	
GET JEWE	Conds		
	Acts	GET	2
		OK	
GET KNIF	Conds		
	Acts	GET	3
		OK	
More . . .			

```
                     OK
GET KEY    Conds
           Acts      GET       6
                     OK
GET I      Conds
           Acts      INVEN
DROP WINE  Conds
           Acts      DROP      4
                     OK
DROP HAT   Conds
           Acts      DROP      1
                     OK
DROP JEWE  Conds
           Acts      DROP      2
                     OK
DROP KNIF  Conds
           Acts      DROP      3
                     OK
DROP KEY   Conds
           Acts      DROP      6
                     OK
REMO HAT   Conds
           Acts      REMOVE    1

More . . .
```

```
DROP KEY   Conds
           Acts      DROP      6
                     OK
REMO HAT   Conds
           Acts      REMOVE
                     OK
WEAR HAT   Conds
           Acts      WEAR      1
                     MESSAGE   2
                     OK
I     *    Conds
           Acts      INVEN
R     *    Conds
           Acts      DESC
QUIT  *    Conds
           Acts      QUIT
                     TURNS
                     END
SAVE  *    Conds
           Acts      SAVE
LOAD  *    Conds
           Acts      LOAD

           Press any key to continue
```

If your entries don't match the ones shown above, make the appropriate changes.

STATUS TABLE

The **Status Table** has exactly the same format as the Vocabulary Action Table. Each entry consists of **two words** (both present in the vocabulary). As before, the second word can be an asterisk (*). The words are followed by conditions and actions. However, the Interpreter uses this table in a different way.

The Status Table is scanned between each turn regardless of what the player types in. Every entry in the table is examined and if the conditions for an entry are satisfied, then the actions that follow are performed. A typical entry in the table would determine if a player has won the game.

In our adventure a player wins when he returns to the living room (location 0) with the jewel (object 2). When these conditions are satisfied, we want to increase the player's score, make a winning sound, print a winning message, display the score, display the number of turns taken, and end. This may sound complicated but it's really not.

We specify <u>two</u> **conditions**

AT	0	Satisfied IF he's in the
PRESENT	2	living room and IF the
		jewel is present

We perform these **actions**:

PLUS	30	50	add 50 to the score
SOUND	181	1	
SOUND	192	1	
SOUND	202	1	
SOUND	206	1	
SOUND	214	1	
SOUND	221	1	

SOUND 227 1

SOUND 230 1

SOUND 236 1

SOUND 240 1

MESSAGE 0   print "you win ! ! !"

SCORE   display score (flag 30)

TURNS   display number of turns

END   print "Do you want to play

                 again?"

NOTE: You have direct access to all the registers in the sound chip. See your computer manual for more information.

To insert this entry, from the Main menu:

ENTER H and **PRESS** RETURN

```
                     STATUS

        ** Format **          ** Description **


     A  [word1] [word2]        Alter entry

     I  [word1] [word2]        Insert entry

     P  [word1] [word2] opt    Print on Screen

     L  [word1] [word2] opt    List to Printer

     Z                  Return to Main menu
```

TYPE I FINISH * and **PRESS** RETURN

TYPE AT 0 PRESENT 2 PLUS 30 50 SOUND 181 1 SOUND 192 1
      SOUND 202 1 SOUND 206 1 SOUND 214 1 SOUND 221 1
      SOUND 227 1 SOUND 230 1 SOUND 236 1 SOUND 240 1
      MESSAGE 0 SCORE TURNS END

PRESS RETURN and **PRESS** any key

To see the entry:
ENTER P and **PRESS** RETURN

```
        FINI  *      Conds      At          0
                                PRESENT     2
                                PLUS        30 50
                                SOUND      181   1
                                SOUND      192   1
                                SOUND      202   1
                                SOUND      206   1
                                SOUND      214   1
                                SOUND      221   1
                                SOUND      227   1
                                SOUND      230   1
                                SOUND      236   1
                                SOUND      240   1
                                MESSSAGE   0
                                SCORE
                                TURNS
                                END
        Press any key to continue
```

Your entry should match the one shown above. If not, make the appropriate changes.

Note: The words "FINISH *" are used primarily as a reminder to yourself of what that entry does. We could have used the words "WIN *" instead. The Interpreter does not look at these words, only the conditions that follow them. When the conditions are met, the actions that ensue will be performed.

Save the Database

At this point you have entered all the database additions for phase II of our adventure. **save** these changes as a separate database. From the Main menu:
ENTER I and **PRESS** RETURN

ON SCREEN: Type in name of file
TYPE: PHASE II and **PRESS** RETURN

When the database has been saved correctly an "OK" message will be displayed. If an error message is displayed, resave the database until it is saved correctly.

NOTE: You cannot "save over" an existing database. You must use a different file name.

Test the Adventure

Now it is time to **test** PHASE II of the adventure. From the Main menu:

ENTER L and **PRESS** RETURN
ON SCREEN: Do you want to see diagnostic flags?

The flags are used in the more advanced stages of testing your adventures. You will not need to see the flags for this phase of the adventure.
PRESS RETURN

The screen displays a description of location 0. Try moving in all directions from every room. Make sure that you are at the correct location after each move. You shouldn't be able to open the safe without the key and you shoudn't be able to get the jewel without opening the safe. When you are in the living room type in the following commands:

INVENTORY	will reply	I have with me:- Nothing at all.
GET HAT	will reply	It's not here.
CLOSET	will display	Description of the closet
GET HAT	will reply	OK
WEAR HAT	will reply	The hat fits perfectly.
INVENTORY	will reply	I have with me:- An old hat.(worn)

Since you added the entry to allow the player win, you now have two ways to exit from testing the adventure. If you get the jewel and returning with it to the living room you will win and will have the option to exit or to try again. Of course you can enter the command QUIT or STOP as you did when testing PHASE I.

Note: When you insert entries into the Status Table, the Editor looks at the **word values** of W1 and W2. (Every word in the vocabulary has a corresponding value.) It then enters them into the table in ascending numerical order. Consequently, you can position an entry at a particular place in the table by using words with the proper values.

To return to the Main menu:

ENTER Z and **PRESS** RETURN

OBJECT DESCRIPTIONS

In this phase of the adventure we're going to make the attic dark so it's a little harder for the player to find the key. If you remember, earlier we said that the Interpreter always considers object 0 to be a source of light, and its presence at a dark location will enable the player to see.

We're going to need object 0 in this phase, so we'll describe it as "A flashlight (on)." To do this from the Main menu:

ENTER E and **PRESS** RETURN

```
            OBJECT DESCRIPTIONS

  ** Format **                  ** Description **

  I                              Insert object desc
  A   [obj #]                    Alter object desc
  P   [obj # optional]           Print on Screen
  L   [obj # optional]           List to Printer
  Z                              Return to Main menu
```

Since an entry for object 0 is already present we will have to alter it:

TYPE A 0 and **PRESS** RETURN
ON SCREEN: A source of light.   (the existing entry)

PRESS CTRL-C to clear the entry

TYPE A flashlight. (on) and **PRESS** RETURN
ON SCREEN: Object 0 Altered
PRESS any key

We really don't need the knife in this adventure, so let's alter it to be "A flashlight. (off)". To do this:

TYPE A 3 and **PRESS** RETURN
ON SCREEN: A sharp knife. (the existing entry)

PRESS CTRL-C to clear the entry

TYPE A flashlight. (off) and **PRESS** RETURN
ON SCREEN: Object 3 Altered

PRESS any key

To see the entries:

ENTER P and **PRESS** RETURN

```
Object    0
A flashlight (on)
Object    1
An old hat
Object    2
A sparkling jewel
Object    3
A flashlight (off)
Object    4
A bottle of wine
Object    5
An open safe
Object    6
A big brass key
Object    7
A closed safe
         Press any key to continue
```

If your entries don't match the ones shown above, make the appropriate changes.

