

NBSIR 87-3562

FIREDOC Users Manual

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Gaithersburg, MD 20899

September 1987



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ERRATA

FIREDOC USERS MANUAL, NBSIR 87-3562 by Nora H. Jason has the following changes:

Add to Figure 1. STAR Main Menu, p. 4

Select Terminal Driver TV95X . [For most users this has been the best driver; it is not necessary to reconfigure your communications software.]

Correct Section 3.4 Search Numbers in the Search Expression

p. 9

S11 17. (WOOD OR WATER) AND JT=FIRE ADJ TECHNOLOGY
^745 ^737 ^5836 ^832 [The qualifier expressions, e.g., JT,
ALWAYS MUST go last; if you get zero entries on a search
line, reverse your search strategy and it should improve!]

Correct Section 3.5, Wildcard Characters in the Search Expression, p. 9

The "wildcard" is now a *

Correct Section 3.9, Displaying the Search Results, p.12

It is NO longer possible to view a few references, you must request the entire set in the Command column.

The up and down arrow keys are used to move the references that are being DISPLAYED.

When viewing the set, a <CR> will NOT advance you to the next reference, it will place the most recently viewed reference, in its entirety, on the screen.

There is a fourth display/print format (add to p. 13):

PUBL = Author(s); title of work; corporate source; sponsor(s);
date of publication; journal title; report number; Library
of Congress book number; distribution; order number; language;
contract number.

Correct Section 3.11, Obtaining Printed Copies of Search Results, p.14

2. Check Format options .. Correct first line to read:

Move the cursor to the "Disk File Name" field. You will see a ...

Same paragraph, six lines down, correct the line to read:

.LST, must be no more than five alphanumeric characters ...

HOW TO SAVE YOUR SEARCH RESULTS and HOW TO EXIT PROCMM, p. 30

2. PgDn delete the <CR>

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NATIONAL BUREAU OF STANDARDS, Ernest Ambler, *Director*

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FIREDOC USERS MANUAL

Nora H. Jason

Abstract

FIREDOC is the on-line bibliographic database which reflects the holdings (published reports, articles, books, and audiovisual items) of the Fire Research Information Services (FRIS), at the Center for Fire Research, National Bureau of Standards. This manual provides a step-by-step technique for entering and exiting the database via telecommunication lines, as well as a number of techniques for searching the database and processing the results of the searches.

Key Words: information retrieval; fire research; information dissemination; databases; manuals

1. INTRODUCTION

FIREDOC is the on-line bibliographic database which reflects the holdings (published reports, articles, books and audiovisual items) of the Fire Research Information Services (FRIS), at the Center for Fire Research, National Bureau of Standards. Each holding in FIREDOC consists of the usual bibliographic information including the title, author, FRIS accession number and keywords and abstract (if available) or identifiers. The database may be searched for the occurrence of words, terms, or names in the bibliographic information. The number of occurrences is reported and the bibliographic information for these occurrences may be listed. The FIREDOC database currently contains information only on recent accessions out of the total of the over 25,000 holdings in the FRIS collection. All new additions to the collection are being added to the database and there is an ongoing effort to incorporate existing holdings. This manual provides the instructions necessary to access FIREDOC, which also includes an alphabetized vocabulary list (or index, see Section 3.6) previously assembled in a separate report (ref. 1).

FIREDOC resides on an Alpha Micro* computer using the bibliographic search program STAR. The system includes a number of direct connect terminals at the Center for Fire Research and a telephone line with a 1200 baud modem. Telephone line users will normally communicate with the FIREDOC system using a personal computer and a compatible communications package such as: AlphaMATE, Softerm PC, or ProComm. The last two software packages have a TeleVideo 950 terminal emulator, which is required for compatibility with the STAR software. If other communications packages with a Televideo 950 emulator are successful, please let the author know. All communication costs will be absorbed by the searcher. FIREDOC is normally available for bibliographic searching 23 hours a day 7 days a week. FIREDOC is not available from 8:30 to 9:30 AM EST or EDT when maintenance is performed on the system. Assistance is available by contacting the author at 301/975-6862 during regular working hours (8:30 AM - 5 PM EST or EDT) or in writing.

This manual covers the techniques for using the STAR system to search the FIREDOC database. Appendices D - F contain the information necessary to set up each of the three communications packages and to logon and logoff the Alpha Micro computer.

*Within this paper, certain commercial equipment, software, and/or tradenames are included solely for the purpose of identifying those computer hardware and software products with which compatibility is required or has been verified. This identification does not imply recommendation or endorsement by the National Bureau of Standards.

2. SELECTING A COMMUNICATIONS PACKAGE

Three communication packages have been identified as working with the STAR search program. Other communication packages which emulate a Televideo 950 terminal probably will be satisfactory. By using these examples in the Appendices, the user should be able to adapt other software. The communication packages are:

a. AlphaMATE. A proprietary communications package designed specifically for use with the STAR system. AlphaMATE will operate on IBM PC, XT, AT and compatible computers with a monochrome display adapter. It works best with a stand-alone modem and telephone handset. This package with complete documentation must be obtained from Cuadra Associates, Inc., 11835 W. Olympic Blvd., Los Angeles, CA 90064 Telephone: 213/478-0066. The cost is approximately \$100.

b. SOFTERM PC. A proprietary communications package which may be used with the STAR system. SOFTERM PC will operate on IBM PC, XT, AT and compatible computers and supports Hayes and compatible modems. The software may be obtained from Softronics, 7899 Lexington Dr., Suite 210, Colorado Springs, CO 80918 Telephone: 303/593-9550. The cost is approximately \$110.

c. ProComm. It is a user supported product communications package which may be used with the STAR system. ProComm will operate on IBM PC, XT, AT and compatible computers and supports Hayes and compatible modems. This package may be obtained from many electronic bulletin board systems and you are granted a limited license to use this product on a trial basis. If you wish to continue using the product you must register with Datastorm. For complete information, contact Datastorm Technologies, Inc., P. O. Box 1471, Columbia, MO 65205 Telephone: 314/449-9401. The cost is approximately \$35.

3. USING THE SEARCH PROGRAM

When you have successfully logged into STAR with the communications package of your choice (see Appendices D - F for instructions), you are ready to do a bibliographic search. The STAR program consists of two primary screens, the STAR Main Menu (Figure 1) and the STAR Search screen (Figure 2).

```
STAR Main Menu                                Database: _____
*****
Functions:
    1 Database Definition
    2 Data Entry
    3 Search and Report
    4 Global Change
    5 System Management

Type END to terminate STAR

*****
Command: Enter command or number of function to be performed
Help End Database
```

Figure 1. STAR Main Menu

Each screen contains a command line near the bottom, below which there are one or two lines listing acceptable commands. In all communications packages, except AlphaMATE, the second line of acceptable commands is not visible. However, you only use two of the commands: MENU or INDEX. These commands are discussed later.

