THE BUSHRANGERS DATABASE

AUTHORS

ALLAN HOUSE
BRADDON HURLEY

First Published 1985
(C) All Rights Reserved

THE BUSHRANGERS DATABASE IS A COPYRIGHT PROGRAM.

KNOW WARE PTY. LIMITED LICENSES THE PACKAGE TO THE ORIGINAL PURCHASER ONLY. THE COPYING OF ANY PART OF THIS PACKAGE FOR ANY OTHER PERSON, INSTITUTION, OR ORGANISATION IS A CRIMINAL BREACH OF COPYRIGHT LAWS AND A BREACH OF THIS LICENSE.

 PERMISSIONS

Permission is granted to the purchaser to copy, in whole or in part, documentation for this package provided that the copies are for his/her/their use only.

Know Ware Pty. Limited,
25 Tunnel Road,
Helensburgh.
New South Wales 2508.

(042) 94.1829
The Bushrangers Database is the first of a series of Australian History databases from Know Ware Pty. Limited.

The equivalent of two man years of work has been spent on the development of the package and a database authoring system which will be used to prepare further databases.

During the design stage of the package's development, a number of objectives were set which required us to develop new ideas, new approaches and ultimately a database significantly different to and more powerful than any other education database currently available. Some of the significant features include:

- extensive content as a result of in-depth research
- an information retrieval component with annotated text files, maps, word search capability and a reference dictionary
- a database management system which assists the user in selecting fields, field items, operators, etc.
- a calculator and a histogram graphing utility to support the database management system
- provision for the printing of any file, record, analysis result or histogram
- menus and screen instructions to guide the user as much as possible and to minimise the chances of getting lost
- a high speed disk operating system, binary files and compacted menus to minimise the time the user waits for programs, files, menus, etc., to be retrieved from disk
- indexed binary databases which can be fully loaded into memory for processing
- the minimisation of keyboard entry by the user
- effective error trapping
- extensive screen-based documentation with tutorials, worksheets and activity sheets
The Bushrangers Database is a closed database intended for use in upper primary schools, secondary schools and libraries. It can be used by individual students or small groups or as a research tool by teachers.

The package is designed to

* encourage problem solving using a database
* develop analytical, interpretative and research skills
* give the user information in a way which fosters written expression skills
* encourage users to gather additional information from other sources such as books, government publications, etc.
* relate to other databases such as the First Fleet database, the Gold Rush database and the Explorers database
* give the user control of the computer so he/she can work at his/her own rate
* be an attractive and useable tool, in part or in whole, to a wide range of potential users

The worksheets and activity sheets vary in their level of difficulty. They are designed to help the user understand how the database can be used, to demonstrate the power and scope of the package, to encourage problem solving and to guide those teachers who wish to design their own material.

ACKNOWLEDGEMENTS

Know Ware acknowledges the assistance of The University of Wollongong in allowing us to use various equipment for this project. We would also thank students and staff in the University's Faculty of Education, and Toni Downes (at the time of publication, Chairperson of the New South Wales Computers in Education Group), for their advice and assistance.

The User's Handbook was printed at the University of Wollongong.
GETTING STARTED

This package will run on an Apple II+, IIe or IIc microcomputer with one disk drive and monitor (Apple is a trademark of Apple Computer, Inc).

Insert the required disk in the disk drive and then turn on the computer. The system will boot to a Main Menu with 8 areas from which to select. It is not necessary to turn the machine off to use one of the other disks - you will be given appropriate instructions if the desired material is on another disk.

A serial or parallel printer attached to slot 1 may be used to obtain a printout of any file or other data. Provision has been made for screen (graphics) printing provided your printer allows this and provided you have entered the command code through Section 2, disk 3 (see Addendum B for more information).

Each of the three disks can be used independently of the others. The program will prompt you to change disks when necessary.

DISK ERRORS

Each disk has been tested prior to delivery.

Should your disk drive fail to "boot" a disk or fail to read a file or program on it, the computer will end the execution of the program and report an Error 8 which signifies an Input/Output error.

Such an error will occur if

- the disk is not properly inserted in the disk drive,
- the disk drive is faulty, or if
- the disk has been damaged.

To eliminate the first possibility, just remove the disk, turn off your computer and then start-up again. If an error still occurs at the same point, the problem is either a faulty drive or a damaged disk.

A disk drive with an out-of-alignment read/write head or a too fast/too slow rotation speed will cause problems. If you have problems with more than one disk in this package or with other commercial software, it is almost certain that your drive is faulty. Have it checked by a technician and, if necessary, repaired.

Of course disks can be damaged. A scratch, fingerprint or exposure to heat can cause I/O errors. If you suspect you have a faulty disk, send it to us. We do have a replacement policy for such situations.
## CONTENTS

### INTRODUCTION

1

### GENERAL DESCRIPTION

2

### DISK 1: Contents

<table>
<thead>
<tr>
<th>Title</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Main Menu</td>
<td>6</td>
</tr>
<tr>
<td>Instructions</td>
<td>7</td>
</tr>
<tr>
<td>Word Search</td>
<td>8</td>
</tr>
<tr>
<td>Ballads</td>
<td>9</td>
</tr>
<tr>
<td>Dictionary</td>
<td>10</td>
</tr>
<tr>
<td>General Information</td>
<td>11</td>
</tr>
<tr>
<td>Maps</td>
<td>12</td>
</tr>
<tr>
<td>Tutorial</td>
<td>14</td>
</tr>
</tbody>
</table>

### DISK 2: Contents

<table>
<thead>
<tr>
<th>Title</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Main Menu</td>
<td>22</td>
</tr>
<tr>
<td>Instructions</td>
<td>23</td>
</tr>
<tr>
<td>Word Search</td>
<td>24</td>
</tr>
<tr>
<td>Personal Stories</td>
<td>25</td>
</tr>
<tr>
<td>Tutorial</td>
<td>26</td>
</tr>
</tbody>
</table>

### DISK 3: Contents

<table>
<thead>
<tr>
<th>Title</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Main Menu</td>
<td>32</td>
</tr>
<tr>
<td>Instructions</td>
<td>33</td>
</tr>
<tr>
<td>Printer</td>
<td>34</td>
</tr>
<tr>
<td>Databases</td>
<td>35</td>
</tr>
<tr>
<td>Major Database</td>
<td>36</td>
</tr>
<tr>
<td>Calculator</td>
<td>38</td>
</tr>
<tr>
<td>Search option 3</td>
<td>40</td>
</tr>
<tr>
<td>Search option 4</td>
<td>41</td>
</tr>
<tr>
<td>Search option 5</td>
<td>42</td>
</tr>
<tr>
<td>Matching Records</td>
<td>46</td>
</tr>
<tr>
<td>Search Finished</td>
<td>47</td>
</tr>
<tr>
<td>Display of Records</td>
<td>48</td>
</tr>
<tr>
<td>Graphs</td>
<td>49</td>
</tr>
<tr>
<td>Minor Database</td>
<td>50</td>
</tr>
<tr>
<td>Tutorial</td>
<td>52</td>
</tr>
</tbody>
</table>

### WORKSHEETS

66

### ACTIVITIES

92

### ADDENDUM

<table>
<thead>
<tr>
<th>Title</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>A - Database Fields</td>
<td>114</td>
</tr>
<tr>
<td>B - The Printer</td>
<td>126</td>
</tr>
<tr>
<td>C - Error Codes</td>
<td>130</td>
</tr>
<tr>
<td>D - Dictionaries</td>
<td>134</td>
</tr>
</tbody>
</table>

### BIBLIOGRAPHY

146
INTRODUCTION

The bushranging period in Australia's history lasted for over 100 years. It began in the first year of colonisation with the exploits of the escaped convict, Black Caesar, and ended in 1901 with the death of Jimmy Governor.

The Bushrangers Database is an Information Retrieval System. There are, in fact, two databases, one with over 400 bushranger records each with 7 fields and the other with 83 bushranger records each with 45 fields.

The databases are supported by additional material, usually in annotated form, to make the entire package as complete as possible.

We have endeavoured to make the information contained in this package as accurate and complete as possible, but must warn that the records, reports and communications of the times in which the bushrangers operated are incomplete and in some cases undoubtedly prejudiced. On occasion, several sources disagreed on a simple "fact" making it necessary for us to adopt what we saw to be the most "accepted" version. We welcome advice or communication which identifies any error or omission.
The Bushrangers Database consists of three disks.

**DISK 1 contains** an Instructions file;
- a Word Search utility to search files for words, phrases, etc;
- several Ballads on famous bushrangers;
- a Dictionary of words and terms from the bushranging period;
- General Information about the period in which the bushrangers operated;
- Maps of Australia showing the changes in the boundaries of the colonies.

**DISK 2 contains** an Instructions file;
- a Word Search utility to search the stories for words, phrases, years, etc;
- a Personal Story for each of the bushrangers in the Major Database.
- a reference Dictionary.

**DISK 3 contains** an Instructions file;
- a Printer configuration utility;
- two databases each supported by a number of retrieval utilities including
  - a Calculator (Major Database only), simple and complex searching, graphing.

*(Information on the structure of the databases is contained in Addendum A.)*
DISK 1

INSTRUCTIONS

WORD SEARCH

BALLADS

DICTIONARY

GENERAL

MAPS
DISK 1 CONTENTS

INSTRUCTIONS

WORD SEARCH

BALLADS
Brave Ben Hall
Death of Morgan
Frank Gardiner
Jim Jones
John Gilbert
Ned Kelly Song
The Kellys
The Wild Colonial Boy

DICTIONARY
see Addendum D

GENERAL
General History
Conditions
Convict Policy
Legislation
Penal Settlements
Population
The Colonies

MAPS
1788
1825
1829
1836
1851
1859
1861
1863
The MAIN MENU lists the various categories of information contained in the package.

**INSTRUCTIONS**  (PRESS 1) Details on the keys and commands to use with DISK 1 are contained in the Instructions file. See PAGE 7.

**WORD SEARCH**  (PRESS 2) Word Search is a fast utility which allows you to search files for words, names, phrases, years, ... See PAGE 8.

**BALLADS**  (PRESS 3) Eight Ballads on some famous bushrangers are stored on DISK 1. See PAGE 9.

**DICTIONARY**  (PRESS 4) There is a dictionary of words and terms from the bushranging period available on DISK 1. See PAGE 10.

**GENERAL**  (PRESS 5) General Information about the bushranging period is stored under seven categories on DISK 1. See PAGE 11.

**MAPS**  (PRESS 6) Eight maps showing the changes in the boundaries of the colonies are available on DISK 1. See PAGE 12.

**STORIES**  (PRESS 7) The Personal Stories of 83 bushrangers are available on DISK 2. You will be asked to insert that disk and press RETURN to continue. See PAGE 20.

**DATABASES**  (PRESS 8) The bushranger databases are stored on DISK 3. You will be asked to insert that disk and press RETURN to continue. See PAGE 30.
The Word Search utility may be used to search the Ballads and General files for a word, part of a word, name, place or year. The utility is loaded by selecting item 2 in the MAIN MENU.

Indicate whether you want a print-out of the search and then enter the required "word". You must enter at least 2 characters to continue or ESC to exit. The computer will display the filename and then advise whether the "word" has been found in that file.