OBJECT STARTING LOCATIONS

In this part of your adventure you should not have to make any changes to the starting locations. You'll need the flashlight that is on (object 0) to start the adventure as "not created." The flashlight that is off (object 3) should start the adventure in the kitchen (location 5). Check the entries in your table to see that these objects start in the correct locations.

When you "turn on" the flashlight in the vocabulary action table, you'll swap (change the positions of) objects 0 and 3.

To return to the Main Menu:
PRESS any key, **ENTER** Z and **PRESS** RETURN

THE VOCABULARY TEXT

It will be necessary, however, to add more words to the vocabulary. These entries must be made before any of these words can be used in any of the tables. The words we want to add to the vocabulary are:

> **FLASHLIGHT**
> **LIGHT**
> **ON**
> **OFF**
> **LOSE**
> **THIRST**

Since you don't have a knife in your adventure any more, you don't need it in the vocabulary, and you'll delete it:

From the Main Menu:
ENTER <u>A</u> and **PRESS** <u>RETURN</u>

```
        VOCABULARY  TEXT

     ** Format **        ** Description **

   I  word word ⬆       Insert a word
   D  word               Delete a word
   S  word               Show synonyms
   P                     Print on Screen
   L                     List to Printer
   Z                     Return to Main menu
```

TYPE <u>D KNIFE</u> and **PRESS** <u>RETURN</u>
ON SCREEN: KNIF DELETED
PRESS any key

NOTE: At the same time that "KNIF" was deleted from the
vocabulary, the Editor automatically deleted the "GET
KNIF" and "DROP KNIF" entries from the vocabulary
action table. If there had been any "KNIF" entries in
the status or movement tables they would have been
deleted as well.

To insert the preceding words in the vocabulary:

TYPE <u>I FLASH 25</u> and **PRESS** <u>RETURN</u>
ON SCREEN: FLAS Inserted
PRESS any key

TYPE <u>I LIGHT 25</u> and **PRESS** <u>RETURN</u>
ON SCREEN: LIGH Inserted
PRESS any key

TYPE <u>I ON 26</u> and **PRESS** <u>RETURN</u>
ON SCREEN: ON Inserted
PRESS any key

TYPE <u>I OFF 27</u> and **PRESS** <u>RETURN</u>
ON SCREEN: OFF Inserted
PRESS any key

TYPE: I LOSE 56 and **PRESS** <u>RETURN</u>
ON SCREEN: LOSE Inserted
PRESS any key

TYPE: I THIRST 66 and **PRESS** <u>RETURN</u>
ON SCREEN: THIR Inserted
PRESS any key

NOTE: "FLAS" and "LIGH" are synonyms

To see the entries you've inserted:
ENTER <u>P</u> and **PRESS** <u>RETURN</u>

To return to the Main Menu:
PRESS any key, **ENTER** <u>Z</u> and **PRESS** <u>RETURN</u>

THE MOVEMENT TABLE

As we mentioned earlier, in this phase of our adventure we
want the attic to be dark. To do this, **flag 0** must be set upon
entering the attic and cleared upon exit. This must be done in
the Vocabulary Action Table.

However, the Interpreter checks the Movement Table before it
checks the Vocabulary Action Table and if an entry causes
movement it will not check the Vocabulary Acton Table.

Therefore, we must delete all entries causing movements to
and from the attic. To do this from the Main menu:

ENTER D and **PRESS** RETURN

```
              MOVEMENT   TABLE

   ** Format **           ** Description **

  A   loc #                Alter an entry

  P   loc #   optional     Print on Screen

  L   loc #   optional     List to Printer

  Z                        Return to Main menu
```

TYPE A 0 and **PRESS** RETURN
ON SCREEN: D 1 W 2 U 3 NE 4 E 5 ATTI 3 CLOS 2 CELL 1
KITC 5 BEDR 4

POSITION the cursor to the immediate right of "ATTI 3" and
DELETE it by pressing CTRL-D

DELETE "U 3" using the same procedure

PRESS RETURN
ON SCREEN: Altered

You must delete all entries from the attic so:

TYPE A 3 and **PRESS** RETURN
ON SCREEN: D 0 LIVI 0

PRESS CTRL-C, then **PRESS** RETURN
ON SCREEN: Altered
PRESS any key

To return to the Main menu:
ENTER Z and **PRESS** RETURN

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MESSAGE TEXT

You need to add a couple more messages in this phase of your
adventure to indicate to the player when he is stricken by
intense thirst, and when he is dying of thirst. To do this from
the Main menu:

ENTER B and **PRESS** RETURN

```
              MESSAGE   TEXT

   ** Format **           ** Description **

  I                        Insert a msg

  A   msg #                Alter a msg

  P   msg #   optional     Print on Screen

  L   msg #   optional     List to Printer

  Z                        Return to Main menu
```

ENTER I and **PRESS** RETURN
ON SCREEN: Message 3

TYPE I'm very thirsty. I need a drink soon or I'll die.
PRESS RETURN
ON SCREEN: Inserted

PRESS any key

ENTER I and **PRESS** RETURN
ON SCREEN: Message 4

TYPE I'm dying of thirst.
PRESS RETURN
ON SCREEN: Inserted

PRESS any key

ENTER I and **PRESS** RETURN
ON SCREEN: Message 5

65

TYPE Too bad. You lose.
PRESS RETURN
ON SCREEN: Inserted

PRESS any key

To see the Message Text:
ENTER P and **PRESS** RETURN

To return to the Main Menu:
ENTER Z and **PRESS** RETURN

THE VOCABULARY ACTION TABLE

At this stage of the adventure there are several entries to be inserted in the **vocabulary action table**. Let's begin with entries to make the attic dark. We'll use the AT condition and the SET, GOTO and DESC actions. These are the entries which replace the ones deleted from the movement table.

NOTE: When flag 0 is equal to zero it is **light**, when flag 0 is not equal to zero it is **dark**. The action SET, sets a flag equal to 255. The action CLEAR, clears a flag to 0.

When the player is AT the living room (location 0) and moves UP to the attic (location 3) we want to SET flag 0 (making it dark), and describe (DESC) the location.