Throughout this document several special keys on the personal computer keyboard will be referred to by their common abbreviations. For example, the symbol <Enter> is used to indicate pressing the enter key. A list of selected special keys can be found in Appendix C. The numbers preceding the commands are used to indicate the input sequence and should not be entered. Entries may be in either upper or lower case.

The cursor should be at the command line on the STAR Main Menu. To start your search, type:

1. 3 <Enter>

The other options on this menu will not work with your password. The response is the STAR Search screen with the cursor located at the position Database. Type in:

2. FIREDOC <Enter>

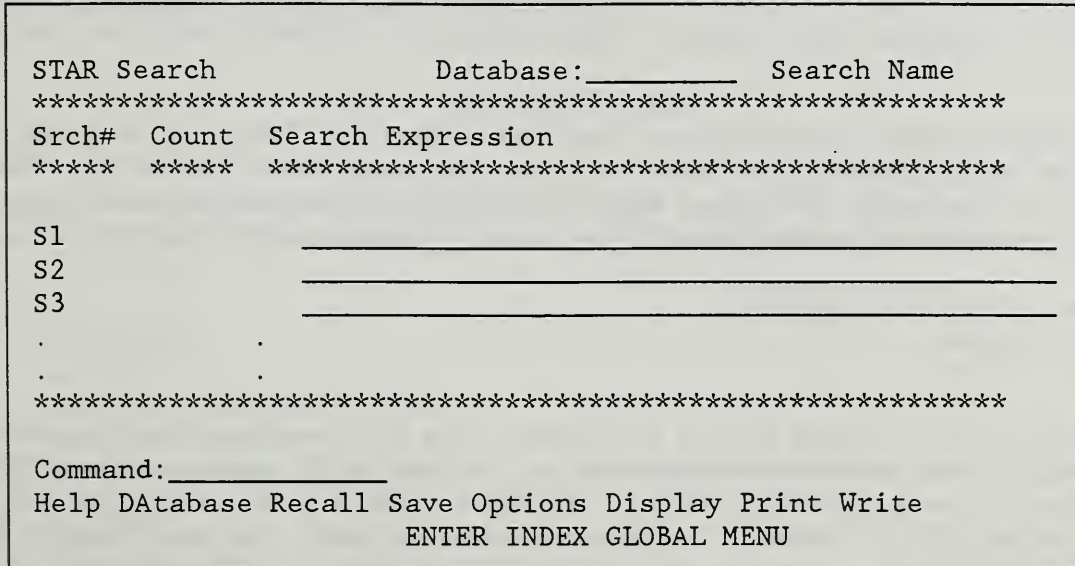


Figure 2. Partial Search Screen

Lines S1 through S8 may be drawn or indicated by a few underline bars; it depends upon how the communications package you are using interprets the STAR screen write commands. The cursor moves to the line S1 and you are ready to begin a search. Before discussing the search procedures one should know how to exit STAR, do read Section 3.7. In addition, one must know how to leave the program. See the Appendix which contains the information about your communications package. It is essential that you know how to do the complete logoff procedure.

3.1 Conducting a Search

The main search screen contains a header at the top with the database name which you have already filled in. In the center of the screen are S1 to S8 which are the search numbers. You will enter search expressions next to these numbers. The bottom of the screen contains the command line and two menus of acceptable commands. The use of these commands will be discussed later. You will notice that the cursor is now positioned next to S1 and is ready to accept a search expression.

Each search expression is limited to one line (60 characters). If you go beyond the end of the line, the cursor automatically returns to the beginning of the line. Search expressions which require more than one line can be

accommodated using search numbers in the search expression which will be discussed later. To conduct a simple search,

```
WOOD      <Enter>
```

(Caution: This is a fire research database. To avoid long delays, using the word FIRE or FIRES should be avoided. If you want information on fire detectors, you may use DETECTORS. If you have initiated an improper search, press CTRL C to abort the search. Other types of searching will be discussed later.)

You will see the search in progress, and the number of "hits" or records in the database which contain the word will be displayed under the word. When the search is completed the total number of hits will appear in the Count column. An example of a portion of the search screen is shown below.

```
Srch# Count  Search Expression
S1      434   WOOD
          ^434
```

The numbers on your screen may be different from the examples in this document as the size of the database changes daily. As you might expect, there are a large number of records which contain the word WOOD and you would normally not want to display all of these. In the following sections we will discuss how to narrow your search. Note at the completion of your search expression the cursor has moved to search number S2. To conduct another search type in another word for example WATER. A sample of a portion of the search screen is shown below.

```
Srch# Count  Search Expression
S1      434   WOOD
          ^434

S2       73   WATER
          ^73
```

Although you have moved to your second search, the program retains the information about your first search. The program can store information on up to 24 searches at one time. You can see the other searches by using the arrow keys or the PgDn and PgUp keys. PgUp and PgDn cannot be used with ProComm. Note that only the search information moves and the top and bottom of the screen remains fixed.

If necessary, STAR can be expanded to 100 search lines. Before starting the search, press the key marked Esc which moves the cursor to the command line. In the command line type: R BIGSEARCH <Enter>. You will now have 100 search lines at your disposal.

You may edit and rerun search expressions by using the arrow keys to move to a particular search and make corrections. Using the left and right arrow to move across search expressions does not change the characters. The keyboard is normally in the typeover mode, that is new characters will replace old

ones. For example, move the cursor to S1 and using the right arrow key to position the cursor over the W in WOOD. Type a F and the W will be replaced by an F. Now type a <Enter> and search S1 will be rerun using the word FOOD.

There are several additional keys which are useful for correcting or modifying search expressions. The character under the cursor may be deleted using the Del key or a space may blank out characters. The character to the left of the cursor may be deleted using the backspace key.

3.2 Searching Fields

The information stored in the database for each record or document is separated by fields. The available fields and their abbreviations are given below.