**COMMANDS**

- Y for "yes"
- N for "no"
- <-- to delete a character in the search "word"
- ESC to interrupt the search
- ESC to go back

**ADDITIONAL INFORMATION**

The Word Search utility may be used to find whether a "word" is present or not in each of the files on DISK 1. If the "word" is found and you wish to read a file, wait until the search is completed, press ESC to go back to the introduction, press ESC again to go back to the Main Menu and then retrieve the file from the appropriate category.

Only alphabetic and numeric characters will be accepted when entering the search "word". If a special character is entered, the computer's speaker will sound three times to indicate that the character was not accepted.

Please note that ESC may be used at any time to stop Word Search.

It is assumed that a connected printer is attached to slot 1. If the print-out option is selected and nothing happens after entering the search "word", check to ensure that a printer is connected to slot 1 and turned on (see Addendum B for further information).
No database on bushrangers would be complete without making reference to folk lore as expressed through the period's Ballads.

A small selection of Ballads on famous bushrangers is available on DISK 1 and may be accessed through the BALLADS MENU.

### COMMANDS

#### (Menu)
- **1-8 keys** to select a Ballad.
- **ESC** to go back to the MAIN MENU.

#### (Ballads)
- **RETURN** to continue reading a Ballad.
- **-** to read the previous page of text.
- **ESC** to go back to the BALLADS MENU.
- **D** to look up a word in the dictionary.
- **?** to see the Help screen.
- **CTRL P** to output a Ballad to a printer.

### ADDITIONAL INFORMATION

A reference dictionary may be accessed at any time while reading a Ballad. Press **D**, wait for the prompt, enter the word and press the RETURN key. If the word is in the dictionary, its meaning will be retrieved from the disk and displayed on the screen. Press **ESC** to go back to the Ballad.

The printer command, **CTRL P**, may be used at any time during display of a Ballad. The entire ballad will be sent to an online printer for printing. It is assumed that a connected printer is attached to slot 1. If the option is used and nothing happens, check to ensure that the printer is turned on and connected to slot 1 in your computer (see Addendum B for further information).

The pressing of a wrong key will result in the display of an error message. Wait for the error display to disappear before pressing a correct key.
The Dictionary consists of words and terms and their meanings from the bushranger period. The file is available on DISK 1 and may be accessed from the MAIN MENU by selecting item 4.

**ADDITIONAL INFORMATION**

The arrows and spacebar are used to move the selection box to the required word. The RETURN key must be used to confirm the selection. The word and its meaning will then be displayed. Press ESC to go back to the Dictionary Menu.

The computer's speaker will sound three times if a wrong key is pressed when viewing the Menu.

There is another dictionary on DISK 1. It can only be accessed by pressing D when reading a Ballad or General file. The two dictionaries are not identical in content (see Addendum D for a complete list of words and meanings compiled from all dictionaries).
General information on the bushranger period is available on DISK 1 and may be accessed by selecting item 5 in the MAIN MENU.

**COMMANDS**

1-7 keys to select a General Information file.

ESC to go back to the MAIN MENU.

**COMMANDS**

RETURN to continue reading a file.

- to read the previous page of text.

ESC to go back to the General Information Menu.

D to look up a word in the dictionary.

? to see the Help screen.

CTRL P to output a General file to a printer.

**ADDITIONAL INFORMATION**

A reference dictionary may be accessed at any time while reading a file. Press D, wait for the prompt, enter the word and press the RETURN key. If the word is in the dictionary, its meaning will be retrieved from the disk and displayed on the screen. Press ESC to go back to the file.

The printer command, CTRL P, may be used at any time during display of a General file. The entire file will be sent to an online printer for printing. It is assumed that a connected printer is attached to slot 1. If the option is used and nothing happens, check to ensure that the printer is turned on and connected to slot 1 in your computer (see Addendum B for further information).

The pressing of a wrong key will result in the display of an error message. Wait for the error display to disappear before pressing a correct key.
From 1788 to 1863, there were eight changes in the colonial boundaries of Australia. The MAPS MENU provides access to all or any one of those years in which a boundary change occurred. This category may be accessed by selecting item 6 from the MAIN MENU.

COMMANDS

1-9 keys to select all or one of the years.
ESC to go back to the MAIN MENU.
RETURN to continue viewing maps if 1 is selected.

COMMANDS

ESC to go back to the MAPS MENU.

ADDITIONAL INFORMATION

All maps will be displayed one after the other if 1 is selected and the RETURN key is pressed after each is displayed.

The pressing of a wrong key will result in an error message. Wait for the error display to disappear before pressing a correct key.
**TUTORIAL - DISK 1**

Insert Disk 1 in the disk drive, close the gate and turn on the monitor and computer. Wait for the MAIN MENU to be displayed.

| MAIN MENU | Press 9 | Oops, we made an error. We must select a key from 1 to 8. |
| Press ESC | To go back to the MAIN MENU. |
| Press 1 | The Instructions file will be loaded and page 1 displayed. |
| INSTRUCTIONS | Press RETURN | The next page of the file will be displayed. |
| Press - | This key will take us back a page to page 1. |
| Press ESC | To go back to the MAIN MENU. |

You could select Instructions again and this time read through the entire file.

| MAIN MENU | Press 2 | The Word Search file will be loaded and displayed. |
| WORD SEARCH | Press RETURN | We don't want a printout. (RETURN is N(O) here). |
| Or N | (RETURN is N(O) here). |
| Enter Ben Gall | Oops, we made an error. (we have to correct Gall) |
| (no RETURN yet) | |
| Use <-- | To delete Gall. |
| Enter Hall | We've changed the name to Ben Hall. |
| Press RETURN | The computer will now search the Ballads and General files for Ben Hall. Write down the file names with a "yes" reply. |
| Press ESC | The Word Search file will again be loaded and displayed. |
| Press ESC | To go back to the MAIN MENU. |

Try Word Search again. You could search for a year (say 1850) or a word (say drought).
**MAIN MENU**

Press 3  A Ballads Menu will be loaded and displayed.

**BALLADS MENU**

Press 2  We've asked for the Ballad, Death of Morgan. It will be loaded and page 1 displayed.

Press RETURN  Page 2 will be displayed. What's a Trap? (line 7).

Press D  We're going to look up the word, Trap, in the dictionary.

Enter TRAP  The word's meaning will be loaded and displayed.

Press RETURN  We're going back to our Ballad.

Press ESC  Let's look at page 1 again.

Press -  Oops, an error. We can't go back past page 1, can we?

Press ESC  We're going back to the Ballads Menu.

Press ESC  To go back to the Main Menu.

---

Remember the Ballads identified by Word Search as containing "Ben Hall". You could have a look at these Ballads and see where and why his name appears.

**MAIN MENU**

Press 4  The Dictionary Menu will be loaded and page 1 displayed.

**DICTIONARY**

Press SPACEBAR  We've now moved the white selection box over Commuted.

Press -->  We're now over Conditional Pardon.

Press RETURN  The meaning of Conditional Pardon will be displayed.

Press ESC  We're going back to the Dictionary Menu. Let's look up what commands are available.

Enter ?  An online Help Menu will be displayed. This Menu can be selected from a file or the Dictionary. Notice we can use the / key to move by page.
Press ESC  The ESC key will take us back to the Dictionary Menu.

Press /  Notice how we can move to page 2 of this Menu without using -->. Let's find out what a Pound is.

Press RETURN  So that's what a Pound is. You knew of course.

Press ESC  We're going back to the Dictionary Menu.

Press ESC  To go back to the MAIN MENU.

You could stay in the Dictionary and become more familiar with the commands to use and the meaning of more words. Press the spacebar several times and see what happens. Do the same with the / key.

---

**MAIN MENU**

Press 5  The General Menu will be loaded and displayed.

**GENERAL MENU**

Press 2  We've asked for the Conditions file. It will be loaded and displayed. It has information on the many problems which beset the colonies from 1788-1868.

Use RETURN  To find the page with details on 1852. Let's look up the word, Transportation in the Dictionary

Press D  We're now in the Dictionary.

Enter our word  The meaning will now be loaded and displayed.

Press RETURN  We're going back to the file.

Enter ?  We want to look at the Help Screen. Notice we can use CTRL P to print files. Let's go back to the Conditions file.

Press ESC  We've returned to the file. If you've got a printer ready, enter CTRL P to print the file. If you try to do this and the program stops, there's something wrong with the Printer connection. You might have to start-up the disk.
Press ESC  We're going back to the General Menu.

Press ESC  To go back to the MAIN MENU.

If you've got the time now, look at the other files in the General Information category. All the data here can be very useful in interrogating the database or in explaining data retrieved from it.

**MAIN MENU**

Press 6  The Maps Menu will be loaded and displayed.

**MAPS MENU**

Press 1  We're going to look at the changes in colonial Boundaries from 1788 to 1863.

Use RETURN  To continue the display of maps until the last map (1863) is reached.

Press ESC  We're going back to the Maps Menu.

Press ESC  To go back to the MAIN MENU.

Categories 7 (Personal Stories) and 8 (Databases) may be selected from Disk 1. You will be asked to insert another disk and press RETURN to continue. You can go back to the MAIN MENU by pressing ESC.
DISK 2

INSTRUCTIONS

WORD SEARCH

PERSONAL STORIES
DISK 2 CONTENTS

INSTRUCTIONS

WORD SEARCH

PERSONAL STORIES

Ben Hall
Black Caesar
Bold Jack Donohoe
Captain Melville
Captain Moonlite
Captain Starlight
Captain Thunderbolt
Mad Dan Morgan
Moondyne Joe
Ned Kelly
The Clarke
The Wild Scotsman
William Armstrong
James Atterall
William Barnes
Graham Bennett
Robert Bourke
Charles Bow
John Bow
Henry Bradley
Jack Bradshaw
Matthew Brady
William Brookman
William Bryan
Richard Bryant
Arthur Burrowe
Joseph Byrne
John Caesar
Martin Cash
George Chamberlain
John Clarke
Thomas Clarke
Patrick Daley
James Dalton
John Donohoe
John Donovan
John Douglas
William Driscoll
James Duncan
John Dunn
Patrick Dunne
Christopher Farrell
John Finegan
John Planigan
John Foley
Stephen Fox
Frank Gardiner
William Garroway
John Gilbert
Christopher Goodison
James Goodwin
Jimmy Governor
Benjamin Hall
Stephen Hart
Michael Howe
Henry Hunter
John James
Thomas Jeffries
Joseph Johns
Henry Johnston
George Jones
Lawrence Kavanagh
Andrew Kelly
Daniel Kelly
Edward Kelly
Fred Lowry
William Mack
Henry Manns
Frank Mc Callum
James Mc Pherson
Daniel Morgan
James Morgan
James Nesbitt
John Newton
Patrick O'Connor
Alexander Pearce
Frank Pearson
John Peisley
Henry Power
James Regan
John Roberts
William Roberts
Thomas Rogan
Andrew Scott
Alfred Stallard
Owen Suffolk
John Vane
Frederick Ward
John Whelan
John Whitehead
Thomas Williams
Thomas Williams
Edward Wilson
John Wilson
Isaiah Wright
The MAIN MENU lists the various categories of information contained in the package.

<table>
<thead>
<tr>
<th>COMMANDS</th>
<th>1-8 keys to select a category.</th>
</tr>
</thead>
</table>

**INSTRUCTIONS** (PRESS 1) Details on the keys and commands to use with DISK 2 are contained in the Instructions file. See PAGE 23.

**WORD SEARCH** (PRESS 2) Word Search is a fast utility which allows you to search files for words, names, phrases, years, ... See PAGE 24.