From the Main Menu:

ENTER G and **PRESS** RETURN

```
                    VOCABULARY ACTION TABLE

       ** Format **              ** Description **

    A   word1    word2              Alter entry

    I   word1    word2              Insert entry

    P   word1    word2   opt        Print on Screen

    L   word1    word2   opt        List to Printer

    Z                    Return to Main menu
```

TYPE I U * and **PRESS** RETURN

TYPE AT 0 SET 0 GOTO 3 DESC and **PRESS** RETURN
ON SCREEN: Inserted
PRESS any key

TYPE I ATTI * and **PRESS** RETURN

TYPE AT 0 SET 0 GOTO 3 DESC and **PRESS** RETURN
ON SCREEN: Inserted
PRESS any key

When the player is AT the attic (location 3) and moves DOWN to the living room (location 0), we want to CLEAR flag 0 (making it light) and DESC (describe) the location.

TYPE I D * and **PRESS** RETURN

TYPE AT 3 CLEAR 0 GOTO 0 DESC and **PRESS** RETURN
ON SCREEN: Inserted

PRESS any key

TYPE I LIVI * and **PRESS** RETURN

TYPE <u>AT 3 CLEAR 0 GOTO 0 DESC</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `Inserted`
PRESS any key

NOTE: When flag 0 is <u>not equal</u> to 0 and object 0 is <u>not present</u>, the system message "Everyting is dark. I can't see." is printed.

In our adventure the player has to be carrying a flashlight that is turned off (object 3) in order turn it on. He also needs the flashlight that is turned on (object 0) to be able to see in the attic (location 3). If you remember, the "on" flashlight is not created yet. We'll use the action SWAP to exchange the positions of objects 0 and 3. This will effectively turn the flashlight on or off.

TYPE <u>I FLAS ON</u> and **PRESS** <u>RETURN</u>

TYPE <u>CARRIED 3 SWAP 3 0 OK</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `Inserted`

TYPE <u>I ON FLAS</u> and **PRESS** <u>RETURN</u>

TYPE <u>CARRIED 3 SWAP 3 0 OK</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `Inserted`

TYPE <u>I FLAS OFF</u> and **PRESS** <u>RETURN</u>

TYPE <u>CARRIED 0 SWAP 3 0 OK</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `Inserted`

TYPE <u>I OFF FLAS</u> and **PRESS** <u>RETURN</u>

TYPE <u>CARRIED 0 SWAP 3 0 OK</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `Inserted`

Notice that we inserted two entries to turn on the flashlight and two entries to turn the flashlight off. This was done so that the Interpreter can understand both of the following commands, and so that the player can enter either of these commands and achieve the same result:

> TURN ON THE FLASHLIGHT
> TURN THE FLASHLIGHT ON

In this adventure the player scores 50% for opening the safe. If he closes the safe and opens it again, we don't want him to score again so we'll set a flag (12) the first time he opens the safe. All flags are set to 0 when the adventure begins. Consequently, before the safe is opened, flag 12 will be zero. We also don't want to be able to open a safe that is already open, so we'll check for a closed safe.

We'll need two entries to open the safe. Therefore, we must alter the OPEN SAFE entry that is already present to check flag 12 (to determine if the safe has been opened before) and to set flag 12 the first time the safe is opened.

TYPE <u>A OPEN SAFE</u> and **PRESS** <u>RETURN</u>
ON SCREEN: `PRESENT 7 CARRIED 6 DESTROY 7 CREATE 5 CREATE 2 LET 30 50 DESC`

MOVE the cursor to the immediate left of "DESTROY 7" and **TYPE** <u>ZERO 12</u>

ON SCREEN: `PRESENT 7 CARRIED 6 ZERO 12 DESTROY 7 CREATE 5 CREATE 2 LET 30 50 DESC`

MOVE the cursor to the immediate left of "LET 30 50" and **TYPE** <u>SET 12</u>

PRESS <u>RETURN</u>
ON SCREEN: `Altered`

PRESS any key

TYPE I OPEN SAFE and **PRESS** RETURN

TYPE PRESENT 7 CARRIED 6 DESTROY 7 CREATE 5 OK

PRESS RETURN
ON SCREEN: Inserted
PRESS any key

TYPE P OPEN SAFE and **PRESS** RETURN to see the changes you made

NOTE: If the safe has been **opened**, flag 12 is not equal to 0 and the interpreter will "fall thru" and check the second OPEN SAFE entry. The second entry checks for a key and a closed safe, but does not give any points for opening the safe.

We need to insert an entry to allow the player to close a safe that he has opened. All we have to do is check that an open safe is present and if so, destroy it and create a closed safe.

TYPE I CLOSE SAFE and **PRESS** RETURN

TYPE PRESENT 5 DESTROY 5 CREATE 7 OK

PRESS RETURN
ON SCREEN: Inserted

PRESS any key

Later, in the Status Table we will set some conditions to cause the player to get **thirsty**. If his thirst isn't quenched, he will die. You will set flag 11 to indicate that the player's thirst has been quenched. An entry in the Status table will check flag 11 to determine if the player has drunk the wine.

TYPE A DRINK WINE and **PRESS** RETURN
ON SCREEN: CARRIED 4 MESSAGE 1 OK

MOVE the cursor to the immediate left of "OK" and **TYPE** SET 11

PRESS RETURN
ON SCREEN: Altered
PRESS any key

Now you must insert the entries that will enable the player to GET and DROP the flashlight. You will make two entries for each:

TYPE I GET FLAS and **PRESS** RETURN

TYPE PRESENT 3 GET 3 OK and **PRESS** RETURN
ON SCREEN: Inserted
PRESS any key

TYPE I GET FLAS and **PRESS** RETURN

TYPE GET 0 OK and **PRESS** RETURN
ON SCREEN: Inserted
PRESS any key

Notice that the first entry checks for the presence of the turned off flashlight (object 3). If it is present, the Interpreter gets it, and the action "OK" causes an exit from the table. If the turned off flashlight is not present, the Interpreter goes to the next entry and gets the turned on flashlight (object 0).

TYPE I DROP FLAS and **PRESS** RETURN

TYPE PRESENT 3 DROP 3 OK and **PRESS** RETURN
ON SCREEN: Inserted
PRESS any key

TYPE I DROP FLAS and **PRESS** RETURN

TYPE <u>DROP O OK</u> and **PRESS** <u>RETURN</u>
ON SCREEN: | Inserted |

PRESS any key

Notice that the entries for "DROP FLAS" have the same conditions and format as those for "GET FLAS." They work in the same manner.

To see the entries:
ENTER <u>P</u> and **PRESS** <u>RETURN</u>

```
U      *      Conds   AT       0
              Acts    SET      0
                      GOTO     3
                      DESC
D      *      Conds   AT       3
              Acts    CLEAR    0
                      GOTO     0
                      DESC
FLAS   ON     Conds   CARRIED  3
              Acts    SWAP     3   0
                      OK
FLAS   OFF    Conds   CARRIED  0
              Acts    SWAP     3   0
                      OK
ON     FLAS   Conds   CARRIED  3
              Acts    SWAP     3   0
                      OK
OFF    FLAS   Conds   CARRIED  0
              Acts    SWAP     3   0
                      OK
LIVI   *      Conds   AT       3
              Acts    CLEAR    0

More . . .
```

This is the first of 5 screens. To see the entire listing, continue to press RETURN after each screen is displayed.