AB	abstract
AU	author
BC	book or conference title
CN	contract number
CS	corporate source, or where the author(s) work
ED	editor
ID	identifier(s) (similar to a keyword)
JT	journal name
KW	keyword(s)
LA	language (other than English)
ON	order number for report
PL	place of meeting
PUB	publisher
PY	year of publication of the work
RN	report or book number
SP	sponsor, or who paid to have the work done
TI	journal article or report title ONLY

Unless otherwise specified, only the title, abstract, identifier and keyword fields are searched. The search fields may be specified in either of two ways as illustrated by the following searches.

Srch#	Count	Search Expression
S3	96	TI=SPRAYS ^96
S4	96	SPRAYS/TI ^96

Both of these searches are the same and the search for the word SPRAYS is limited to the title field.

3.3 Boolean Operators and Parentheses

The system supports the Boolean or logical operators AND, OR, and NOT. A discussion of Boolean operators is contained in APPENDIX A. For example, try the following search expressions:

Srch#	Count	Search Expression
S5	22	WOOD AND WATER ^434 ^73
S6	485	WOOD OR WATER ^434 ^73

The S5 count shows the number of records in which both WOOD and WATER occur and the S6 count the number in which either WOOD or WATER occur. The numbers under WOOD and WATER show the number of records in which each word appears. Searches may be further defined by using Boolean operators and parentheses. For example, try the following search:

Srch#	Count	Search Expression
S7	1	WATER AND (COMPARTMENTS OR ROOMS) ^73 ^21 ^89

In this case the S7 count shows the number of records in which WATER can be found along with either COMPARTMENTS or ROOMS. Boolean operators and parentheses also may be combined with fields as shown in the following examples. To increase the precision of the search, use the Adjacency feature. That is, use the ADJ operator to indicate that the two words should be next to each other. Several examples follow. In S8 and S11 we are interested in information from the journal called Fire Technology; in S9 we are interested in information about carbon monoxide.

Srch#	Count	Search Expression
S8	46	JT=(FIRE ADJ TECHNOLOGY) ^488 ^77

Following the <Enter> after search S8, the screen will scroll up for each succeeding search until S24 is reached (or S100 if you requested BIGSEARCH).

S9	4	(CARBON ADJ MONOXIDE) AND TOXICITY/TI ^63 ^23 ^74
----	---	--

The count for search S8 shows the number of records with both FIRE and TECHNOLOGY in the journal title field. The count for S9 shows the number of records in which CARBON MONOXIDE appear in either the title, abstract, identifier or keyword fields and TOXICITY appears in the TITLE field.

3.4 Search Numbers in the Search Expression

Search numbers may be used in the search expression to accommodate long search expressions or as a means of narrowing a previous search. For example, try the following search using S8 and S6 from above.

Srch#	Count	Search Expression
S10	13	S8 AND S6 ^46 ^485

This would be equivalent to:

Srch#	Count	Search Expression
S11	13	JT=(FIRE AND TECHNOLOGY) AND (WOOD OR WATER) ^488 ^77 ^433 ^73

You may use any combination of previously used search numbers along with search statements. For example, try the following search.

Srch#	Count	Search Expression
S12	2	S8 AND KW=TOXICITY ^46 ^89

3.5 Wildcard Characters in the Search Expression

The character # (known as the pound, number or hash symbol) may be used as a wildcard character (sometimes called a truncation or global character) at the end of a search word. NEVER USE THE WILDCARD CHARACTER AT THE BEGINNING OF A WORD. The use of this character indicates that a hit will occur when any character or string of characters is present in its place. The wildcard character is most commonly used to search for a word in both singular and plural forms and to search for authors whose names may be incomplete. It should be noted that the entire author's name, including initials, is considered as a single word. Therefore, searching the author field for a last name without initials and without the wildcard character will generally result in no hits. The best results for searching an author's name is to use the last name, followed by a comma, a space, and the first initial followed by the wildcard symbol, as the second initial is not always used. For example, try the following searches.

Srch#	Count	Search Expression
S13	120	SPRAY# ^120
S14	16	AU=LEVIN# ^16
S15	13	AU=LEVIN, B# ^13

Search S13 will find the records with any word or combination of words beginning with SPRAY in the title, abstract, identifier or keyword fields. Search S14 will find the records with authors whose names begin with LEVIN and S15 the records with authors with the last name of LEVIN and the first initial of B. The space after the comma is significant because the author's name is always entered with the space. Try the following search.

Srch#	Count	Search Expression
S16	0	AU=LEVIN,B# ^0

Additional information on searching the author field is presented in the next section.

3.6 Using the Index Feature

The index (or directory) contains an alphabetized list of all of the searchable words in the database along with the field in which the words appear. As you might expect, this is a rather large list. The index command allows one to examine selected parts of this list for searchable words.

Use of the index command is made when a search fails to turn up the expected number of hits. By using the index feature you may examine the searchable words in the database and revise the search strategy. To initiate the index feature, press Esc to move to the command line and type:

```
INDEX      <Enter>
```

The STAR Index screen is drawn and you are looking at the beginning of the index. The Home and End keys move the display to the top or bottom of the index. The PgUp and PgDn keys move the index display one screen up or down. PgUp and PgDn cannot be used with ProComm. The up and down arrows start the index display scrolling up or down. To stop the scroll, press the opposite arrow key. You may notice that the index contains numbers and symbols as well as words. There are two commands, Near (N) and Field (F), which allow one to look at a part of the index of interest. The near command shifts the index display to the area of a given word. For example, try:

```
N FIRE     <Enter>
```

The index display moves to those words near fire. The left side of the display shows the field in which the word is found. The Fields command limits the display to selected fields. For example, try:

```
N LEVIN    <Enter>
```

```
F AU       <Enter>
```

The first command displays words near the word LEVIN and the second command limits the display to the author field only. We now only see the authors whose names are near LEVIN. The Fields command with no fields indicated

returns all fields. If a display is taking too long to create, you may abort the procedure by pressing Esc.

To return to the search screen, type:

SEARCH <Enter>

or 3 <Enter>

3.7 Using the Command Line

The command line at the bottom of the screen is used to enter commands to the STAR program. To move the cursor to the command line, press Esc. The statement Enter Command will appear. The cursor can be moved back to the search line with an Esc. Thus the Esc acts as a toggle between the search and command lines. A <Enter> is not required after the Esc key.

Below the command line are two menus of acceptable commands. The commands in the first menu line are in upper and lower case and only the upper case letters should be typed to initiate these commands (e.g., Help, Database, Recall, Save, Options, Display, Print, Write). The commands in the second menu line are all upper case and the entire command must be typed to initiate these commands (e.g., ENTER, INDEX, GLOBAL, MENU). (REMEMBER, this line may not be visible with your communications package.) When you move to other screens in the STAR program, different menus will appear.