**STORIES** (PRESS 7) The Personal Stories of 83 bushrangers are stored on DISK 2. See PAGE 25.

**BALLADS** (PRESS 3) Eight Ballads on some famous bushrangers are stored on DISK 1. See PAGE 9.

**DICTIONARY** (PRESS 4) There is a dictionary of words and terms from the bushranging period available on DISK 1. See PAGE 10.

**GENERAL** (PRESS 5) General Information about the bushranging period is stored under seven categories on DISK 1. See PAGE 11.

**MAPS** (PRESS 6) Eight maps showing the changes in the boundaries of the colonies are available on DISK 1. See PAGE 12.

**DATABASES** (PRESS 8) The bushranger databases are stored on DISK 3. You will be asked to insert that disk and press RETURN to continue. See PAGE 30.
The MAIN MENU lists 8 areas covered by the Bushrangers Database.

Choose an area of interest and press the number key for that area.

If you press 3, 4, 5, 6 or 8 you will be asked to remove this disk, insert another disk and press the RETURN key. You may press the ESC key to cancel the selection and go back to the MAIN MENU.

On this disk, you may select from INSTRUCTIONS, WORD SEARCH and PERSONAL STORIES.

Each disk contains an Instructions file on the contents of that disk and on the commands to use. The file is loaded by selecting item 1 in the MAIN MENU.

**COMMANDS**

<table>
<thead>
<tr>
<th>Command</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>RETURN</td>
<td>to continue reading the text.</td>
</tr>
<tr>
<td>-</td>
<td>to read the previous page of text.</td>
</tr>
<tr>
<td>ESC</td>
<td>to go back to the MAIN MENU.</td>
</tr>
<tr>
<td>?</td>
<td>to see a Help screen.</td>
</tr>
<tr>
<td>CTRL P</td>
<td>to output the file to a printer.</td>
</tr>
</tbody>
</table>

**ADDITIONAL INFORMATION**

The pressing of a wrong key will cause an error message to be displayed at the bottom of the screen. Wait for the error display to disappear before pressing a correct key.

The printer command, CTRL P, may be used at the end of any page to output the contents of the entire file to an online printer connected to slot 1. If the print-out option is selected and nothing happens after entering CTRL P, check to ensure that a printer is connected to slot 1 and turned on (see Addendum B for further information).
The Word Search utility may be used to search the Personal Stories for a word, part of a word, name, place or year. The utility is loaded by selecting item 2 in the MAIN MENU.

Indicate whether you want a print-out of the search and then enter the required "word". You must enter at least 2 characters to continue or ESC to exit. The computer will display the filename and then advise whether the "word" has been found in that file.

**COMMANDS**

- **Y** for "yes"
- **N** for "no"
- `<--` to delete a character in the search "word"
- **ESC** to interrupt the search
- **ESC** to go back

**ADDITIONAL INFORMATION**

The Word Search utility may be used to find whether a "word" is present or not in each of the stories on DISK 2. If the "word" is found and you wish to read a story, wait until the search is completed, press ESC to go back to the introduction, press ESC again to go back to the Main Menu and then retrieve the story.

Only alphabetic and numeric characters will be accepted when entering the search "word". If a special character is entered, the computer's speaker will sound three times to indicate that the character was not accepted.

Please note that ESC may be used at any time to stop Word Search.

It is assumed that a connected printer is attached to slot 1. If the print-out option is selected and nothing happens after entering the search "word", check to ensure that a printer is connected to slot 1 and turned on (see Addendum B for further information).
Additional information on each bushranger in the Major Database is available on DISK 2. It may be accessed through the Personal Stories section by selecting item 7 from the MAIN MENU.

**COMMANDS**

(menu)

--> to move the selection box forward.

<-- to move the selection box back.

/ to move to the next page of the Menu.

SPACEBAR to move the selection box to the other column.

RETURN to confirm selection of the name inside the selection box.

? to see the Help screen.

ESC to go back to the MAIN MENU.

**COMMANDS**

(Stories)

RETURN to continue reading a story.

- to read the previous page of text.

ESC to go back to the Personal Stories Menu.

D to look up a word in the dictionary.

? to see the Help screen.

CTRL P to output the current story to a printer.

**ADDITIONAL INFORMATION**

The arrows and spacebar are used to move the selection box to the required bushranger. The RETURN key must be used to confirm the selection. The bushranger's story will then be loaded from the disk drive and displayed.

A reference dictionary may be accessed when reading any of the stories. Press D, wait for the prompt, enter the word and press the RETURN key. If the word is in the dictionary, its meaning will be retrieved from the disk drive and displayed.

The printer command, CTRL P, may be used at any time during the display of a story. The entire file will be sent to an online printer for printing. If the option is used and nothing happens, check to ensure that the printer is turned on and connected to slot 1 in your computer (see Addendum B for further information).
TUTORIAL - DISK 2

Insert Disk 2 in the disk drive, close the gate and turn on the monitor and computer. Wait for the MAIN MENU to be displayed.

**MAIN MENU**

- **Press 1**
  The Instructions file will be loaded and page 1 displayed.

**INSTRUCTIONS**

- **Press RETURN**
  The next page of the file will be displayed.
- **Press -**
  This key will take us back a page to page 1.
- **Press ESC**
  To go back to the MAIN MENU.

You could select Instructions again and this time read through the entire file.

**MAIN MENU**

- **Press 2**
  The Word Search file will be loaded and displayed.

**WORD SEARCH**

- **Press RETURN or N**
  We don't want a printout. (RETURN is N(o) here).
- **Enter BENDIGO**
  The computer will now search all the Personal Stories for Bendigo. Write down the file names with a "yes" reply.
- **Press RETURN**
- **Press ESC**
  The Word Search file will again be loaded and displayed.
- **Press ESC**
  To go back to the MAIN MENU.

Try Word Search again. You could search for a year (say 1850) or a place (say Macquarie Harbour).

**MAIN MENU**

- **Press 7**
  A Menu of bushrangers names will be displayed.

**PERSONAL STORIES**

- **Use -->**
  To move the selection box to Captain Moonlite.
- **Press RETURN**
  The file for Andrew Scott (Captain Moonlite) will be loaded and page 1 displayed.
Press RETURN The next page of the Story will be displayed. What's a station (2nd last line).

Press D We're going to look up the word, station, in the dictionary.

Enter STATION Press RETURN The word's meaning will be loaded and displayed.

Press ESC We're going back to Andrew Scott's story.

Press - To see page 1 again. If you've got a printer ready, enter CTRL P to print the story. If you try to do this and the program stops, there's something wrong with the Printer connection. You might have to start-up the disk again.

Press ESC We're going back to the Personal Stories Menu. Let's look up what commands are available.

Enter ? An online Help Menu will be displayed. This Menu can be selected from a file or the Stories Menu. Notice we can use the / key to move by page.

Press ESC The ESC key will take us back to the Stories Menu.

Press / Notice we can move to the next page without using the --> key. Use / several times and see how the Menu pages are selected.

Press ESC To go back to the Main Menu.

---

I suggest you have a look at a few stories, perhaps those containing Bendigo (remember our Word Search).

---

Categories 3, 4, 5, 6 and 8 can be selected from Disk 2. You will be asked to insert another disk and press RETURN to continue. You can go back to the MAIN MENU by pressing ESC.
DISK 3 CONTENTS

INSTRUCTIONS

PRINTER

MAJOR DATABASE

Calculator
Search- One Field: Total Analysis
Search- All Fields: Total Analysis
Search- All Fields: Simple Analysis

MINOR DATABASE

Search- One Field: Total Analysis
Search- All Fields: Total Analysis
Search- All Fields: Simple Analysis

Refer to Addendum A for information on fields and field items.

Refer to pages 36 and 37 for explanations on the abovementioned Search utilities.
The MAIN MENU lists the various categories of information contained in the package.

**COMMANDS**

1-8 keys to select a category.

**CATEGORIES**

**INSTRUCTIONS** (PRESS 1) Details on the keys and commands to use with DISK 3 are contained in the Instructions file. See PAGE 33.

**PRINTER** (PRESS 2) This utility allows you to configure this disk to print screen graphics. See PAGE 34.

**DATABASES** (PRESS 8) The bushranger databases and other utilities are stored on this disk. Access is through Menus. See PAGE 35.

**BALLADS** (PRESS 3) Eight Ballads on some famous bushrangers are stored on DISK 1. You will be asked to insert that disk and press return to continue. See PAGE 9.

**DICTIONARY** (PRESS 4) There is a dictionary of words and terms from the bushranging period available on DISK 1. See PAGE 10.

**GENERAL** (PRESS 5) General Information about the bushranging period is stored under seven categories on DISK 1. See PAGE 11.

**MAPS** (PRESS 6) Eight maps showing the changes in the boundaries of the colonies are available on DISK 1. See PAGE 12.

**STORIES** (PRESS 7) The Personal Stories of 83 bushrangers are available on DISK 3. You will be asked to insert that disk and press RETURN to continue. See PAGE 20.
THE MAIN MENU LISTS 8 AREAS COVERED BY THE BUSHRANGERS DATABASE.

CHOOSE AN AREA OF INTEREST AND PRESS THE NUMBER KEY FOR THAT AREA.

IF YOU PRESS 3, 4, 5, 6 OR 7 YOU WILL BE ASKED TO REMOVE THIS DISK, INSERT ANOTHER DISK AND PRESS THE RETURN KEY.

YOU MAY USE THE ESC KEY TO CANCEL YOUR SELECTION AND GO BACK TO THE MAIN MENU (DO NOT REMOVE THIS DISK IF ESC IS USED)

ON THIS DISK, YOU MAY SELECT FROM INSTRUCTIONS, PRINTER AND DATABASES.

PRESS RETURN TO CONTINUE

Each disk contains an Instructions file on the contents of that disk and on the commands to use. The file is loaded by selecting item 1 in the MAIN MENU.

COMMANDS

<table>
<thead>
<tr>
<th>COMMAND</th>
<th>USE</th>
</tr>
</thead>
<tbody>
<tr>
<td>RETURN</td>
<td>to continue reading the text.</td>
</tr>
<tr>
<td>-</td>
<td>to read the previous page of text.</td>
</tr>
<tr>
<td>ESC</td>
<td>to go back to the MAIN MENU.</td>
</tr>
<tr>
<td>CTRL P</td>
<td>to output the file to a printer.</td>
</tr>
</tbody>
</table>

ADDITIONAL INFORMATION

The pressing of a wrong key will cause an error message to be displayed at the bottom of the screen. Wait for the error display to disappear before pressing a correct key.

The printer command, CTRL P, may be used at the end of any page to output the contents of the entire file to an online printer connected to slot 1. If the print-out option is selected and nothing happens after entering CTRL P, check to ensure that a printer is connected to slot 1 and turned on (see Addendum B for further information).
There are two printer options available on this disk.

CTRL P - Will print text. It will not print graphs.

CTRL S - Will print graphs and then any relevant text.

To use this option, you must have a printer capable of printing screen graphics. Such a printer must be first configured using this utility.

The Printer option gives details on the commands available for outputing files or screen graphics to a printer. It also allows you to key-in the command code to configure a printer for screen dumps (that is, graphics printing). Answer the questions asked and follow the instructions carefully.

This option is available for Disk 3 only.

**Commands**

<table>
<thead>
<tr>
<th>Command</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>ESC</td>
<td>To go back to the MAIN MENU.</td>
</tr>
<tr>
<td>RETURN</td>
<td>To continue to page 2.</td>
</tr>
</tbody>
</table>

**Additional Information**

The capacity to output files to a printer is built into the program. It is assumed that either a serial or parallel printer card is located in slot 1 and connected to an online printer. (see Addendum B for further information).