To return to Main Menu:
ENTER <u>Z</u> and **PRESS** <u>RETURN</u>

THE STATUS TABLE

During this part of our adventure we want the player to **lose** after taking <u>21 turns</u> without returning to the living room with the jewel. The "FINI*" entry will check the conditions: **AT 0 & PRESENT 2** (in the living room without the jewel). As long as these conditions are not satisfied, the next entry in the table will be checked. Make the following entry:

From the Main Menu:
ENTER <u>H</u> and **PRESS** <u>RETURN</u>

```
                        STATUS

      ** Format **              ** Description **

   A  [word1] [word2]           Alter entry

   I  [word1] [word2]           Insert entry

   P  [word1] [word2] opt       Print on Screen

   L  [word1] [word2] opt       List to Printer

   Z                            Return to Main menu
```

TYPE <u>I LOSE *</u> and **PRESS** <u>RETURN</u>

NOTE: The **word value** of LOSE is greater than that of FINI to insure that it will follow the FINI * entry.

TYPE GT 31 20 ZERO 32 PAUSE 70 MESSAGE 5 SOUND 60 9 SOUND 60 9 SOUND 60 9 SOUND 95 5 SOUND 84 2 SOUND 84 6 SOUND 60 2 SOUND 60 6 SOUND 47 4 SOUND 60 18 SCORE TURNS END

PRESS <u>RETURN</u>
ON SCREEN: | I LOSE * Inserted |
PRESS any key

This entry limits the player to 21 turns. After 21 turns the message **"Too bad. You lose."** is printed and a losing sound is made. The score and number of turns are displayed and the player is asked if he wants to play again.

NOTE: Flags 31 and 32 hold the low byte and high byte of the number of turns.

We going to make one more entry in the Status Table to make our adventure more exciting. We want the player to get thirsty after 7 turns, remain thirsty for 5 turns and then die following the next turn. Drinking the wine will quench his thirst and keep him alive. To do this we have to set some flags and check them.

Flag 11 will be set when the player drinks the wine, indicating that his thirst was quenched.

NOTE: Flags 5-8 automatically decrement each turn.

Flag 5 will be set to 6 on the seventh turn. When **flag 5 =1** the player will die.

Three THIRST * entries must be made in the status table for all this to work properly. The first entry will set flag 5 after the seventh turn:

TYPE I THIRST * and **PRESS** RETURN

TYPE EQ 31 7 ZERO 32 LET 5 6 and **PRESS** RETURN
ON SCREEN: I THIRST * Inserted
PRESS any key

TYPE I THIRST * and **PRESS** RETURN

TYPE GT 5 1 ZERO 11 MESSAGE 3 and **PRESS** RETURN
ON SCREEN: I THIRST * Inserted
PRESS any key

TYPE I THIRST * and **PRESS** RETURN

TYPE EQ 5 ZERO 11 MESSAGE 4 SOUND 60 9 SOUND 60 9 SOUND 60 9 SOUND 95 5 SOUND 84 2 SOUND 84 6 SOUND 60 2 SOUND 60 6 SOUND 47 4 SOUND 60 18 SCORE TURNS END

PRESS RETURN
ON SCREEN: I THIRST * Inserted
PRESS any key

To see the entry:
TYPE P THIR * and **PRESS** RETURN

THIR *	Conds	EQ	31	7
		ZERO	32	
	Acts	LET	5	6
THIR *	Conds	GT	5	1
		ZERO	11	
	Acts	MESSAGE	3	
THIR *	Conds	EQ	5	1
		ZERO	11	
	Acts	MESSAGE	4	
		SOUND	60	9
		SOUND	60	9
		SOUND	60	9
		SOUND	95	5
		SOUND	84	2
		SOUND	84	6
		SOUND	60	2
		SOUND	60	6
		SOUND	47	4
		SOUND	60	18
		SCORE		
		TURNS		

More...

If your entries do not match the ones shown above, retype as needed.

Notice that the second "THIR *" entry prints the message **"I'm very thirsty. I need a drink soon or I'll die"**. This message gets printed when flag 5 is greater than 1 and flag 11 is equal to 0, indicating that the wine has not been drunk. The conditions for the third entry are satisfied when flag 5 is equal to 1 and flag 11 has not been set. (Flag 11 gets set when the wine is drunk).

Number of Portable Objects

The last change we'll make to our adventure is to **limit** the **number** of **objects** that the player can carry. This will make the adventure more difficult and thus, more challenging to solve. The procedure is very simple. From the Main menu:

ENTER P and **PRESS** RETURN
ON SCREEN: Enter (0-255) and press RETURN

TYPE 2 and **PRESS** RETURN
PRESS any key

This entry will not permit the player to carry any more than two objects (not including any objects that are worn).

Save the Database

At this point, you have entered all the database additions for Phase III of your adventure. You **saved** these changes after each phase as separate databases. From the Main menu:

ENTER I and **PRESS** RETURN

ON SCREEN: Type in name of file

TYPE PHASE 3 and **PRESS** RETURN

When the database is saved correctly, you will be prompted to press any key to continue. If an error message is displayed, resave the database until it is saved correctly.

Test the Adventure

Now it is time to **test** the adventure. From the Main menu:

ENTER L and **PRESS** RETURN
ON SCREEN: Do you want to see diagnostic flags?

ENTER Y and **PRESS** RETURN

The screen displays a description of location 0 and the starting values of all the flags. As you move from room to room, and GET and DROP objects, you will see the values of the flags change. Flag 31 (the turns count) will start at 1 and be incremented every turn. When you are in the living room, **TYPE** in the following commands:

SOUTH	will reply	I can't go in that direction.
GET JEWEL	will reply	It's not here.
OPEN SAFE	will reply	I can't.
ATTIC	will reply	Everything is dark. I can't see.

At any time while testing this adventure you may **exit** by quitting:

TYPE quit and **PRESS** RETURN
ON SCREEN: Do you really want to quit now?

TYPE Y (for yes) and **PRESS** RETURN

VIEW:

```
Tell me what to do.
> QUIT
Do you really want to quit now?
> Y
You have taken * turns.
You have scored * %
                    END OF GAME
Do you want to try again?
> N
Bye. Have a nice day.

Ok
```

TYPE N

This is the standard procedure for exiting an adventure. If the player decides to interrupt the game, he may exit at any time by typing **quit** or **stop**.

Winning and **losing** are other ways of exiting. If the player wins, he will see the message: "You win!!! Congratulations!!!" (or an alternate win-message the designer enters in the message text table). Losing displays the message: "Too bad, you lose". In either case, you are given the opportunity to try again.

Save the Adventure

You have nearly completed Phase III of AdventureWriter, but you must take one more crucial step before becoming the proud owner of your very own stand-alone program. You must **save** your adventure.

Make sure that your <u>application disk</u> (and not the Adventure-Writer Disk) is in the disk drive.

From the Main menu:
ENTER <u>M</u> and **PRESS** <u>RETURN</u>

ON SCREEN: === SAVE ADVENTURE ===

ON SCREEN: Type in name of file

TYPE <u>JEWEL THIEF</u> and **PRESS** <u>RETURN</u>

When the adventure has been saved correctly, an "OK" message is be displayed. If an error message is displayed, resave the adventure until it is saved correctly.