To enter a command type the uppercase part of the command name followed by a <Enter>. Some commands have optional fields after the command name.

The ENTER and GLOBAL commands are for use in maintaining the system and the screens generated with these commands cannot be used with your password. The MENU command returns you to the STAR Main Menu. ****WARNING!**** When you return to the STAR Main Menu all of the search expressions you have entered will be cleared. You may want to wait and try this command later in your session.

The INDEX command is discussed in Section 3.6.

The Help command (type H <Enter> and then one <Enter>) provides instructions and guidelines on how to use the STAR program. Type E to return to the main search screen. The Help command on some of the screens discussed below has not been implemented and results in no action.

The Database command (type DA <Enter>) is used to select another database. Since you will be using only one database, FIREDOC, and you have already entered the name, the use of this command is not necessary.

The Print command should ****NEVER**** be used. This will cause the program to go into an endless wait to send a command to a nonexistent printer. To cancel the command, press CTRL C . See Section 3.11 for a discussion of how to obtain a printed copy.

The rest of the commands will be discussed in the following sections.

3.8 Saving and Recalling Searches

The search expressions created in a session may be saved in a file on the Alpha Micro computer for use at a later time. The program saves only the search expressions and not the search results. To save a search session, move to the command line and type S followed by a title (maximum of six alphanumeric characters) you wish to give the search and a <Enter>. You may later recall the search by this title so be sure to make a note of it. If you type S and no name, the program will ask for a search name and place it in the upper right corner of the screen. Because of the limited space available in the computer, all saved searches will be deleted by 9:00 AM each Friday. After saving the current search expressions you may clear the current search by returning to the STAR Main Menu and then typing 3 <Enter> to begin a new session with S1. An example save command is:

```
S SMITH1      <Enter>
```

To recall a previously saved search session type R followed by the name with which it was saved. This will clear any existing search expressions and retrieve the saved expressions. An example recall command is:

```
R SMITH1      <Enter>
```

The search will scroll through on the screen and then return to the top of the search screen.

3.9 Displaying the Search Results

The Display command is used to list on the screen the references or hits from a search expression. Remember that it may take some time to display a large number of hits (shown in the count column) so try this with a small number first (less than 20). Move to the command line by pressing the Esc key and type the following display command to view the first five hits from search S10 above.

```
D S10,1-5 BIB1      <Enter>
```

The D in the command is for Display, the S10 the search number, the 1-5 indicates the first five hits or records are to be displayed and BIB1 is the format of the display. The screen will be redrawn and the information for each of the hits in the search will be written on the screen. (To continue Display in ProComm, you may have to hit the <Enter> key twice.) You may pause the display by typing a <Enter> and resume the display by typing another <Enter>. To abort the display type E <Enter> while the display is paused. The use of some communications packages will result in the display pausing at the end of each screen. To continue, press the <Enter> key twice. From time to time you may see a line full of the symbol ^^^ in the display. This indicates the end of a page. When the display is complete, the cursor moves to the command line. To return to the search screen, type E for End.

There are three formats and the information which would be displayed for each is given below.

BIB1 = Title of work and book/conference proceeding title
if appropriate

BIB = Author(s); title of work, journal title, report
number, pages, publication date.

BIB2 = Author(s); title of work; date; corporate
source(s); sponsor(s); date of publication, journal title;
report number; Library of Congress book number; keyword(s);
identifier(s); abstract.

With some practice you may be able to shorten the display command using the following rules. If you omit the number of records to be displayed, then all of the hits will be displayed. If you omit the format then the most recent format you have selected will be used. If it is the first display, then BIB1 is used. If you type D only then all hits of the most recent search will be displayed and the most recent format you have selected will be used.

3.10 Using the Options Command

The Options command is used to examine the display and to write and to modify the formats if desired. To view the options screen, move to the command line and type O <Enter>. An example of the options screen is shown below.

Record Set

Records to include: S13

Format

Record format name: BIB1

Output fields: TI BC

Sort fields

Pagelayout name: SORTBIB1

Header text: SMITH 01/01/86 13:30

Destination

Print output on printer name:

Write output in print file: SMTH1.LST

Using the cursor movement keys, the display options may be displayed as desired. The "records set" is the number of the search expression. The

record format name may be either BIB1, BIB or BIB2. If record format is to be changed, type in the new format and the output fields will change to reflect the new format. The "sort fields" should remain blank and the "pagelayout" name should remain SORTBIB1. The header name will be included at the top of each displayed or printed page and may be modified as desired. The printer name refers to a printer connected directly to the Alpha Micro computer and cannot be altered. The print file name will be discussed in the next section.

To return to the search screen, move to the command line and type:

E <Enter>.

3.11 Obtaining Printed Copies of Search Results

The Write command (not Print!) is used to obtain a printed or disk copy of the search results. The STAR program contains no direct provision to log the display directly to the PC's printer or disk. To obtain a printed copy of the search results, you must write the search results to a file on the Alpha Micro Computer, remove the control characters from that file, transfer that file to your PC and print out that file. The following steps must be followed to obtain a printed copy of the search results.

After you have completed a search expression and you want printed results, press Esc to move the cursor to the command line and enter the Options command. Type

1. 0 <Enter>

As discussed in the options command section, ensure that the proper search and format have been selected.

2. Check format options

Move the cursor to the "Write output in a print file" field. You will see a file name which begins with your user ID followed by .LST. The search results should be sent to a unique file name. Normally one will use his/her surname or some variation. For example, if your user ID is USER when you first look at the options screen, the file name USER.LST will appear. If your surname is SMITH you might use SMTH1.LST. The file name, that is, that part before the .LST, must be no more than six alphanumeric characters (letters and numbers). If several sets of search results are sent to the same file the results will be stacked in the file. Normally these files will be deleted each Friday so you may reuse your file name each week. If you need to write to a file several times in a week then you should vary the file name. Be sure you note the file names you have used as you will need to know them later. When you have completed the options you wish to change, press Esc to return to the command line.

3. Write output

To write the search results to a file, press Esc to go to the command line, then type W <Enter>. The program will display the status of the writing and the cursor will return to the command line when it is complete. Writing the results of a search is different than saving the search expressions with a Save command. The Write command writes the information which you see using the Display command to a file, while the Save command retains the search expressions in a file for retrieval with the Recall command.

When the writing is complete, type E <Enter> to return to the search screen. If you wish to conduct any additional searches, to save your search expressions or to display or to write your search results, these activities should be completed before moving to the next step which will clear all of your search expressions.