This option must be used to permit a printer to print screen graphics. The communication code for your printer must be entered when requested. On your command, it may then be stored on disk 3 in this package. The code may be changed at any time by re-running the configuration routine.

CAUTION: Read the manuals for your printer and printer card carefully to make sure they can be configured to print screen graphics.
There are two databases on this disk. They have been named the MAJOR DATABASE and the MINOR DATABASE.

The MAJOR DATABASE contains coded data on 83 bushrangers. They have been selected because of the amount of information collected on each from Australia's historical records. There are up to 45 fields for each bushranger (see page 36 to use the Major Database).

The MINOR DATABASE contains coded data on over 400 bushrangers including those bushrangers in the Major Database. The number of fields is limited to 7 (see page 50 to use the Minor Database).

<table>
<thead>
<tr>
<th>COMMANDS</th>
<th>1-3 keys to select a category.</th>
</tr>
</thead>
<tbody>
<tr>
<td>(Menu)</td>
<td>ESC to go back to the MAIN MENU.</td>
</tr>
</tbody>
</table>

ADDITIONAL INFORMATION

The INFORMATION category (PRESS 1) contains the above details. The ESC key must be used to go back to this Menu.

Access to either database is through another sub-Menu.

Details on the structure of the databases and their fields are contained in Addendum A.

The pressing of a wrong key will result in the display of an error message. Wait for the error display to disappear before pressing a correct key.
THE MAJOR DATABASE

This MENU lists the categories available for searching and using data in the MAJOR DATABASE.

<table>
<thead>
<tr>
<th>COMMANDS</th>
<th>1-5 keys to select a category.</th>
</tr>
</thead>
<tbody>
<tr>
<td>(Menu)</td>
<td>ESC to go back to the DATABASES MENU.</td>
</tr>
</tbody>
</table>

INSTRUCTIONS

(PRESS 1) The Instructions file contains basic information on the options available to retrieve and use data, and on what commands to use with each option.

<table>
<thead>
<tr>
<th>COMMANDS</th>
<th>RETURN to continue reading a file.</th>
</tr>
</thead>
<tbody>
<tr>
<td>(file)</td>
<td>- to read the previous page of text.</td>
</tr>
<tr>
<td></td>
<td>ESC to go back to the Menu.</td>
</tr>
</tbody>
</table>

CALCULATOR

(PRESS 2) The Calculator may be used on the Major Database to subtract the contents of one numeric field from another or to analyse the numeric contents of one field.

Source data and calculations will be displayed on screen. The computer will then calculate and display:

- number;
- low value;
- high value;
- range;
- mean;
- values and frequencies;
- ranges and frequencies.

See page 38.
SEARCH - ONE FIELD: TOTAL ANALYSIS

(PRESS 3) This option may be used to select 1 field for the Total Analysis of all items in that field.

Example: You could select the field, Birthplace, to find out how many bushrangers were born in Canada, England, Ireland, New South Wales, Scotland, Victoria, the West Indies and Queensland (the valid field items for this field).

You only have to select the field, the computer does the rest.

See page 40 to use option 3.

SEARCH - ALL FIELDS: TOTAL ANALYSIS

(PRESS 4) This option may be used to select 1 field for Total Analysis and include in the search, a field item from a single field or a formula consisting of field items from up to 4 fields. It combines options 3 and 5.

Example: You could select the field, Birthplace, and find out how many bushrangers were born in each place who had the given name, John.

You would have to first select the field, Birthplace, followed by the field, Given Name, and from it the field item, John.

See page 41 for option 4.

SEARCH - ALL FIELDS: SIMPLE ANALYSIS

(PRESS 5) This option may be used to select up to 4 fields, to determine 1 field item for each field and then, if you selected more than 1 field, to construct a search formula.

Example: You could find out which bushrangers were born in Ireland before 1840 using this option.

You would have to select the field, Birthplace, and from it the field item, Ireland. Then select the field, Year of Birth, and from it the field item, 1840. You would construct a formula which looks like this: Birthplace = Ireland and Year of Birth < 1840.

See page 42 to use option 5.
THE CALCULATOR

The calculator may be used on numeric fields to subtract one field from another or to analyse one field. Any bushranger's record with no data in a selected field will not be considered.

<table>
<thead>
<tr>
<th>COMMANDS</th>
<th>DESCRIPTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>to subtract 2 fields for 1 bushranger.</td>
</tr>
<tr>
<td>2</td>
<td>to subtract 2 fields for all bushrangers.</td>
</tr>
<tr>
<td>3</td>
<td>to analyse one field for all bushrangers.</td>
</tr>
<tr>
<td>ESC</td>
<td>to go back to the Databases Menu.</td>
</tr>
</tbody>
</table>

OPTION 1

You will be asked to enter the bushranger's surname. The computer will advise you if there is no record under that name or if there is more than one bushranger with the same surname. In the latter case, you will be asked to select a given name.

If a record is found, a menu of fields will be displayed. Select two fields for analysis using the selection box.

<table>
<thead>
<tr>
<th>COMMANDS</th>
<th>DESCRIPTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>(option 1)</td>
<td>-- &gt;</td>
</tr>
<tr>
<td></td>
<td>&lt; --</td>
</tr>
<tr>
<td></td>
<td>RETURN</td>
</tr>
<tr>
<td></td>
<td>ESC</td>
</tr>
</tbody>
</table>

After two different fields have been selected, you will be asked if the selection is correct and whether you want a printout (see details following Option 3 on page 39).

The result of the analysis will be displayed. If either or both fields contain no data, an appropriate notice will be displayed. Press RETURN to go back to the Calculator Menu.
OPTION 2  A Fields Menu will be displayed from which to select 2 fields for analysis.

<table>
<thead>
<tr>
<th>COMMANDS (option 2)</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>--&gt;</td>
<td>to move the selection box forward.</td>
</tr>
<tr>
<td>&lt;--</td>
<td>to move the selection box back.</td>
</tr>
<tr>
<td>RETURN</td>
<td>to confirm selection of the field inside the selection box.</td>
</tr>
<tr>
<td>CTRL S</td>
<td>to stop the display temporarily.</td>
</tr>
<tr>
<td>ESC</td>
<td>to go back to the Calculator Menu.</td>
</tr>
</tbody>
</table>

After two different fields have been selected, you will be asked if the selection is correct and whether you want a printout (see description following Option 3).

The computer will display or print the result for each calculation. On pressing RETURN, a table giving number, low value, high value, range, mean, values and frequencies, and range and frequencies will be displayed.

OPTION 3  A Fields Menu will be displayed from which you may select one field for analysis.

<table>
<thead>
<tr>
<th>COMMANDS (option 3)</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>--&gt;</td>
<td>to move the selection box forward.</td>
</tr>
<tr>
<td>&lt;--</td>
<td>to move the selection box back.</td>
</tr>
<tr>
<td>RETURN</td>
<td>to confirm the field inside the selection box.</td>
</tr>
<tr>
<td>CTRL S</td>
<td>to stop the display temporarily.</td>
</tr>
<tr>
<td>ESC</td>
<td>to go back to the Calculator Menu.</td>
</tr>
</tbody>
</table>

IS YOUR SELECTION CORRECT? Y/N  Press Y or RETURN (for yes) to start the analysis.
Press N for "no" to select new fields.

DO YOU WANT A PRINTOUT? Y/N  If you answer Y for "yes", details of the analysis will be sent to an online printer.

The computer will display or print the result of each calculation. On pressing RETURN, a table giving number, low value, high value, range, mean, values and frequencies, and range and frequencies will be displayed.
SEARCH— ONE FIELD: TOTAL ANALYSIS

The Option 3 Menu contains the field names from which you may select a field for total analysis, that is, by all possible field items in that field. Only one field may be selected for total analysis.

**COMMANDS**

- `-->` to move the selection box forward.
- `<--` to move the selection box back.
- SPACEBAR to move the selection box to the other column.
- RETURN to confirm selection of the field inside the selection box.
- ESC to go back to the Databases Menu.

IS THIS THE CORRECT FIELD: Y/N

After the field is selected you will be asked if the selection is correct.

**COMMANDS**

- Y or RETURN for "yes"
- N or ESC for "no"

On confirmation of the field, the computer will begin the analysis.

Goto page 46 for the next step.
SEARCH— ALL FIELDS: TOTAL ANALYSIS

In using option 4, you will need to select fields from 2 menus, the Total Analysis Menu and the Simple Analysis Menu.

The first Menu contains the field names from which you may select a field for total analysis, that is, by all possible field items in that field. Only one field may be selected for total analysis.

After the field has been selected, you will be taken to the Simple Analysis Menu (see page 42) to select the other fields to make up your Search Formula.

COMMANDS

--- to move the selection box forward.

<--- to move the selection box back.

SPACEBAR to move the selection box to the other column.

RETURN to confirm selection of the field inside the selection box.

ESC to go back to the Databases Menu.

IS THIS THE CORRECT FIELD: Y/N

After the field is selected you will be asked if the selection is correct.

COMMANDS

Y or RETURN for "yes".

N or ESC for "no".
SEARCH—ALL FIELDS: SIMPLE ANALYSIS

The Simple Analysis Menu contains the field names from which to select under this option. You may select up to 4 fields.

**COMMANDS**

- **-->** to move the selection box forward.
- **<--** to move the selection box back.
- SPACEBAR to move the selection box to the other column.
- RETURN to confirm selection of the field inside the selection box.
- ESC to go back to the DATABASES MENU.

After you select each field, you will be asked some questions:

**ALL CORRECT:** Y/N After each field is selected you will be asked if the field display is correct.

**COMMANDS**

- Y for "yes".
- RETURN for "yes".
- N for "no": control goes to Change or Delete.
- ESC control goes back to the Fields Menu.

**CHANGE or DELETE:** C/D If you answer N for not correct, you will be able to change or delete a field.

**COMMANDS**

- **C** allows for an individual field to be CHANGED if more than 1 field has been selected.
- **D** allows for an individual field to be DELETED if more than one field has been selected.
- ESC to go back to ALL CORRECT.
**ANY MORE FIELDS: Y/N**

After each field selection and display is confirmed, you will be asked if any more fields are required for the search.

Remember you can search on as few as 1 field or on as many as 4 fields.

<table>
<thead>
<tr>
<th>COMMANDS</th>
<th>(more)</th>
<th>Y</th>
<th>permits the selection of more fields (up to 4).</th>
</tr>
</thead>
<tbody>
<tr>
<td>(more)</td>
<td>N</td>
<td>stops field selection: control goes to OPERATORS.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>ESC</td>
<td>to go back to ALL CORRECT.</td>
<td></td>
</tr>
</tbody>
</table>

**OPERATORS**

The possible operators are indexed for each field.

- **Numeric fields**
  - `<` less than
  - `<=` less than or equal to
  - `>` greater than
  - `>=` greater than or equal to
  - `=` equal to

- **Alphanumeric fields**
  - `=` equal to
  - `<>` not equal to

**COMMANDS (operators)**

- `-->` to move the selection box forward.
- `<--` to move the selection box back.
- `RETURN` to confirm selection of the operator inside the selection box.
- `ESC` to go back to ALL CORRECT.

**CORRECT: Y/N**

After an operator is selected for a field, you will be asked if the operator is correct.