This option saves the following files to your disk:

1) Your **Database** created with AdventureWriter
2) The **Interpreter**
3) A **loading program** to automatically run your adventure without additional commands

To run your adventure program:

INSERT application disk with the saved adventure

POWER UP system:
  - Turn On Monitor
  - Turn On Computer

TYPE <u>BRUN JEWEL THIEF</u> and **PRESS** <u>RETURN</u>

Yee Haa ! You have just completed your first adventure!

We highly recommend that you read the reference section of this manual before attempting to create your own adventure. You will avoid perils and pitfalls of your own by doing so.

DETAILED DESCRIPTION OF THE DATABASE

The database consists of a number of inter-related tables and an area of miscellaneous information (eg: Number of portable objects). The tables present are:

A The Vocabulary Text Table

Each entry in the table uses 5 characters and contains a word (or the first four characters, if the word is longer than four characters) and a word value in the range 1-254. Words with the same word value are called synonyms. The entries are held in ascending order of word value and within each word value, entries with the least amount of characters come first.

eg: U
     UP
     CLIM
     ASCE

Where entries with the same word value also have the same number of spaces, the entry inserted first comes earlier (eg: CLIM[B] was inserted before ASCE[ND]).

Note 1. When the Editor has to convert a word value to a word, it takes the first word with that value.

Note 2. Word values less than 13 should be reserved for movement words.

B The Message Text Table

This table contains the text of any messages which are needed for the adventure. The messages are numbered from 0 upwards and each one uses 3 characters plus the length of the text.

C   The Location Descriptions Table

This table, which has an entry for each location, contains the text which is printed when a location is described. Each entry uses 3 characters plus the length of the text. The entries are numbered from 0 upwards and location 0 is the location at which the adventure starts. Whenever a new location is inserted, an empty (null) entry for that location is also made in the Movement table.

D   The Movement Table

This table has an entry for each location and each entry may either be empty (null) or contain a number of " movement pairs ". A movement pair consists of a word value in the vocabulary followed by a location number, and means that any word with that word value causes movement to that location. A typical entry could be SOUTH 6 EAST 7 RETURN 6 NORTH 5. This means that SOUTH or RETURN or their synonyms cause movement to location 6, EAST or its synonyms to location 7 and NORTH or its synonyms to location 5. Each entry uses 3 characters plus 2 characters for each movement pair.

Note 1. The movement pairs contain the word value, not the actual word, and if a word value is deleted from the vocabulary, then all movement pairs which contain that word value are also deleted.

Note 2.   When you play the adventure, only the first recognized word (W1) will cause movement.

Note 3.   If any movements are to be performed in the Event or Status tables using the action GOTO then exclude those movements from the Movement table.

E   The Object Descriptions Table

This table, which has an entry for each object, contains the text which is printed when an object is described. Each entry uses 3 characters plus the length of the text.

An object is anything in the adventure which may be manipulated and is numbered from 0 upwards. Object 0 is assumed by the Interpreter to be a source of light such as a flashlight or torch. Whenever a new object text is inserted, an entry of "not created" is made for that object in the Object Starting Location table.

F   The Object Starting Location Table

This table has a one character entry for each object, which specifies the location at which the object is situated at the beginning of the adventure. An object can also start the adventure being worn, carried or not created.

G   The Vocabulary Action Table

This table (together with the Status table) forms the main part of the database. Each entry contains 2 word values followed by any number of conditions and then (normally) at least one action. When you play the adventure, if there is an entry in the table with the word values entered and having the conditions specified satisfied, then the actions are performed. The conditions and actions that may be present and the effect that they have are fully specified in the description by the Interpreter. The order of entries in the table is in ascending order of the first word value. Entries which have the same first word value are held in ascending order of the second word value. Entries with the same first and second word values are held in the order they were inserted into the database (ie: they must be inserted in the order required). An example of the order of the table, with word values shown in brackets is as follows:-

NOTE: word values	LOOK	[30]	UP	[9]
(shown in brackets) will	LOOK	[30]	DOWN	[10]
appear only in the	LOOK	[30]	*	[255]
Vocabulary Text table	GET	[100]	KEY	[16]
	GET	[100]	LAMP	[26]

Each entry in the table has an overhead of 6 characters and each condition and action uses 1, 2, or 3 characters depending on the number of parameters specified.

Note 1. If a word value is deleted from the Vocabulary Text Table, then all entries in the Event and Status tables which contain that word value are deleted.

H The Status Table

This table has exactly the same format as the Vocabulary Action table. When you play the adventure the Status table is scanned between turns to see if the adventure wants anything to happen. The Vocabulary Action table can be considered as the player's table and contains entries which are dependent on the words entered, while the Status table is the computer's table and contains entries which are independent of the words entered by the player. The words in the Status table can, however, be used to position entries at the required place and/or as a reminder of the purpose of the entries.

I The AdventureWriter Message Table

This table contains the messages used by the Interpreter. Each entry uses 3 characters plus the length of the text. The description of the Interpreter shows how these messages are used.

eg: **I'm hungry**
I'm dying of sun-stroke
I need a drink etc . . . .

DETAILED DESCRIPTION OF THE EDITOR

Within this section certain abbreviations will be used for the sake of simplicity:

Abbreviations: message number .... **msg** * (0-254)
location number .... **loc** * (0-251)
object number .... **obj** * (0-254)

A Vocabulary

Words may be inserted or deleted; the synonyms of a word may be displayed, or the vocabulary may be printed:

To INSERT a word
Type: **I word word*** (word* is between 1 & 254 and
is assigned as the value of the word)

If **word** is not already present in the vocabulary it is inserted with a word value specified above.

To DELETE a word
Type: **D word**

If the variable **word** is present in the vocabulary, it and its word value are deleted. If synonyms of the word deleted are present in the vocabulary, no further action is taken. However, if no synonyms are present, then:

a) all entries in the Vocabulary Action and Status tables which use this word value are also deleted.

b) all movement in the Movement table which use this word value are also deleted.

To SHOW SYNONYMS
Type: **S word**

If **word** is present in the vocabulary, it and all other words with the same word value are displayed.

To LIST to printer or PRINT on screen
Type: **L** (to list to printer) or **P** (to print on screen)

Points to note:

a) Be careful in using delete as it can also affect the Vocabulary Action, Status and Movement tables.

b) Words with a word value of less than 13 are assumed to be movement words by the Interpreter and can cause the message "I can't go in that direction" to be printed instead of "I can't".

c) When entries in the Vocabulary Action, Status and Movement tables are affected, the Editor may take a few minutes to delete a word.

B   Message Text

Message texts may be inserted, amended/altered or printed:-

To INSERT

Type: **I**, hit **RETURN**, enter message

The next available message number is used and a null (empty) entry is made for it in the Message Text table. An automatic call to the amend/alter routine is then made to allow the user to amend/alter the null entry.

To AMEND/ALTER

Type: **A msg ***

The Editor will cause the existing text for the message msg * to be copied to the input buffer (input storage area) and displayed on the screen for amending/altering. Pressing RETURN will cause the existing text to be replaced with the contents of the input buffer.