4. E <Enter>

Move to the command line and type MENU <Enter> to return to the STAR Main Menu.

5. MENU <Enter>

Type END <Enter> to exit STAR.

6. END <Enter>

The response is STAR TERMINATED and a period.

You must now remove the control characters from the file you wrote to before transferring that file to your PC. To remove the control characters you will use the routine CLNCPY the general form of which is shown below.

CLNCPY newfilename=oldfilename

In your case the oldfilename is the file name you wrote to, which in the example above was SMTH1.LST. The newfilename should be the same as the oldfilename with TXT substituted for LST. In our example the command becomes:

7. CLNCPY SMTH1.TXT=SMTH1.LST

The response is:

Copying SMTH1.LST to SMTH1.TXT

Copy complete. X control characters removed.

Where "X" is the actual number of control characters removed. At the period, go to the appropriate Appendix for your communications package and follow the instructions listed there to download the file into your computer for editing and/or printing.

4. TROUBLESHOOTING

1. If, when you first try to log on to the Alpha Micro, you receive a series of strange characters, check the communications parameters and modem type carefully.
2. If you have entered STAR with the wrong terminal driver installed, the screens may be displayed in an unreadable manner. To exit STAR, and reset the driver, press Esc, then type MENU <Enter>, and then type END <Enter>. However, you will not be able to see the correct system responses until you have exited STAR. A period will appear and the proper driver command can be entered.
3. If you receive a message that the STAR system is not active, and it is within the operating hours schedule, the system needs to be activated. Telephone 301/975-6860 and inform the FRIS staff of your problem.
4. If, during a session, the screen begins to flash and you cannot read the display, the communications program is out of synchronization with STAR. Although this rarely happens, it is possible to synchronize the two programs by returning to the STAR Main Menu, then to the STAR Search, and back to the STAR Main Menu. You will, however, clear the searches you have already entered.
5. If you have initiated an improper search, for example #WOOD, the system will attempt to search the entire database for a "match". To stop the search, press CTRL C.
6. If you are in ProComm and the Display is not advancing, press the <Enter> key twice.

5. ACKNOWLEDGEMENTS

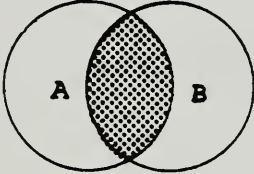
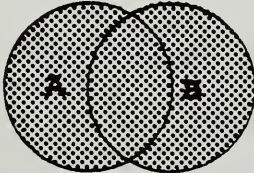
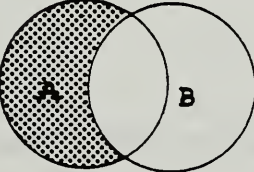
Special appreciation and recognition is due Mr. W. Douglas Walton. His tireless efforts and extensive user tests have been of enormous value to me in developing a manual that conveys the intricacies of using FIREDOC in a simple and concise manner. Emil Braun's contribution also must be highlighted as he asked the "right" question and made remote access a general feature. The efforts of other CFR and NBS staff also are gratefully acknowledged. The pilot study groups also must be commended for making the time available to participate in the studies to identify the problem areas. Current and future users of FIREDOC will greatly benefit from their conscientious colleagues.

6. REFERENCES

1. Jason, N. H. FIREDOC Vocabulary List, 2nd Edition. NBSIR 87-3545. Nat. Bur. Std. (U. S.) 1987.

APPENDIX A: BOOLEAN OPERATORS

You may use the three Boolean operators: AND, OR, NOT. Their function is depicted in the Venn diagrams noted below.

Search Expression	Venn Diagram	Explanation
A AND B		the shaded part represents those records that contain BOTH terms
A OR B		the shaded part represents those records that contain EITHER term, including records that contain both terms
A AND NOT B		the shaded part represents those records that contain TERM A but not TERM B.

APPENDIX B: ABBREVIATIONS, COMMANDS, DISPLAY/PRINT FORMATS

Search field abbreviations:

AB abstract
AU author
BC book or conference proceeding
CN contract number
CS corporate source, or where the author(s) works
ED editor
ID identifier
JT journal title
KW keyword
LA language (other than English)
ON order number
PL place of conference
PUB publisher
PY year of publication of work
RN report or book number
SP sponsor, or who paid to have the work done
TI title of report or journal article

Commands:

To move to the command line, press Esc

To clear all search expressions, type the command MENU <Enter>.

A Sample display command is: D S1,1-5 BIB

To pause and restart the display, use a <Enter>.

To abort the display, press Esc, and then type E <Enter>.

Display/Print formats. [These are unique groupings, solely for this purpose.]

BIB1 = Title of work and book/conference proceeding title
if appropriate. [It appears as: TI BC]

BIB = Author(s); title of work, journal title, report
number(s), page(s), publication date. [It appears as:
AUSB/B[5,60] AUTT TI CITE CITER CITEC DI ON]

BIB2 = Author(s); title of work; date; corporate
source(s); sponsor(s); date of publication,
journal title; report number(s); Library of Congress
book number; who can access the document; order number;
language, if not English; contract number; keyword(s);
identifier(s); abstract. [It appears as:
AUSB/S[5,60] AUTT TI CITE CITER CITEC DI ON LA CN KW ID AB]

APPENDIX C: DESIGNATION AND USE OF KEYS ON PC KEYBOARD

FUNCTIONS KEYS

<u>Key</u>	<u>Name</u>	<u>Operation</u>	<u>Resultant Action(s)</u>
Enter	enter or carriage return	press	enters command; moves to return to following line
ESC	escape	press	moves cursor to command or search line; aborts search procedure
Home	home	press	moves Display to top of list (index)
Alt	alternate	press	
Ctrl	control	press	
End	end	press	moves display to bottom of list (display)

EDITING KEYS

<u>Key</u>	<u>Name</u>	<u>Operation</u>	<u>Resultant Action(s)</u>
Del	delete	press	deletes character under cursor
Backspace	backspace	press	deletes character to left of cursor
PgUp	page up	press	moves display one page up (not in ProComm)
PgDn	page down	press	moves display one page (not in ProComm)
	down arrow up arrow left arrow right arrow	press	moves cursor in direction noted

APPENDIX D: AlphaMATE PROCEDURES

AlphaMATE is a proprietary communications package designed specifically for the STAR system using IBM PC, PC XT, PC AT and compatible computers with monochrome display adapters and some color display adapters. This package with complete documentation may be obtained from Cuadra Associates, Inc., 11835 W. Olympic Blvd., Los Angeles, CA 90064. Telephone: 213/478-0066. A summary of the operating features is included here with the login procedure for the FIREDOC system.