<table>
<thead>
<tr>
<th>COMMANDS (correct)</th>
<th>Y</th>
<th>to confirm the operator and proceed to the selection of the field item.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>RETURN</td>
<td>same effect as pressing Y.</td>
</tr>
<tr>
<td></td>
<td>N</td>
<td>goes back to OPERATORS.</td>
</tr>
<tr>
<td></td>
<td>ESC</td>
<td>goes back to ALL CORRECT.</td>
</tr>
</tbody>
</table>
FIELD ITEMS

For some fields such as Surname, Year of Birth, etc., it is necessary to key-in a name or value and press RETURN to continue.

For most fields, the valid field items will be displayed. Use the white selection box to choose the field item you want and press RETURN.

COMMANDS

<table>
<thead>
<tr>
<th>Command</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>--&gt;</td>
<td>to move selection box forward.</td>
</tr>
<tr>
<td>&lt;--</td>
<td>to move selection box back.</td>
</tr>
<tr>
<td>RETURN</td>
<td>to confirm the selection of the item inside the selection box.</td>
</tr>
<tr>
<td>ESC</td>
<td>to go back to ALL CORRECT.</td>
</tr>
</tbody>
</table>

SELECT FIRST FIELD: You will enter this section if more than one field is selected.

SELECT SECOND FIELD: The search formula is started by selecting 2 fields to form a Search Block and then tying these fields together with an "and" or "or" operator.

Further Search Blocks will need to be formed if more than 2 fields are to be linked. It is stressed that a Search Block can only have 2 fields, however, a previously constructed Search Block can be used as a "field" to form another Search Block.

As each field or search block is used, it is marked with an asterisk * to indicate it is no longer available for selection. Search Blocks will be labelled with an A for the first block and a B for the second block.

Each block will be automatically bracketed by the computer with the first field appearing to the left of the operator and the second to the right.

Please note that the Search Formula is built from left to right and that bracketing stays with each block as it is constructed.

COMMANDS

<table>
<thead>
<tr>
<th>Command</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1-4</td>
<td>) to form Field Blocks.</td>
</tr>
<tr>
<td>A-B</td>
<td>) to move the selection box forward.</td>
</tr>
<tr>
<td>--&gt;</td>
<td>to move the selection box forward.</td>
</tr>
<tr>
<td>&lt;--</td>
<td>to move the selection box back.</td>
</tr>
<tr>
<td>RETURN</td>
<td>to confirm the field in the selection box.</td>
</tr>
<tr>
<td>ESC</td>
<td>to go back to ALL CORRECT</td>
</tr>
</tbody>
</table>
IS FORMULA CORRECT: Y/N

At this point, you may proceed to search the database or go back and reconstruct the Search Formula.

**COMMANDS**

<table>
<thead>
<tr>
<th>Command</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Y</td>
<td>to start the search.</td>
</tr>
<tr>
<td>RETURN</td>
<td>same effect as Y.</td>
</tr>
<tr>
<td>N</td>
<td>to go back and construct a new formula.</td>
</tr>
<tr>
<td>ESC</td>
<td>to go back to ALL CORRECT.</td>
</tr>
</tbody>
</table>

Example: assume 4 fields have been selected:

1 (field 1)
2 (field 2)
3 (field 3)
4 (field 4)

assume fields 1 and 3 are chosen with the "OR" operator. The screen and Search Block A will thus appear as:

*1 (field 1)
2 (field 2)
*3 (field 3)
4 (field 4)

A: (1 OR 3)

assume field 4 and block A are chosen with the "AND" operator. The screen and Search Block A will now appear as:

*1 (field 1)
*2 (field 2)
*3 (field 3)
*4 (field 4)

A: (4 AND (1 OR 2))

assume field 3 and block A are chosen with the "OR" operator. The screen and Search Block A will now appear as:

*1 (field 1)
*2 (field 2)
*3 (field 3)
*4 (field 4)

A: (3 OR (4 AND (1 OR 2)))

As all fields have been used, this is our Search Formula.
On confirming the Search Formula, the computer will commence to search the database for bushrangers' records with matching data.

During the search, the number of matching records found and the number of records searched will be displayed (eg 5/60: says that 5 matches have been found out of 60 records searched).

A Simple Analysis Search will display the names of those bushrangers with matching data (option 5).

A Total Analysis Search will display the field items and the number of matching records for each item (options 3 and 4).

**Note:** The search may be interrupted at anytime by pressing the ESC key. Details of the matching records to that point are valid and will be displayed. The search cannot be resumed.

**COMMANDS**

<table>
<thead>
<tr>
<th>Command</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>ESC</td>
<td>to stop the search.</td>
</tr>
<tr>
<td>RETURN</td>
<td>to proceed to the next step.</td>
</tr>
<tr>
<td>CTRL P</td>
<td>will send the details to a printer.</td>
</tr>
</tbody>
</table>

After the search is completed and you have proceeded to the next step (see page 47), you may choose to see the list again, display individual records, do another search, re-organise the formula or exit to the Databases Menu.

Goto page 47 for the next step.
Once the matching records have been found, you may choose to

(PRESS 1) see the Search Fields, Search Formula and details of the analysis.

(PRESS 2) see the data for any or all the bushrangers whose records contained matching data. See page 48.

(PRESS 3) select new fields, create a new formula and search the database again.

(PRESS 4) change the Search Formula without changing the fields, operators and field items.

(PRESS 5) prepare a graph on the relevant data.

(PRESS 6) go back to the DATABASES MENU. See page 35.

The number of categories from which to choose is dependent on which option was originally chosen.

COMMANDS 1 - 6 to select an option.
ESC to go back to the Menu of fields.

Note: Category 5 is not available with All Fields: Simple Analysis. Category 4 is not available with One Field: Total Analysis.
On selecting 2, (page 47), the first bushranger's record will be displayed.

There are four pages of information for each bushranger in the Major Database. Page 1 will be automatically displayed unless you tell the computer to display the other pages. You must use the RETURN key to advance to the next bushranger.

You may find out the names of any companions of the bushranger whose record is on display by pressing CTRL G. Press any key to return.

Note: A blank space against a field name indicates that the record contains no data in that field.

There is only 1 page of information for each bushranger in the minor database. Command keys 2, 3 and 4 are therefore not available for use with that database.

<table>
<thead>
<tr>
<th>COMMANDS</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>displays page 1 of a record.</td>
</tr>
<tr>
<td>2</td>
<td>displays page 2 of a record.</td>
</tr>
<tr>
<td>3</td>
<td>displays page 3 of a record.</td>
</tr>
<tr>
<td>4</td>
<td>displays page 4 of a record.</td>
</tr>
<tr>
<td>RETURN</td>
<td>to proceed to the next record.</td>
</tr>
<tr>
<td>CTRL G</td>
<td>will list all companions.</td>
</tr>
<tr>
<td>CTRL P</td>
<td>will send the record to a printer.</td>
</tr>
<tr>
<td>ESC</td>
<td>to go back to the previous menu.</td>
</tr>
</tbody>
</table>
Insert Disk 3 in the disk drive, close the gate and turn on the monitor and computer. Wait for the MAIN MENU to be displayed.

**MAIN MENU**  
Press 1  
The Instructions file will be loaded and page 1 displayed.

**INSTRUCTIONS**  
Press RETURN  
The next page of the file will be displayed.

Press -  
This key will take us back a page to page 1.

Press ESC  
To go back to the MAIN MENU.

You could select Instructions again and this time read through the entire file.

**MAIN MENU**  
Press 8  
The Databases Menu will be loaded and displayed.

**DATABASES MENU**  
Press 1  
The Information file will be loaded and displayed.

Press ESC  
We're going back to the Databases Menu.

Press 2  
Another Menu will be loaded and displayed. This one lists the Search and Utilities options for the Major Database.

Press 5  
We've asked for the Major Database to be loaded. A Fields Menu will be displayed. We will now develop a simple search formula.

**FIELDS MENU**  
Use -->  
Until the selection box is over the field Popular Name.

Press RETURN  
We want to use that field to search the database.

Press RETURN  
That field is correct.  
(or Y)  
(RETURN is Y(es) here).

Press N  
We only want one field at this stage. We could have more, but that's for later.
Press RETURN

You will notice 2 operators on the screen. The arrows can be used to move the selection box to either one. We want the one already marked (=).

Press RETURN

The = operator is correct.

or Y

(RETURN is Y(es) here).

Use -->

To move the selection box to Ned Kelly. The list identifies all the field items for the field, Popular Name.

Press RETURN

We've asked the computer to search the database for Ned Kelly. The computer will scan all files and report it has found a matching record under the name of Edward Kelly, Ned's proper name.

Press RETURN

We will now be told there are five options available from which to select.

Press 1

This will display the results of our search again.

Press ESC

To go back to the options.

Press 2

We're now looking at part of Ned's record. You'll notice it says this is page 1. There are in fact 4 pages of information on Ned.

Press 2

To see page 2. The empty fields indicate we have no data in them - not surprising as Ned was born in Australia, wasn't he?

Press 3

To see Page 3.

Press 4

To see Page 4. One of the questions you'll want answered is: who were Ned's companions? Let's see.

Enter CTRL G

The computer will search the entire database and display which other bushrangers in this database were connected with Ned Kelly.
Press any key: To return to Ned's file. If you've got a printer ready, you can print out Ned's record by entering CTRL P. If you try to do this and the program stops, refer to Addendum B.

Press ESC: To go back to the options. Let's do another Search.

Press 3: We're going back to the Fields Menu.

**FIELDS MENU**

Use -->: To move the selection box to the field, Year of Birth.

Press RETURN: We're going to search the database using that field.

Press RETURN or Y: The field is correct. (RETURN is Y(es) here).

Press N: We don't want any more fields.

Use -->: To move the selection box to the >= operator.

Press RETURN: We're going to choose a field item whose value is greater than or equal to a particular year.

Press RETURN: For Y(es). The operator is correct.

Enter 1830

Press RETURN: This is our field item to search the database. The computer will now search all the records in the Major Database and will report how many matching records it found and the names of the bushrangers.

Use RETURN: Until the names are all shown.

Press RETURN: To go to the Options. Let's look at those records.

Press 2: We can now display each record.

Press RETURN: You'll notice that page 1 of the next record will be displayed. That's because page 1 is a default page for the RETURN key. If you want to look at any other page for a bushranger, you must press either 2, 3 or 4.
Press 2 To see page 2 of the record.
Enter CTRL G We'll see if he had any partners.
Press any key To go back to his record.
Press ESC We're going back to the options.
Press 5 To go back to the Databases Menu.

If you wish, you can press 3 to go back to the Fields Menu and do some more single field searching. I suggest you don't develop formulae with more than 1 field at this stage. We'll do that later on.

DATABASES
Press 2 We'll use another search option on the Major Database.
Press 3 We're going to search a field for all possible field items and then graph the numbers found for each item. The Major Database will now be loaded and a Fields Menu displayed.

FIELDS
Press SPACEBAR To move the selection box to the field, Bushranging Began.
Use --> To move the box to Cause of Death. This is the field we want.
Press RETURN We want the computer to tell us numeric information on all the field items in this field.
Press RETURN or Y The field is correct. The computer will now analyse all the records in the database and report the field items found and how many records for each.
Press RETURN To see the options. We know what options 1 and 2 do, so we'll proceed to graph the results of our search.
Press 4 A Graphing utility will now be loaded. The results of our search will be displayed.
Press **SPACEBAR** To see the details of our search. Press it again to see the graph. You could print this graph out if you have a graphics printer and have configured it.