To LIST to the printer or PRINT to the screen

Type: **L msg *** to list to printer (msg* is optional)
or   **P msg *** to print to screen (msg* is optional)

Printing starts with the text for message msg* or at the beginning Message Text table if msg* is not specified.

Note: There is a limit of 255 messages.

C   Location Descriptions

Location texts may be inserted, amended/altered, or printed:-

To INSERT

Type: **I**, hit **RETURN**, enter text

The next available location number is automatically used and a null entry is made for it in both the Movement and Location Text tables. Processing then continues with an automatic call to the amend routine to allow the user to amend the null entry already set up in the Location Text table.

To AMEND/ALTER

Type: **A loc ***

The existing text for Location loc * is copied to the input buffer and displayed on the screen for amending/altering. When RETURN is pressed, the existing entry is replaced with the contents of the input buffer.

To LIST to printer or to PRINT on screen

Type: **L loc *** to list to printer (loc * is optional)
or   **P loc *** to print on screen (loc * is optional)

Printing starts with the text for location loc * or , if loc * is not specified, at the beginning.

Points to note:-

a) The start of an adventure is always at location 0

b) There is a limit of 252 locations.

D Movement Table

Movements may be amended/altered or printed:-

To AMEND/ALTER

Type: **A loc ***

The existing entry for location loc * is decoded, copied to
the input buffer and displayed on the screen for amending/
altering. When RETURN is pressed the input buffer is
assumed to be empty or to contain any number of movements
in the format (**word** loc *). **Word** must be present in the
Vocabulary Text table and loc * must be present in the
Location Description table. If there are no syntax errors,
the existing entry is replaced with an encoded copy of the
input buffer (ie: words changed to word values).

To LIST to printer or to PRINT on screen

Type: **L loc *** to list to printer (loc * is optional)
or **P loc *** to print on screen (loc * is optional)

Printing starts with the entry for location loc * or at the
beginning if loc * is not specified.

Points to note:

a) A location text must be present for a location before
movements can be present.

b) Any words in the Vocabulary may be used in the
Movement table.

c) When an entry is decoded (for Amend/Alter or Print),
the word value is changed into the first word in the
Vocabulary with that word value.

E Object Descriptions

Object text may be inserted, amended/altered, or
printed:-

To INSERT

Type: **I,** hit **RETURN,** enter text

The next available object number is used and an empty
(null) entry is made for it in the Object Text table. An
entry of "not created" is also made for it in the Object
Starting Location table. Processing then continues with an
automatic call to the amend/alter routine to allow you to
amend/alter the null entry already set up in the Object
Text table.

To AMEND/ALTER

Type: **A obj ***

The existing text for the object obj * is copied by the Editor
to the input buffer and displayed on the screen for amending/
altering. Pressing RETURN will replace the existing text with
the contents of the input buffer.

To LIST to printer or PRINT to screen

Type: **L obj *** to list to printer (obj * is optional)
or **P obj *** to print on screen (obj * is optional)

Printing starts with the text for object obj * or at the
beginning if obj * is not specified.

Points to note:

a) Object 0 is always considered by the Interpreter to
be a source of light. (eg: candles, flashlights, torches,
etc.)

b) There is a limit of 255 objects in an adventure.

F Object Starting Locations

The location at which an object is situated at the start of the adventure may be amended/altered or the Object Start Location table may be printed:-

To AMEND/ALTER
Type: **A obj * loc ***

The existing entry for object obj * is replaced with loc * which must be present either in the Location Text table or be one of the special location numbers.
(ie: 252 not created - 253 worn - 254 carried)

To LIST to printer or to PRINT on screen
Type: **L** to list to printer
or   **P** to print on screen

There are no other parameters needed to LIST or PRINT

An object text must be present for an object before its starting location can be present.

G Vocabulary Action Table

Entries may be inserted, amended/altered, deleted or printed:-

To INSERT
Type: **I word1 word2**

Word1 and **word2** MUST be asterisks (*) or words which are in the vocabulary. The word values of **word1** and **word2** (any asterisk has a value of 255) are used to find the correct place in the table for the new entry to be created.If any entries already exist for **word1** or **word2** then the new entry will be created after the previous entries. An empty (null) entry is created at the appropriate place and an automatic call is made to the amend/alter routine to allow you to amend/alter the empty (null) entry.

To AMEND/ALTER
Type: **A word1 word2**

The first entry in the table with word values of **word1** and **word2** is first copied to the input buffer and then will be displayed on the screen for amending/altering.

When RETURN is pressed the input buffer is assumed to be empty (in which case the existing entry is deleted), or to contain number of valid conditions, followed by at least one valid action. If there are no syntax errors, the existing entry is replaced with the contents of the input buffer. Any following entries in the table with the same word values (ie: **word1** and **word2**) are then displayed in turn for amending/altering in the same way.

The following tables contain all valid AdventureWriter
<u>Conditions and Actions</u>. These entries are used in building the
Vocabulary Action and Status tables.

CONDITIONS FORMAT

This particular table presents the required structure for conditions,
along with an explanation of actions and objects needed (or not needed)
for each condition satisfied.

loc* = specified location number   obj* = specified object number

CONDITION	EXPLANATION
AT loc*	Satisfied if the player is **at** specified location number
NOTAT loc*	Satisfied if the player is **not at** specified location number
ATGT loc*	Satisfied if the player is **at** a location whose number is **greater than** specified location number
ATLT loc*	Satisfied if the player is **at** a location whose number is **less than** specified location number
PRESENT obj*	Satisfied if the specified object is **carried**, **worn** or **at** the current location
ABSENT obj*	Satisfied if the specified object is **not carried**, **not worn** or **not at** the current location
WORN obj*	Satisfied if the specified object is **worn**
NOTWORN obj*	Satisfied if the specified object is **not worn**

CONDITION	EXPLANATION
CARRIED obj*	Satisfied if the specified object is currently **carried**
NOTCARR obj*	Satisfied if the specified object is currently **not carried**
CHANCE percent	Satisfied if **percent** is **less than** or **equal to** a random number between 1 and 100 created by the computer
ZERO flg*	Satisfied if the flag specified by **flg*** is **equal** to zero
NOTZERO flg*	Satisfied if the flag specified by **flg*** is **not equal** to zero
EQ flg* value	Satisfied if the flag specified by **flg*** is **equal** to the specified value
GT flg* value	Satisfied if the flag specified by **flg*** is **greater than** the specified value
LT flg* value	Satisfied if the flag specified by **flg*** is **less than** the specified value

ACTION FORMAT

Read this table to understand what actions may be incorporated into
your adventure.

loc* = location number flg* = flag number obj* = object number

ACTION		EXIT	DESCRIPTION
ANYKEY		No	Prints "Press any key to continue " and continues when a key is pressed
CLEAR	flg*	No	The specified flag number is set to zero
CLS		No	Clears the screen
CREATE	obj*	No	Changes the object location from "not created" to current location number
DESC		Always	Prints current location description
DESTROY	obj*	No	Changes specified object to "not created"
DONE		Always	Exits from the table
DROP	obj*	May	Causes a carried or worn object to be dropped
DROPALL		No	Causes all carried or worn objects to be dropped
END		Always	Ends the adventure
GET	obj*	May	Gets the specified object from the current location