The AlphaMATE program consists of two files, AMATE.EXE and AMATE.HLP. These two files must be in the default drive and directory before starting the program. AlphaMATE may be run from a floppy or hard disk and there are many possible ways to install the program. For example, once the computer is turned on and the operating system is installed, set the current drive to A by typing A: and pressing <Enter>. Then insert the AlphaMATE disk in drive A and you are ready to begin. Note that the backspace key may be used to correct typographical errors. To start AlphaMATE, type:

1. AMATE <Enter>

The response is...AlphaMATE - AMOS to MS-DOS Communications... followed by the AlphaMATE Main Option Menu, Figure 3. (NOTE, all computer responses are underlined.)

```
AlphaMATE - AMOS to MS-DOS Communications
Version 1.0(109)
Copyright (C), 1984 by Alpha Microsystems Inc.

AlphaMATE Main Option Menu

Alt F10 - Display AlphaMATE Help Screen at any time
Alt F9  - Switch between this menu & AMOS Operating System
Alt F8  - Copy TEXT file from MS-DOS to AMOS
Alt F7  - Copy TEXT file from AMOS to MS-DOS
Alt F6  - Copy BINARY file from MS-DOS to AMOS
Alt F5  - Copy BINARY file from AMOS to MS-DOS
Alt F4  - Set communications parameters
Alt F3  - Exit to MS-DOS

Press Alt key and Function key to select an option
```

Figure 3. AlphaMATE Main Option Menu

To obtain the AlphaMATE Set Communications Parameters screen, press:

2. Alt F4

and change the parameters to:

8
NONE
1
1200

The highlighted characters are the current selection. Use the TAB key to change the selection and a <Enter> to move to the next parameter. The procedure may be repeated if a mistake is made. The communications parameters must be set each time you use AlphaMATE since it does not save the selections. When all of the communications parameters have been selected you are returned to the AlphaMATE menu. Press:

3. Alt F9

The response is:

Welcome to the Alpha Micro Operating System, AMOS

At this point the AlphaMATE program is ready to communicate. The next step is to dial the computer.

4. 301/948-4997 or 301/948-4998

If you normally dial modem calls with a telephone set, then proceed to dial the number. If your modem supports autodial, you can directly type in the command to your modem to dial the number. Refer to your modem manual for instructions concerning this command. AlphaMATE does not contain an automatic dialing directory. The modem on the AlphaMicro computer supports Bell 212A and Vadic 3400 series 1200 baud protocols.

When your modem acknowledges a carrier, you are connected to the AlphaMicro. A period [.] will appear on the screen. At this point, type:

5. LOGIN <Enter>

The response is Log in Please
USER ID:

If the computer responds with Login Please repeat step 5.

6. Type the assigned USER ID <Enter>

The response is Password:

7. Type the assigned Password <Enter>

THE TYPED PASSWORD WILL NOT APPEAR ON THE SCREEN.

If you entered an invalid password, repeat step 6.

At the next period you must select the correct driver. If you have a monochrome monitor, then you type:

8. DRIVER AMWS

If you have a color monitor, then you would type:

9. DRIVER AMWSC

The response, Already AMWS, (or, if you have a color monitor, the response is Already AMWSC) indicates the AMWS driver is installed. At the next period, type:

10. STAR <Enter>

The response is STAR Version ...
Enter Password for...

11. Enter your assigned password <Enter>

You are now in the STAR program at the Main Menu, Figure 1.

HOW TO SAVE YOUR SEARCH RESULTS and HOW TO EXIT AlphaMATE

You have completed your search and you have successfully removed all of the control characters from the search (see Section 3.11). You are now ready to download it onto your personal computer. At the period, press:

1. Alt F9

The response is the AlphaMATE Main Options Menu.

From the AlphaMATE Main Menu, select the function to copy a test file from AMOS to MS-DOS. Press:

2. Alt F7

At the bottom of the Menu you see the question: Enter filename to transfer. Here you enter the name of the newfilename you created earlier. In our example to transfer file SMTH1.TXT to Disk B: on your PC the response would be:

3. Enter filename to transfer:B:SMTH1.TXT <Enter>

The response is:

tows B:SMTH1.TXT

Transfer file from AMOS to MS-DOS 1.0...

.....[the number of dots reveal the file size]

MS-DOS has received the file SMTH1.TXT

Press any key to return to AlphaMATE

If Disk B is not available, a message Abort, Retry, Ignore? will appear. Respond accordingly.

The appearance of the dots show the transfer in progress. Each dot represents the transfer of 128 bytes.

To direct the destination of the file, you may include your PC's drive and path names along with the filename. If no drive or path name is given, the current drive and directory are used. Remember, if you have another file in the destination drive and directory with the same name as the one being transferred, the old file will be deleted. If you have several files to transfer, repeat steps 7 through 10 for each file.

You are now ready to log off of the Alpha Micro computer and print out the search results. Type any key to return to the AlphaMATE Main Menu and press:

4. Alt F9

The response is a period. Type:

5. LOGOFF <Enter>

At this point be sure to hang up your modem since the Alpha Micro will not hang up. To leave the AlphaMATE communications program, press:

6. Alt F9 <Enter>

The response is the AlphaMATE Main Options menu. Press:

7. Alt F3 <Enter>

The program returns you to DOS. Remember to hang up your modem.

8. Hang up modem line

To print the search results, you may use the DOS print command or your own word processing package.

APPENDIX E: SOFTERM PC PROCEDURES

SOFTERM PC is a communications and terminal emulation software package developed for the IBM PC and marketed by Softronic, Inc. 7899 Lexington Drive, Colorado Springs, CO 80918. Their technical support number is 303/593-9550.

Install SOFTERM PC on your computer following the instructions given in the Softerm Manual. The first time you run Softerm, the Communications Agent System Definition Screen will be displayed. See the System Definition Chapter in the Softerm manual for information on establishing the setup. The set up parameters are:

Setup Options	Communications Parameters
Disk Utilities	
Load Configuration	Port: COM1
Save Configuration	Number of Data Bits: 8
Load Emulation	Number of Stop Bits: 1
Terminal Options	Parity: None
Online Operation	Speed: 1200
Exit to DOS	Duplex: Full
Exit, Make Resident	Receive Pacing: XON/XOFF
	Transmit Pacing: None
Emulating	Transmit Delay: 0
TeleVideo 950	Answerback Message:

Figure 4. SOFTERM PC Setup Table

This set up is not required on subsequent runs of Softerm. To run Softerm type:

1. SOFTERM <Enter>

Using the Arrow keys on the keyboard, move the highlighted bar to Load Emulation and press <Enter>. Again using the arrow keys select

2. TV950 <Enter>

To enter the online mode, use the arrow keys to select

3. Online Operation <Enter>

The last line on the screen will have ONLINE at the bottom.