Press **ESC** We're going back to the Databases Menu.

Rather than go back to the Databases Menu, you could look at some other fields and graph the results of the search. If you've got a graphics printer connected and configured through category 2 of the Main Menu, you can print out the details of the search and the graph.

---

**DATABASES**

Press **2** We will use another search option on the Major Database.

Press **5** We're going to use Simple Field Analysis again, however, this time we're going to develop a Search Formula using more than one field.

**FIELDS**

Use **--->** Until the selection box is over the field, Birthplace.

Press **SPACEBAR** To move the selection box to the field, State.

Press **RETURN** This is one of the fields we want.

Press **RETURN** To confirm the field is correct.

Press **RETURN** We want another field, don't we?

Use **<--** To move the selection box to the field, Bushranging Began.

Press **RETURN** We want that field too.

Press **RETURN** The selection is correct.

Press **RETURN** Let's choose another field.

Press **RETURN** Leave the selection box on Bushranging Began and select that field again.

Press **RETURN** Yes, we do want that field again.
Press N  We don't want any more fields. The computer will now ask you to select an operator for the first field, State.

Press RETURN  We need the = operator. It's already under the selection box.

Press RETURN  To confirm it's the correct one. All the valid field items for the field, State, will now be displayed.

Press RETURN  The field item we want for this analysis is New South Wales. The operators for the next field will now be displayed.

Use --> To put the selection box over the >= operator.

Press RETURN  We want this operator to search for those bushrangers who began their career in New South Wales from 1860.

Press RETURN  If the operator is correct.

Enter 1860  This is the value (year) we want for our search formula.

Press RETURN  To put the selection box over the <= operator.

Press RETURN  To confirm the selection.

Press RETURN  If the operator is correct.

Enter 1865  This is the value (year) we want for our formula. We're now going to develop our formula by connecting the fields together. We want to know how many bushrangers started bushranging in New South Wales between 1860 and 1865.

Press 2  The computer will mark that field with an asterisk * and ask us to select a second field.

Press 3  This field will also be marked. We now have to select an operator to form our first Field Block. We want the "AND" operator.
You will now be told that the First Block is (2 and 3), that is (Bushranging Began >= 1860 and Bushranging Began <= 1865). Agreed?

Press 1 To select State = New South Wales.

Press A To link that field with the block already chosen. We want the AND operator again.

Press RETURN The computer will now tell us the Search Formula is (1 and (2 and 3)) which is what we wanted to find out how many bushrangers began bushranging in New South Wales between 1860 and 1865.

Press RETURN The formula is correct. The computer will now do the analysis and tell you how many matches it is finding. It will then display the names of the bushrangers.

Press RETURN To go to the options.

Press 5 To go back to the Databases Menu.

You could select option 2 and look at the individual records to confirm the accuracy of the search. Use RETURN to read each record and ESC to go back to the options.

DATABASES MENU

Press 2 We're going to do the same analysis again except this time where going to find out the details for all the states not just New South Wales. We're going to use the Total Analysis option on the Menu now loaded.

Press 4 The computer will now load the Fields Menu we met when using option 3.

FIELDS MENU

Use SPACEBAR To move the selection box over to the other column.

Use --> To place the box on the field, State. We're going to analyse all the field items in this field.

Press RETURN We want this field.
Our selection is correct. The Single Analysis Fields Menu will now be displayed. That's the one we were using a moment ago.

We need the field, Bushranging Began.

To confirm the selection.

If the selected field is correct.

As we need to select the field again.

To confirm the selection.

If the selected field is correct.

We don't need any more fields. We will now select operators and field items.

To place the selection box over the $\geq$ operator.

To select it.

To confirm we want that operator.

This is the lower year we used in the previous analysis.

To place the box over the $\leq$ operator.

To confirm.

It is the correct operator.

This is the higher year in our formula. We will now be asked to connect the fields with an "AND" or "OR" operator.

The AND operator is the one we want.

To confirm the formula is correct. The computer will now analyse this formula by all the states, not just New South Wales. It will then tell us the results of the analysis. Things were pretty bad in New South Wales?
Press RETURN  We're going to the options. You'll notice we can graph this search as we've used part of option 3 to make it up.

Press 5  To do a graph. The computer will now load the graphing utility and display a graph of our analysis. Use the SPACEBAR to see the values and to go back to the graph.

Press ESC  To go back to the Databases Menu.

If you like you could select another field for Total Analysis, then make up another Search Formula and graph it.

DATABASES MENU  Press 2  We're going to the Bushrangers Menu to use the calculator on the Major Database.

Press 2  To load and display the calculator options.

CALCULATOR  Press 1  We'll do a simple subtraction on Ned Kelly. The computer will ask you to enter a Surname.

Enter KELLY  The given names of all bushrangers with the surname, Kelly, will be displayed.

Press 3  Ned's given name was Edward.

Press RETURN  We want to subtract the fields Year of Birth and Date of Death to find out how old he was when he died.

Use -->  To select the field Date of Death.

Press RETURN  To confirm the selection.

Press RETURN  The two fields are correct.
Press RETURN  We don't want a printout. The computer will now do the analysis and tell us he was 25 when he died.

Press ESC  We'll go back to the Calculator Menu now and do another analysis.

Press 2  Let's subtract the same fields for all bushrangers. A Fields Menu will be displayed - we will select the same 2 fields.

Press RETURN  For Year of Birth.

Use -->  To place the selection box over Date of Death.

Press RETURN  To confirm that field also.

Press RETURN  If the fields are correct.

Press RETURN  As we don't want a printout. The computer will now display the details of the bushrangers whose records it can analyse.

Press RETURN  We'll now see a mathematical analysis of the data. Most died young, didn't they.

Press ESC  To go back to the Calculator Menu.

Press 3  Let's do an analysis on one field, say Height.

Use -->  To place the selection box on the field, Height.

Press RETURN  To confirm the selection.

Press RETURN  If the selection is correct.

Press RETURN  We don't want a printout. The computer will now do the analysis.

Press RETURN  To see the statistics.

Press ESC  We'll now go back to the Calculator Menu and then to the Databases Menu.

Press ESC  To go back to the Databases Menu.
Press ESC To go back to the Main Menu.

If you want to use the calculator, I suggest you try option 2 to find out things like: how long after arrival in Australia did the bushrangers start their careers (Bushranging Began – Year Arrived) or how long after they were released for their first conviction were they convicted again? (2nd Conviction – Date 1st Ended).

Categories 3,4,5,6 and 7 can be selected from Disk 3. You will be asked to insert another disk and press RETURN to continue. You can go back to the Main Menu by pressing ESC.
WORKSHEETS
## WORKSHEETS SUMMARY

<table>
<thead>
<tr>
<th>WORKSHEET</th>
<th>DISK</th>
<th>TASKS</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>1</td>
<td>Data retrieval involving * General Information files. * the reference dictionary.</td>
</tr>
<tr>
<td>3</td>
<td>2</td>
<td>Data retrieval involving * the Word Search Utility. * Personal Stories files.</td>
</tr>
<tr>
<td>4</td>
<td>3</td>
<td>Analysis of the Major Database using the Calculator (option 2).</td>
</tr>
<tr>
<td>5</td>
<td>3</td>
<td>Simple analysis of the Major Database using a single field, an operator and a field item. (option 5).</td>
</tr>
<tr>
<td>6</td>
<td>3</td>
<td>Total analysis of the Major Database using a single field (option 3) and then 2 fields. (option 4).</td>
</tr>
<tr>
<td>7</td>
<td>3</td>
<td>Complex analysis of the Major Database using 2 or 3 fields and the intersection word <strong>AND</strong>. (option 5).</td>
</tr>
<tr>
<td>8</td>
<td>3</td>
<td>Complex analysis of the Major Database using 2 or 3 fields and the union word <strong>OR</strong>. (option 5).</td>
</tr>
<tr>
<td>9</td>
<td>3</td>
<td>Complex analysis of the Major Database using 3 or 4 fields and both the intersection word <strong>AND</strong> and the union word <strong>OR</strong> (option 5).</td>
</tr>
<tr>
<td>10</td>
<td>3</td>
<td>Complex analysis of the Major Database using fields from 2 menus (option 4).</td>
</tr>
</tbody>
</table>
WORKSHEET 1

Please use DISK 1 with this worksheet. The questions require you to retrieve information stored in files and to use the reference dictionary to look up the meaning of words.

From GENERAL
Select GENERAL HISTORY

1. For how many years were there bushrangers?

2. What is a BOLTER*?

3. When did the Wild Colonial Boys appear?

4. What is a BUSHRANGER*?

Select CONDITIONS

5. How many died during the voyage of the Second Fleet?

6. What is DYSENTERY*?

7. How many died during the voyage of the Third Fleet?

8. What is a DEPRESSION*?

Select CONVICT POLICY

9. What is TRANSPORTATION*?

10. What were the working hours for convicts in 1788?

11. What were the working hours for convicts in 1800?

Select PENAL SETTLEMENTS

12. Where is Norfolk Island?

13. What is a PENAL SETTLEMENT*?

14. When was Norfolk Island established as a Penal Settlement?

15. When did it stop being a Penal Settlement?

* use the dictionary (press D and then enter the word).
WORKSHEET 2

Please use DISK 1 with this worksheet. The questions require that you retrieve information from files, the dictionary and maps.

Select WORD SEARCH

1. What files have information on the year 1830?

2. Do any refer to the year 1860?

3. What files contain a reference to VICTORIA?

4. Which files contain the word HERO?

From the MAIN MENU
Select GENERAL

5. The computer told us that 3 files contain information on the year 1830. Briefly, explain what each says about that year.

A.

B.

C.

6. Four files contain some information on Victoria. What is it?

A.

B.

C.

D.
WORKSHEET 2 (cont)

From the MAIN MENU
Select BALLADS

8. Two Ballads contained the word hero. Who were the heros?

A. .................................................................

B. .................................................................

From the MAIN MENU
Select DICTIONARY

9. What did an ABSOLUTE PARDON do?..........................

...........................................................................

10. What rights did a CONDITIONAL PARDON give?..............

...........................................................................

11. What was meant by FREE BY SERVITUDE?......................

...........................................................................

12. What was a TICKET OF LEAVE?.................................

...........................................................................

From the MAIN MENU
Select MAPS

13. A number of bushrangers were active in Tasmania in 1825. What was the colonial name for Tasmania?

...........................................................................

14. In 1836, was Victoria a separate colony or part of the colony of New South Wales?

...........................................................................

15. When was the colony of Victoria established?

.............................................................................
WORKSHEET 3

Please use DISK 2 with this worksheet. The disk contains the Personal Stories of the bushrangers in the Major database. With this worksheet, you will need to obtain information using the Word Search utility and/or the stories.

Select WORD SEARCH

1. Which bushrangers operated near Campbelltown?

2. How many stories contain a reference to the year 1854?

3. How many of the bushrangers were sent to Norfolk Island?

4. How many of the bushrangers were imprisoned in a Hulk?

5. Were any imprisoned in the Sacramento?

From the MAIN MENU
Select STORIES

6. Who was Captain Moonlite?

7. Who were the other members of his gang?

8. In question 1, we found 3 bushrangers who operated in the Campbelltown district. In what other districts did they operate?
   A.
   B.
   C.