GOTO	loc*	No	Changes current location to specified new location number
INVEN		Always	The list of objects currently carried is printed
LET	flg* value	No	The value of the flag specified is changed to the value specified
LOAD		Always	Loads a previously saved adventure with current position disk
MINUS	flg* value	No	The flag number specified is reduced by the value specified
MESSAGE	msg*	No	Prints the specified message
OK		Always	Prints "OK"
PAUSE	value	No	Pauses adventure for value/50 seconds
PLACE	obj* loc*	No	Puts specified object into specified location
PLUS	flg* value	No	The specified flag is incremented by the specified value
QUIT		May	Causes the question "Do you really want to quit now ?" to be displayed. If player response is "no" then the adventure will continue

Command	Param	Condition	Description
REMOVE	obj*	May	Changes a worn object into a carried object
SAVE		Always	Saves current position to disk or tape while running an adventure
SCORE		No	Prints player's current score
SET	flg*	No	Sets specified flag to 255
SOUND	frequency timing	No	Generates a tone. See pp. 103-104 for more specific information.
SWAP	obj* obj*	No	The locations of the specified objects are inter-changed
TURNS		No	Prints the number of turns a player has taken
WEAR	obj*	May	Causes an object that is currently carried to be worn

Editor Error Messages

Error	Meaning
I/O ERROR	Disk error. Note that an I/O ERROR during a LOAD means that the database is corrupt or the file is not found. Make sure you have the correct disk and reload the database until it is loaded successfully.
DATABASE FULL	There is not enough room in the database for what you are trying to do.
LIMIT REACHED	The maximum number of locations, messages or objects is already present.
I/P BUFFER FULL	The entry for Vocabulary Action, Status or Movement table is too large for the input buffer (very unlikely to occur). Shorten the entry.

NOTE: If an abnormally large entry is inserted in the movement table using abbreviations, (N 1 S 2 E 3 ...) and the abbreviations are deleted from the vocabulary, the movement entry, when decoded (NORT 1 SOUT 2 EAST 3 ...) could be too big for the input buffer. If this happens, an out of memory error will occur. To remedy this, reinsert the abbreviations in the vocabulary.

The Interpreter

The Interpreter controls the flow of the adventure. It reads what the player types in and tries to execute his commands. When a command is not understood, the Interpreter responds with a message saying that it does not understand. If a command cannot be executed, the Interpreter will respond with "I can't", or another more specific message.

The diagram below illustrates the program flow:

```
                    ┌─────────────┐
                    │ INITIALIZE  │
                    └─────────────┘
                            │
        ┌──────────────┐        ┌──────────────┐
        │     SCAN     │   →    │   DESCRIBE   │
        │  VOCABULARY  │        │   CURRENT    │
        │    ACTION    │        │   LOCATION   │
        │    TABLE     │        └──────────────┘
        └──────────────┘                │
   ┌──────────────┐ ┌──────────────┐ ┌──────────────┐
   │  LOOK UP W1  │ │   GET THE    │ │     SCAN     │
   │ IN MOVEMENT  │ │   COMMAND    │ │    STATUS    │
   │    TABLE     │ │              │ │    TABLE     │
   └──────────────┘ └──────────────┘ └──────────────┘
```
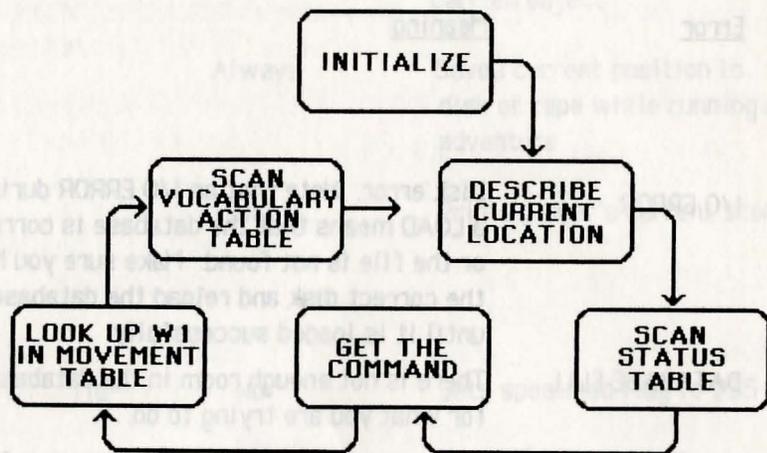
Initialize -

All flags are set to zero except for flag 1 which is set to the number of objects initially carried.

Describe Current Location -

The flags are examined by the Interpreter to determine what to print. The current location description is printed when the location is light or when object 0 is present.

If it is dark and object 0 is absent, the message "Everything is dark. I can't see." is printed.

Scan the Status Table -

The first entry in the Status table is examined, by the Interpreter; if the conditions are satisfied, the action(s) that follow will be performed: if not satisfied, the next entry in the table will be examined. This procedure repeats for each entry in the table or until an exit occurs.

Get the Command -

The Interpreter looks up the first four letters in the vocabulary text table and the values of the first two words found are stored in variables W1 and W2.

Look up W1 in Movement table -

The Interpreter searches the movement table for the current location to see if the word value in W1 is present. If it is , the current location is set to the value following W1 in the movement table.

Scan the Vocabulary Action Table -

The Interpreter looks at each entry in the table until it finds one that starts with (W1 and W2). When it finds a matching entry, conditions are checked and when satisfied, the actions are performed. This procedure is repeated for the remaining entries in the table or until an exit occurs.

The basic structure of the Interpreter has its origins in an article written by Ken Reed and published in the August 1980 issue of Practical Computing. Although the Interpreter in AdventurWriter now has little in common with the article, the terms used to describe it are similar to those used in the article.

Diagnostic Flags

Flags are just variables that hold numbers. The flags are numbered from 0 to 32. Some flags are controlled by the Interpreter and you, the designer, control the others.

Let's try a simple example. Suppose we want to know whether or not the player has gone to the beach before he gets to the dungeon (all in an imaginary Adventure). To do this, we take the following approach:

When the player gets to the beach, make variable 11 equal to 123. That way, when the player gets to the dungeon, all we have to do is look at variable 11. If it is equal to 123, then we know that the player has been to the beach. Here's how we would do it:

In the Status Table, we check if the player is at location 10, which is the beach:

```
CHEC  *      Conds  AT    10
             Acts   LET   11 123
                :
                :
```

Now, also in the Status Table, we check to see if we're at Location 33 (the dungeon) and if we've been to the beach:

```
CHK2  *      Conds  AT    33
                    EQ    11 123
             Acts
```

All flags start out with a value of zero until you or the Interpreter changes them. You can change any of the flags but the only ones that you totally control are 11-29. (The Interpreter doesn't have any effect on these). The other flags (0-10, 30-32) are affected in one way or another by the Interpreter. Let's examine each flag in detail:

Flag 0	When you set this flag to zero, the Interpreter assumes that it is light and will display the normal location description. When it is set to any other value, the Interpreter assumes it is dark and prints the message "Everything is dark. I can't see.", as a location description.
Flag 1	Holds the count of the number of objects carried.
Flag 2	Decremented by 1 or reduced in number each time a location is described.
Flag 3	Decremented by 1 each time a location is described and it is dark (Flag 0>0).
Flag 4	Decremented by 1 each time a location is described and it is dark (flag 0>0) and object 0 is absent.
Flags 5-8	Decremented by one each turn.
Flag 9	Decremented each turn when it is dark (flag 0>0)
Flag 10	Decremented each turn when it is dark (flag 0>0) and object 0 is absent.
Flags 11-29	Ordinary flags.
Flag 30	Holds the player's score and is printed when the action SCORE is performed. You enter the value in this flag.
Flag 31	Holds the turns count (low byte).
Flag 32	Holds the turns count (high byte).