Next, type the telephone number with its correct format.

4. ATDT 301/948-4997 (This is the Hayes modem format.
or Check your manual to be certain
ATDT 301/948-4998 this is your format.)

(The telephone number may be installed and dialed from the dialing directory.)

The computer responds:

CONNECT

At the period, type:

7. LOGIN <Enter>

The response is Please Log In:
USER ID:

If the computer responds with Login Please repeat step 7.

8. Type the assigned User ID <Enter>

The response is Password:

9. Type the assigned Password <Enter>

THE ASSIGNED PASSWORD WILL NOT APPEAR ON THE SCREEN.

If you entered an invalid password, repeat step 7.

At the next period, type:

10. DRIVER TV95X <Enter>

The response, Driver TV95X, indicates that the correct driver is installed.
At the next period, type:

11. STAR <Enter>

The response is STAR Version ...
Enter Password for ...

12. Re-enter the Password assigned to you. <Enter>

You are now in the STAR program at the Main Menu, Figure 1.

***NOTE: This communications package masks the 25th line of the STAR screen. The only two command words of importance are INDEX and MENU. You always use the Command MENU to exit STAR or to clear the screen. The Command INDEX is explained in Section 3.6.

HOW TO SAVE YOUR SEARCH RESULTS and HOW TO EXIT SOFTERM

When you have completed your search and have successfully removed all of the control characters from the search (see Section 3.11), you are ready to download it onto your personal computer. At the period, press:

1. Alt 1

and then:

2. F8

Next, enter the destination file name, for example:

3. C:filename <Enter>

Note, the last line on the screen changes to read: "Capture Disk".

The next response you type is:

4. COPY TRM:=filename.ext <Enter>

Where filename.ext is the name of the clean copy file created in section 3.11. The computer responds with:

Total of 1 file transferred.

The next response is a period. Type:

5. Alt 1

6. F8

To close the file on your personal computer. Then type:

7. LOGOFF <Enter>

At this point be sure to hang up your modem to be certain the Alpha Micro computer will disconnect. To leave the communications package, press:

9. Alt 2

The response is the GoTo Menu. Press:

10. F8

The search session is now ended. You are at a DOS prompt and in the root direction of your computer. You may print your search results from your personal computer.

APPENDIX F: PROCOMM PROCEDURES

ProComm is a user supported product produced by Datastorm Technologies, Inc. The address is: Datastorm Technologies, Inc., P. O. Box 1471, Columbia, MO 65205. The 24-hour, 7 days per week hotline is: 314/449-9401.

Install ProComm on your computer using the information provided in the ProComm documentation. To set the parameters in ProComm start the program by typing:

1. PROCOMM <Enter>

ProComm responds with an initial screen. Press any key to continue. The next several steps will set up ProComm to interact with the AlphaMicro computer using STAR. Press

2. Alt S l <Enter>

To initiate the modem setup. It should appear as:

1. Modem init string ATE0 S7=60 S11=55 V1 X1 S0=0!
2. Dial command ATDT (for touch tone) or
 ATDP (for dial telephone)
3. Dialing cmd suffix ... !
4. Connect string CONNECT
5. No connect string 1 .. BUSY
6. No connect string 2 .. VOICE
7. No connect string 3 .. NO CARRIER
8. No connect string 4 ..
9. Hangup string '''+'''+'''+ATHO!
10. Redial timeout delay . 30
11. Redial pause delay ... 2

Use Esc to exit then select:

3. 2 <Enter>

For the terminal setup. It should appear as:

1. Terminal emulation ... TVI 950
2. Duplex FULL
3. Flow controlXON/XOFF
4. CR translation (in) .. CR
5. CR translation (out) . CR
6. BS translationDEST
7. BS key definition ... BS
8. Line wrapOFF
9. ScrollON

- 10. Break Length (ms) ... 350
- 11. Enquiry (CTRL-E) OFF

Use Esc to exit. You may save the setup to disk for future use by pressing S. Use Esc to exit the setup menu. Press:

4. Alt P

For Line Settings.

Select:

- 8) 1200,N,8,1
COM port where your modem is connected
- 24 if you wish to save the line settings for future use

Press Esc to exit.

You are now ready to start the dialing sequence. Press:

5. Alt D

To include the FIREDOC information in the dialing directory, press:

6. R <Enter>

The FIREDOC telephone number is 301/948-4997 or 301/948-4998. The other parameters are:

```
baud 1200
P N
D 8
S 1
E N
```

The modem dial cmd may require changing to accommodate tone or pulse dialing. For other than Hayes compatible modems see your modem manual for information. Press the correct directory number and then press <Enter>. The computer responds (all computer responses are underlined):

Dialing FIREDOC
CONNECT 1200

<Enter>

The computer responds:

?Login please

At the period, type

7. LOGIN <Enter>

The response is Please Log in ...
USER I. D.

If the computer responds with Login Please repeat step 7.

8. Type the assigned User ID <Enter>

The response is Password:

9. Type the assigned Password <Enter>

THE ASSIGNED PASSWORD WILL NOT APPEAR ON THE SCREEN

If you entered an invalid password, repeat step 8.

At the next period, type:

10. DRIVER TV95X <Enter>

The response, Driver TV95X, indicates that the correct driver is installed.
At the next period, type:

11. STAR <Enter>

The response is STAR Version ...
Enter Password for ...

12. Re-enter the Password assigned to you. <Enter>

You are now in the STAR program at the Main Menu, Figure 1.

NOTE This communications package masks the 25th line of the STAR screen. The only two command words of importance are INDEX and MENU. You always use the Command MENU to exit STAR or to clear the screen. The Command INDEX is explained in Section 3.6.

HOW TO SAVE YOUR SEARCH RESULTS and HOW TO EXIT PROCOMM

When you have completed your search and have successfully removed all of the control characters from the search (see Section 3.11), you are ready to download it onto your personal computer. At the period, press:

1. PgDn <Enter>

Select 7, and then type the destination file name. For example, if you want the file to go to disk C, you would type: C:SMTH1.TXT. You are now ready to download. At the period, type

2. COPY TRM:=filename.extension <Enter>

Where filename.ext is the name of the clean copy file created in Section 3.11.
When the transfer is complete press Esc to close the file.