9. What does SEDITIOUS mean?

10. What was Frederick Ward's popular name?

11. Why did Black Caesar turn to bushranging?
WORKSHEET 4

Please use DISK 3 with this worksheet. You will be introduced to the Calculator which can be used to analyse numeric fields only.

From the MAIN MENU
Select DATABASES
Select MAJOR DATABASE
Select CALCULATOR
Select 1

1. How old was Edward (Ned) Kelly when he was first convicted of a crime?
   (enter name) (select Year of Birth and 1st conviction)

2. How old was Edward Kelly when he died?
   (enter name) (select Year of Birth and Date of Death)

3. Over how many years did Edward Kelly's bushranging take place?
   (enter name) (select 3rd Conviction and Bushranging Began)

4. How old was Daniel Morgan at his first conviction?
   (enter name) (select Year of Birth and 1st Conviction)

Select 2

5. How old was the youngest bushranger when he began bushranging?
   (select Year of Birth and Bushranging Began)

6. Were most bushrangers 30 years or younger when they started bushranging?

7. How many of the bushrangers began bushranging within 5 years of arrival in Australia?
   (select Bushranging Began and Year Arrived)

8. How many bushrangers were caught and convicted within a year of beginning their bushranging career?
   (select 1st Conviction and Bushranging Began)

Select 3

9. What was the average (mean) height of the bushrangers?
   (select Height)

10. How many were 181 cms or taller?

11. Over how many years (range) were the bushrangers a problem?
    (select Bushranging Began)

12. How many of the bushrangers had 4 convictions?
    (select No of Convictions)
WORKSHEET 5

Please use DISK 3 with this worksheet. You will need to select a field, an operator and a field item to answer all questions. Remember, brackets are inserted by the computer.

From the MAIN MENU
Select DATABASES
Select MAJOR DATABASE
Select 5

1. How many of the bushrangers were born in England? (Birthplace = England)
2. How many were born before 1830? (Year of Birth < 1830)
3. How many were NOT labourers? (Occupation <> Labourers)
4. How many were hung for their crimes? (Cause of Death = Hanging)
5. How many were 20 or younger when they died? (Age at Death <= 20)
6. How many were 20 or younger when they started bushranging? (Age <= 20)
7. How many had more than 2 convictions in Australia? (No of Convictions > 2)
8. Name the bushrangers who died of Natural Causes. (Cause of Death = Natural Causes)
9. Who was The Wild Scotsman? (Popular Name = The Wild Scotsman)
10. How old was he when he began bushranging? (select Display Individual Records)
11. In which state did he operate?
12. What was Ned Kelly's given name? (Popular Name = Ned Kelly)
13. How many times was Ned Kelly convicted of a crime? (select Display Individual Records)
14. Who were the other members of his gang? (enter CTRL G)
WORKSHEET 6

Please use DISK 3 with this worksheet. There are 2 options for the Total Analysis of a field by every item in that field. You will need to use option 3 to answer questions 1 to 7 and option 4 to answer questions 8 to 10. With option 3, you only need to select 1 field from a fields menu. With option 4, you will need to select 1 field from each of 2 fields menus.

From the MAIN MENU
Select DATABASES
Select MAJOR DATABASE
Select 3

1. List the field items in the field Birthplace?
   (select Birthplace)

2. How many of the bushrangers were born in Victoria?

3. Where was James Atterall born?
   (select Display Individual Records)

4. What were the various Causes of Death?
   (select Cause of Death)

5. What was the most common Cause of Death?

6. What was the most common Crime?
   (select Crime)

7. Graph the data. Write down the code for the most common Crime...
   (select Graph)

8. Were most of the bushrangers who landed in Sydney transported?
   (menu 1: select Arrival Status) (menu 2: select Port)
   (formula: port = Sydney)

9. How many bushrangers had blue eyes and brown hair?
   (menu 1: select Hair) (menu 2: select Eyes)
   (formula: eyes = blue)

10. Graph the analysis and write down the hair colour for P.
    (select Graph)
WORKSHEET 7

Please use DISK 3 with this worksheet. You will need to use the intersection word AND to answer all questions. Questions 11 and 12 require that you form a field block (2 fields) and then combine that block with the last field. The fields inside the inner brackets (dark print) should be combined first to form field block A.

From the MAIN MENU
Select DATABASES
Select MAJOR DATABASE
Select 5

1. How many of the bushrangers were born in New South Wales before 1840? (Birthplace AND Year of Birth) 

2. How many were born in New South Wales after 1840? (Birthplace AND Year of Birth)

3. What was the name of the bushranger who arrived in Sydney in the First Fleet (1788)? (Year Arrived AND Port)

4. Who had a fair complexion and red hair? (Complexion AND Hair)

5. Retrieve Martin Cash's record. Where was he born? (Given Name AND Surname)

6. Retrieve John Caesar's record. On which ship in the First Fleet was he transported? (Given Name AND Surname)

7. How many bushrangers with the given name, John, were born in England? (Given Name AND Birthplace)

8. How many of the bushrangers were hung for murder? (Cause of Death AND Crime)

9. How many were convicted of murder and not hung? (Cause of Death AND Crime)

10. How many of the bushrangers who operated in New South Wales were not free men when they began bushranging? (Status AND State)

11. Did any bushrangers with a fresh complexion have brown hair and hazel eyes? ((Complexion AND Hair) AND Eyes)

12. How many arrived in Sydney as free men prior to 1840? ((Port AND Arrival Status) AND Year Arrived)
WORKSHEET 8

Please use DISK 3 with this worksheet. You will need to use the union word OR to answer all questions. Questions 9 and 10 require that you form a field block (2 fields) and then combine that block with the last field. The fields inside the inner brackets (dark print) should be combined first to form field block A.

From the MAIN MENU
Select DATABASES
Select MAJOR DATABASE
Select 5

1. How many of the bushrangers were born in England or Scotland? (Birthplace OR Birthplace)

2. How many had their religion recorded as Catholic or Church of England? (Religion OR Religion)

3. How many bushrangers absconded or broke ticket of leave conditions to commence bushranging? (Status OR Status)

4. Were more than 20 bushrangers convicted of murder or wounding with intent? (Crime OR Crime)

5. How many of the bushrangers had black hair or black eyes? (Hair OR Eyes)

6. How many bushrangers were there who were born in England or whose religion was recorded as Church of England? (Birthplace OR Religion)

7. Did any of the bushrangers begin bushranging in 1840 or die in 1840? (Bushranging Began OR Date of Death)

8. How many of the bushrangers were ever convicted of larceny? (Conviction (Arrival) OR Crime)

9. How many of the bushrangers were born in the British Isles? (England, Ireland, Scotland) ((Birthplace OR Birthplace) OR Birthplace)

10. How many died by hanging, police gunfire or shooting? ((Cause of Death OR Cause of Death) OR Cause of Death)
WORKSHEET 9

Please use DISK 3 with this worksheet. You will need to use both the intersection word AND with the union word OR to answer all questions. Remember, brackets are inserted by the computer. The fields inside the inner brackets (dark print) must be combined first to form field block A.

From the MAIN MENU
Select DATABASES
Select MAJOR DATABASE
Select 5

1. Was the religion of any of the bushrangers born in England or Scotland recorded as Presbyterian?  
   \(((\text{Birthplace OR Birthplace}) \text{ AND Religion})\)

2. How many of the bushrangers born in England had their religion recorded as Catholic or Church of England?  
   \((\text{Birthplace AND (Religion OR Religion)})\)

3. How many sailors or soldiers began bushranging before 1830?  
   \((\text{Occupation OR Occupation}) \text{ AND Bushranging Began})\)
   Who were they? .................................................................

4. How many sailors or soldiers began bushranging during or after 1830?  
   \((\text{Occupation OR Occupation}) \text{ AND Bushranging Began})\)
   Who were they? .................................................................

5. Were any of the bushrangers convicted of cutting & maiming or wounding with intent, executed?  
   \((\text{Crime OR Crime}) \text{ AND Cause of Death})\)

6. How many New South Wales bushrangers were hung after 1849?  
   \((\text{State AND Cause of Death}) \text{ AND Date of Death})\)

7. How many bushrangers were over 175 cms tall with fair hair or a brown complexion?  
   \((\text{Height AND (Complexion OR Hair)})\)

8. Were any of the bushrangers who began bushranging before 1840 born in New South Wales or Victoria?  
   \((\text{Bushranging Began AND (Birthplace OR Birthplace)})\)

9. How many bushrangers were shot by police or executed before 1850?  
   \((\text{Cause of Death OR Cause of Death}) \text{ AND Date of Death})\)

10. Were more than 10 bushrangers with the given name, James, John or Edward, born in England?  
    \(((\text{Given Name OR Given Name}) \text{ OR Given Name}) \text{ AND Birthplace})\)
WORKSHEET 10

Please use DISK 3 with this worksheet. You will need to use option 4 to answer all questions. The first 5 questions require you to select one field from each of 2 fields menus. The order of selection is given.

The second set of 5 questions require you to select more than 1 field from the second menu and build a search formula.

From the MAIN MENU
Select DATABASES
Select MAJOR DATABASE
Select 4

1. What were the given names of all the bushrangers with the surname Kelly?
   (menu 1: select Given Name) (menu 2: select Surname)

2. What was the most common recorded religion for those bushrangers born in Ireland?
   (menu 1: select Religion) (menu 2: select Birthplace)

3. A number of bushrangers were executed for their crimes.
   What were these crimes?
   (menu 1: select Crime) (menu 2: select Sentence)

4. Where was bushranging the greatest problem before 1830?
   (menu 1: select State) (menu 2: select Bushranging Began)

5. What is the most common hair colour of the bushrangers with hazel eyes?
   (menu 1: select Hair) (menu 2: select Eyes)

6. What were the three most common given names of the bushrangers born in England or Scotland?

7. What was the most common occupation of the Australian born bushrangers?

8. A number of the bushrangers were convicts transported to Australia as a form of punishment. In what years did those who landed in Sydney arrive?

9. Were any of the Irishmen who arrived before 1840 recorded as free men?

10. What was the most common status of bushrangers who began bushranging between 1850 and 1860?
ACTIVITIES
ACTIVITY SHEET 1

The following questions are based on information in the Colonies file and in the Maps section on Disk 1.

1984: Draw the borders for all Australia's states and the Northern Territory.
Write in the names of the states.

1851: Which was the biggest colony in 1851?..............
Draw the borders for all the colonies at that time.

1836: Which colony was proclaimed on 28th December 1836 by John Hindmarsh?.............
Draw the borders for all the colonies at that time.
ACTIVITY SHEET 2

Answer the following questions by placing a tick against the answer you think is correct.

1. The word Hulk refers to
   [ ] (a) a very big and strong man;
   [ ] (b) a type of cart pulled by horses;
   [ ] (c) an old ship used as a prison.

2. The Bush Telegraph was
   [ ] (a) a telegraph line;
   [ ] (b) persons who passed information about police movements;
   [ ] (c) a means of sending information by smoke from fires.

3. Queensland's foundation year is
   [ ] (a) 1803;
   [ ] (b) 1859;
   [ ] (c) 1824.

4. A ship was sent soon after the arrival of the First Fleet to get supplies. Its name was
   [ ] (a) the Sirius;
   [ ] (b) the Endeavour;
   [ ] (c) the Alexander.

5. The Second Fleet arrived in 1790.
   [ ] (a) 267 died during the voyage;
   [ ] (b) nobody died during the voyage;
   [ ] (c) 7 died and 267 were ill on landing in Sydney.