NOTE: Flag 31 is incremented every turn. When it reaches 256, flag 32 is incremented and flag 31 is reset to zero. Then the process starts over again.

Let's use some flags in an example.
Suppose we want to print message 1 after the player has taken 10 turns, and then print message 2 after the player takes 7 more turns.

				Explanation
EXAMPLE *	Conds	EQ	31 10	– IF flag 31=10
		ZERO	32	– and if flag 32=0
	Acts	LET	5 7	– THEN set flag 5=7
		MESSAGE	1	– and print message number 1
				– ELSE
EXAMPLE *	Conds	ZERO	5	– IF flag 5=0
	Acts	MESSAGE	2	– THEN print message number 2

NOTE: When you test your adventure, you will have the option of seeing 36 flags displayed directly on your screen. You can see their values, and how and when they change, as you test your adventure. You must answer "yes" to the question "Do you want to see diagnostic flags?" in order to take advantage of this helpful testing aid.

The last three flags that are displayed are in reverse video. The first two hold the values of the two words that the Interpreter understands, (255=word2 does not exist or it is not in the vocabulary). The last flag holds the current location number.

AdventureWriter Sounds

Sounds are available for you to enhance your adventure further. The information below provides an introduction to possible effects.

NOTE	FREQUENCY	TIMING
A	47	9
A*	60	8
B	72	7
C	84	6
C*	95	6
D	105	6
D*	115	5
E	124	5
F	133	5
F*	141	5
G	149	5
G*	156	5
A	163	5
A*	169	6
B	176	6
C	181	6
C*	187	6
D	192	6
D*	197	6
E	202	7
F	206	7
F*	210	7
G	214	7
G*	218	8
A	221	8
A*	224	8
B	227	9
C	230	9
C*	233	10
D	236	10
D*	238	10

E	240	11
F	243	12
F*	245	12
G	247	13
G*	248	13

The following table gives values which will produce three ranges of a complete scale. For the timing values shown, the notes will last 1/2 second each.

For a "LOSE" sound:

```
SOUND   60   9
SOUND   60   9
SOUND   60   9
SOUND   95   5
SOUND   84   2
SOUND   84   6
SOUND   60   2
SOUND   60   6
SOUND   47   4
SOUND   60   18
```

For a "WIN" sound:

```
SOUND    84   1
SOUND   124   1
SOUND   149   1
SOUND   230   2
SOUND   240   2
SOUND   247   2
SOUND   181   1
SOUND   202   1
SOUND   214   1
SOUND   255   3
```

ADVENTUREWRITER CAPACITIES

Vocabulary – May be numbered from 1 to 254
Messages – May be numbered from 0 to 254
Location descriptions – May be numbered from 0 to 251
Object descriptions – May be numbered from 0 to 254

If you reach the maximum number of Vocabulary words, Messages, locations, or objects, then a "limit reached" message will be printed.

Caution: When creating an actual adventure, it is possible to run out of memory, which would cause an error in operation and likely corrupt your database. Use the option **O** from the Main menu every so often to see how much available memory you have left. For safety's sake, leave yourself plenty of space.

Glossary

Acts – The actions performed when all satisfied.

Conditions – The conditions necessary for an action to be executed.

Database – A large grouping of information, stored in memory or on disk. This database holds the information your adventure uses.

Editor – The program that allows you to create or change an adventure.

Filename – A name, made by typing letters of your choice, that the AdventureWriter will use to refer to your database or completed adventure. Remember this name. You'll need it to load your database or adventure once it's saved on disk or tape.

Flag – A variable capable of holding a number (0-255). Each flag itself is numbered 0-32. Flags are used for keeping track of things such as thirst, hunger, etc.

Interpreter – The program that takes the data you have created with the Editor and uses it to run the adventure.

Inverse – The effect of a word or character is printed out with a solid background and a negative foreground.

Menu – A list on the screen of various options you may take. To choose an option, type one letter that matches the command you want and press RETURN.

Null entry – Inserting a RETURN with nothing preceding may put a blank entry into the current table or description. An accidental null entry may be amended at any time. **Caution**: Your entry number may also be incremented.

Syntax error – Indicated by a ' ? '. An error due to misspelling, typing an invalid option, or an incorrect format.

Main Menu Glossary

**A . . Vocabulary –
Text**
The words (with their corresponding number) which the program will understand when the adventure is run.

**B . . Message –
Text**
This table will contain all messages whcih will be printed; based on conditons met during an adventure.
eg: I'm dying of starvation!

**C . . Location –
Descriptions**
The descriptions printed for each location. These are exact descriptions of each location which are entered at the beginning of the adventure creation.

**D . . Movement –
Table**
This table contains the relative positions of each location. The inter connections between all locations are entered in this table.

**E . . Object –
Descriptions**
This table contains the complete descriptive text required for each object. **Important**: Object O is **always** considered a source of light (eg: candles, flashlights, etc.). Remember this when creating your adventure.

**F . . Object –
Starting
Locations**
This table will contain the exact location of each object at the start of your created adventure. Entries cannot be inserted. When you insert object text for an object, the Editor automatically inserts an entry of " not created " for that object in the table.

**G . . Vocabulary –
Action
Table**
The table that you create to tell the Interpreter how to respond when a player types in a command.

H . . Status Table –
This table checks various flags and other information just before the Interpreter asks the player what to do.

**I . . Save A –
Database**
This options allows you to transfer your created database to disk

**J . . Verify A –
Database**
This option allows you to verify that your database was saved without errors.

**K . . Load a –
Database**
This option allows you to load a previously saved database from disk so that you may use the Editor either to examine or to change any information.

**L . . Test This –
Adventure**
Using this option, you may test a partially or fully completed adventure and return to the Editor.

M . . Save This –
Adventure

You would use this option to save a **fully completed** adventure. To save a partially completed adventure, you must use the option " I " – **Save a Database**.

N . . Verify This –
Adventure

Use this option to check that the adventure was saved without errors.

O . . Memory –
Available

This option will display the amount of unused memory left for you adventure.

P . . # Of Portable –
Objects

With this option you may set the maximum number of objects (torches, keys, food, etc.) a player may carry at one time.

Q . . Adventure –
Writer Messages

With this option, you may examine or alter AdventureWriter messages. These are pre-set messages which cannot be added to or deleted from.

✚ . . Return To –
BASIC

Use of this option will cause an exit from the Editor program an place you in BASIC.

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