At the period, you do the exit procedure by typing

3. LOGOFF <Enter>

Next, press:

4. Alt H (To hang up the telephone.)

5. Alt X

At this point ProComm asks if you want to:

6. EXIT TO DOS? (Y/N)

Press:

7. Y

To leave ProComm.

Your file is now in your personal computer and ready for editing and/or printing.

APPENDIX G: COMMAND SUMMARY

TO START AMATE

<u>Step</u>	<u>Type</u>	<u>Action</u>	<u>Program Screen Response</u>
1.	AMATE	<Enter>	AlphaMATE-AMOS to MS-DOS Communications AlphaMATE Main Option Menu
2.	Alt F4		AlphaMATE Set Communications Parameters screen
		8,NONE,1,1200	
3.	Alt F9		Welcome to the Alpha Micro Operating System, AMOS
4.	dial	301/948-4997 or 301/948-4998 make modem connection	
5.	LOGIN	<Enter>	Login please User ID:
6.	USER ID	<Enter>	Password:
7.	Password	<Enter>	. (a period)
8.	DRIVER	AMWS <Enter>	Already AMWS
9.	STAR	<Enter>	STAR Version... Enter password for ...
10.	Password	<Enter>	
11.	3	<Enter>	STAR search screen/cursor waiting
12.	FIREDOC	<Enter>	Cursor available on line S1

TO EXIT AMATE

<u>Step</u>	<u>Type</u>	<u>Action</u>	<u>Program Screen Response</u>
1.	MENU	<Enter>	STAR Main Menu
2.	END	<Enter>	STAR TERMINATED
3.	LOGOFF	<Enter>	. (a period)
		Disconnect modem	
4.	Alt F9		AlphaMATE Main Options Menu
5.	Alt F3		You are returned to DOS

TO START SOFTERM PC

<u>Step</u>	<u>Type</u>	<u>Action</u>	<u>Program Screen Response</u>
1.	SOFTERM	<Enter>	
2.	Load Emulation		
3.	TV950	<Enter>	
4.	Online Operations		
5.	type telephone number		
	ATDT 301/948-4997	<Enter>	
	or ATDT 301/948-4998		CONNECT
6.	LOGIN	<Enter>	Login please:
7.			USERID:
8.	UserID	<Enter>	Password:
9.	Password	<Enter>	. (a period)
10.	DRIVER TV95X	<Enter>	Driver TV95X
11.			. (a period)
12.	STAR	<Enter>	STAR Version ...
	Password	<Enter>	Enter Password for ...
13.	3	<Enter>	STAR search screen/cursor waiting
14.	FIREDOC	<Enter>	Cursor available on line S1

TO EXIT SOFTERM PC

<u>Step</u>	<u>Type</u>	<u>Action</u>	<u>Program Screen Response</u>
1.	MENU	<Enter>	STAR Main Menu
2.	END	<Enter>	STAR TERMINATED
3.	LOGOFF	<Enter>	
4.	Alt 2		
5.	F8		You are returned to DOS

TO START PROCOMM

<u>Step</u>	<u>Type</u>	<u>Action</u>	<u>Program Screen Response</u>
1.		PROCOMM	
2.		Alt S	
3.		1 <Enter>	Modem setup
4.		2 <Enter>	Terminal setup
5.		Alt P	Line settings
		8) 1200,N,8,1 20, 21, 22 or 23 24	
6.		Alt D	Dialing
		R	
		Dial 301/948-4997 or 301/948-4998	
		1200,N,8,1,N	Dialing FIREDOC CONNECT 1200
7.		LOGIN <Enter>	Login please: USERID:
8.		UserID <Enter>	Password:
9.		Password <Enter>	. (a period)
10.		DRIVER TV95X <Enter>	Driver TV95X
11.			. (a period)
12.		STAR <Enter>	STAR Version ... Enter Password for ...
13.		Password <Enter>	
14.		3 <Enter>	STAR search screen/cursor waiting
15.		FIREDOC <Enter>	Cursor available on line S1

TO EXIT PROCOMM

<u>Step</u>	<u>Type</u>	<u>Action</u>	<u>Program Screen Response</u>
1.		MENU <Enter>	STAR Main Menu
2.		END <Enter>	STAR Terminated
3.		LOGOFF	. (a period)
4.		Alt H	
5.		Alt X	
6.		Y	Exit DOS

U.S. DEPT. OF COMM. BIBLIOGRAPHIC DATA SHEET (See instructions)		1. PUBLICATION OR REPORT NO. NBSIR 87-3562	2. Performing Organ. Report No.	3. Publication Date SEPTEMBER 1987
4. TITLE AND SUBTITLE FIREDOC USERS MANUAL				
5. AUTHOR(S) Nora H. Jason				
6. PERFORMING ORGANIZATION (If joint or other than NBS, see instructions) NATIONAL BUREAU OF STANDARDS U.S. DEPARTMENT OF COMMERCE GAITHERSBURG, MD 20899			7. Contract/Grant No.	8. Type of Report & Period Covered
9. SPONSORING ORGANIZATION NAME AND COMPLETE ADDRESS (Street, City, State, ZIP)				
10. SUPPLEMENTARY NOTES <input type="checkbox"/> Document describes a computer program; SF-185, FIPS Software Summary, is attached.				
11. ABSTRACT (A 200-word or less factual summary of most significant information. If document includes a significant bibliography or literature survey, mention it here) FIREDOC is the on-line bibliographic database which reflects the holdings (published reports, articles, books, and audiovisual items) of the Fire Research Information Services (FRIS), at the Center for Fire Research, National Bureau of Standards. This manual provides a step-by-step technique for entering and exiting the database via telecommunication lines, as well as a number of techniques for searching the database and processing the results of the searches.				
12. KEY WORDS (Six to twelve entries; alphabetical order; capitalize only proper names; and separate key words by semicolons) information retrieval; fire research; information dissemination; databases; manuals				
13. AVAILABILITY <input checked="" type="checkbox"/> Unlimited <input type="checkbox"/> For Official Distribution. Do Not Release to NTIS <input type="checkbox"/> Order From Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402. <input checked="" type="checkbox"/> Order From National Technical Information Service (NTIS), Springfield, VA. 22161			14. NO. OF PRINTED PAGES 39	
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