6. Convicts in 1788 worked from sunrise to sunset, Monday to Friday and from sunrise to 10am on Saturdays.
   [ ] True    [ ] False

7. The first bushrangers were called bolters.
   [ ] True    [ ] False

8. They were healthier and stronger than the Wild Colonial Boys.
   [ ] True    [ ] False

9. The Wild Colonial Boys were very good horsemen who knew how to survive in the bush.
   [ ] True    [ ] False

10. Norfolk Island was established as a Penal Settlement in 1825.
    [ ] True    [ ] False
ACTIVITY SHEET 3

Use the clues to complete the crossword. You may use the Dictionary.

ACROSS

3. A bushranger was a .........

6. You can float down a river on it.

7. A chain gang was a group of prisoners chained together to prevent an ....... while working.

8. An Absolute Pardon restored ... rights and freedoms.

9. Bushrangers stole it from the diggers.

10. Many bushrangers rarely had ... clothing.

13. Some bushrangers were seen to be ......

15. A ... was often made of wood and bark.

17. In the 1860s, the bushrangers were called The Wild Colonial ....

DOWN

1. A penal settlement was a place of punishment for convicts who committed further offences after being .......... 

2. A prisoner would become Free by Servitude after serving his sentence .. full.

4. Larceny is a ....... term for stealing someone else's property

5. Settlers wanted it.

6. A Ticket of ...... was a form of freedom given to convicts.

11. Bushrangers stole the fastest ones.

12. A duffer stole ......, horses or sheep.

14. On occasions, the police were told to ...... bushrangers on sight.

16. Gold escorts were intended to protect gold shipments from bushrangers wishing to .... them.
ACTIVITY SHEET 4

The following exercises are written for Disk 1 only.

1. Prepare 10 True/False questions for your friends to try. Use data in the General Information files and write the answer codes upside down on the bottom of the page.

Write a heading for the questions giving details on where to find the answers and on the number of marks to score for a correct answer.

2. Make up a word puzzle of 10 questions from information in the Dictionary and the General Information files.

You may ask questions using words and their meaning, historical facts (in 1824, there was...), general information (early bushrangers were called...) or anything else you can find.

ACROSS

.............................................................
.............................................................
.............................................................
.............................................................
.............................................................
.............................................................
.............................................................
.............................................................

DOWN

.............................................................
.............................................................
.............................................................
.............................................................
.............................................................
.............................................................
.............................................................
.............................................................
ACTIVITY SHEET 5

In these activities, you will need to use data stored on all three Disks.

1. Match these bushrangers to their fate.

Black Caesar ....... a) hung
Captain Melville ....... b) shot by police
Captain Moonlite ....... c) shot
Captain Thunderbolt ....... d) died by accident
The Wild Scotsman ....... e) committed suicide

2. Match these bushrangers to the state in which they operated.

Frank Gardiner ....... a) Victoria
James Mc Pherson ....... b) Tasmania
Christopher Farrell ....... c) Western Australia
Martin Cash ....... d) New South Wales
Moondyne Joe ....... e) Queensland

3. Black Caesar was Australia's first bushranger. Prepare a prison record card on him using data in the Bushranger database and in the First Fleet database.

What were conditions like in 1788 and 1789? What effect did they have on Black Caesar?

4. Prepare a project sheet on your favourite bushranger using information in this database, book material, drawings and pictures.

5. You are a junior archivist who has just begun working for the government's Archives section. Select a year between 1830 and 1870 and prepare a historical report on everything that happened in that year.

Prepare histograms on the fields Bushranging Began and Bushranging ended, for an eleven year period of which your year is the central year.

Assume your reference is the Bushrangers database package.
ACTIVITY SHEET 6

The following questions are based on information in the General Information files on Disk 1.

1. The population of Australia in 1788 was 1,035 but in 1789, only one year later, it was 645.
   Why did it drop?

2. Why did many poor people and settlers support the bushrangers?
   Which people do you think disliked the bushrangers the most?

3. Why did many convicts run away and turn to bushranging?
   What sort of life did they have and what sort of conditions did they live under?
   Were the Wild Colonial Boys better off? Why?

4. The police and troopers found it was very difficult to catch bushrangers. What were some of the difficulties which confronted them.
   Why did they use Black Trackers?

5. Pretend you're a reporter for the Sun newspaper and the New Year is only 3 days off.
   Write an article on the events of the past year. You might use the heading "The Year That Was" or another one you like.
   (select a year between 1825 and 1865 and use Word Search to see what files refer to it)

6. The Legislation file gives details on a law passed in New South Wales in 1830 to control bushranging.
   A traveller, Sir James Forbes, was arrested without warning and taken to a police station because he looked like a bushranger. Assume you're Sir James and you've just returned home after being released by the police.
   Write a letter to the editor of the Sun newspaper giving details of what happened and what you think about the new law.

7. You've just been sent to Macquarie Harbour in Tasmania for stealing. The year is 1822. Write a letter to your family in England telling them what's happened to you since you arrived in the First Fleet and on the conditions at Macquarie Harbour.
ACTIVITY SHEET 7

1. Seven of the Ballads on Disk 1 refer to the most famous (or notorious depending on your point of view) of Australia's bushrangers.

Select a ballad and prepare a historical profile on that bushranger from the database and his personal story. If you select The Wild Colonial Boy, you will need to note that the ballad refers to John Donohoe.

Compare your record to the ballad.

Is the ballad historically inaccurate? If so, where?

Briefly, what does the ballad say about the bushranger and bushranging?

What does the ballad tell us about the person who wrote it?

Which group of people do you think supported the bushrangers and why?

What kind of person do you think this bushranger was?

If you had been a poor settler in those days, would you have helped him if asked or assisted in his capture or just not got involved.

2. Choose a bushranger who is not the subject of a ballad and prepare a historical record on him from the database and his personal story.

Write two short ballads about him (12-20 lines each). Think of him as a hero for your first ballad and as a villain for the second.

You may use parts of any or all of the ballads to create your own ones.
ACTIVITY SHEET 8

These activities use, in the main, information contained in the Minor Database on Disk 3.

1. Which state had the greatest problem with bushrangers in each of the following periods:
   a) 1788 - 1830
   b) 1831 - 1850
   c) 1851 - 1870
   d) 1871 - 1890

   Suggest any significant circumstance which can explain why that state had the most bushrangers.

2. There is a popular belief that Victoria had the largest number of bushrangers. Comment explaining why this popular view exists.

   Which states had practically no bushrangers? What could have been the reasons for this? Take into account the foundation and development of those colonies and other factors such as the discovery of gold.

3. Find out how many bushrangers started bushranging in New South Wales in the periods:
   a) 1861 - 1865
   b) 1866 - 1870
   c) 1871 - 1875

   A new law, The Felons Apprehension Act, was passed in 1865 to control the incidence of bushranging. Comment on whether its introduction was justified on the basis of these figures, and on its effectiveness (you may wish to compare the Victorian figures for the same period).

   Suggest other possible reasons for the decline in the incidence of bushranging.
ACTIVITY SHEET 9

These activities use the Minor Database and the Calculator utility on Disk 3.

1. Over 45% of the bushrangers in the Minor database were called Charles, Edward, George, Henry, James, John or William.

   What do these names have in common? Which three were the most popular names? Suggest why.

2. How many bushrangers operated
   a) alone ...........
   b) as a pair ........
   c) in a gang ........

   Select periods of 20 year intervals and compare the method of operation for those periods. Use percentages to see if there was any significant change through time. Comment on the changes and the possible reasons for them.

3. Use the Calculator to analyse the fields, Bushranging Began and Date of Death. What do the figures suggest?

4. In what ways were prison conditions in the 19th century different from what they are today? Comment on the effectiveness of a prison sentence in those days in deterring bushrangers from resuming their criminal career on release.

5. Find out which bushrangers with one conviction were executed by hanging. Either write down their names or obtain a print-out. Use the Calculator to find out how long after conviction each was executed.

   What does this and the Legislation file tell you about the legal system in that period?

6. A number of bushrangers in the Major database had more than one conviction. Use the Calculator to analyse the time difference between the completion of a sentence (Date Ended) and conviction. Do this for each of the 2nd, 3rd and 4th convictions and keep either a written record or a printout of the results.

   Do the figures suggest anything? Do you think it is statistically sound to compare the figures? Please explain.

   Identify those bushrangers with four convictions and comment on whether serving a prison sentence had any influence on their activities.
ACTIVITY SHEET 10

The following exercises can be answered using material on Disk 2 and material in various books on bushrangers.

1. The Eugowra Rocks robbery is an important part of Australia's bushranging history.
   a) Who were the members of the gang and who was its leader?
   b) Why was Eugowra Rocks a good place for a robbery?
   c) The gang didn't travel to the area as a group. Why not?
   d) How did the gang carry out the robbery?
   e) What difficulties did the guards have and why did they run away?
   f) What does the robbery tell you about the gang's leader?

2. Matthew Brady was the leader of Tasmania's largest gang of bushrangers.
   a) Prepare a story on Brady's life before he turned to bushranging?
   b) Why do you think he became a bushranger?
   c) Was he a good leader and, if so, what things did he do which showed he was a leader of men?
   d) Many people said Brady was bold and courageous. What evidence supports this view?
   e) Why was the Governor so determined to catch Brady?
   f) What steps did he take to do so?
   g) How was Brady captured and what happened to him?

3. Ned Kelly and his gang are the most famous of Australia's bushrangers.
   a) Write an article on the Kelly family prior to Ned becoming a bushranger.
   b) What incident turned Ned into a bushranger.
   c) Describe the ambush at Stringybark Creek.
   d) Why did Joe Byrne murder Aaron Sherritt? Why couldn't the police who were guarding Joe stop the murder?
   e) Why was the Kelly gang outlawed? What did this mean?
   f) Describe the shoot-out at Glenrowan Inn.
   g) Prepare a prison record for Edward Kelly.

4. Assume you're the historical writer for the Sun newspaper. Write a historical article on the life of one of these famous bushrangers.
   a) Ben Hall
   b) Mad Dan Morgan
   c) Captain Melville
   d) Captain Moonlite
   e) Captain Starlight
   f) Captain Thunderbolt
ADDENDUM A
The Major Database consists of 83 bushranger records each with up to 45 fields.

The Minor Database, on the other hand, consists of over 400 bushranger records each with 8 fields.

A number of fields in both databases have been specially coded and indexed to allow for the entire database to be loaded into the computer's memory for processing. In this way, we have avoided the necessity to frequently retrieve records from the disk for analysis.

Because of the incompleteness and unreliability of Australia's historical files, a number of records have fields with no data in them (indicated by a blank). These fields have been left empty, but can be used in the future if relevant data is found.

**THE MINOR DATABASE**

The valid fields for the Minor Database are:

- Code Number
- Surname
- Given Name
- Method
- Bushranging Began
- State
- Bushranging Ended
- Fate

**THE MAJOR DATABASE**

The valid fields for the Major Database are:

- Code Number
- Surname
- Given Name
- Popular Name
- Birthplace
- Occupation
- Year of Birth
- Religion
- Height
- Complexion
- Hair
- Eyes
- Year Arrived
- Port
- Arrival Status
- Ship
- Conviction

- Bushranging Began
- Status
- Age
- State
- Date of Death
- Cause of Death
- Age at Death
- Number of Convictions
- Conviction Date
- Crime
- Sentence
- Status at Completion
- Completion Date

(the last 5 fields are repeated for 2nd, 3rd and 4th convictions).
<table>
<thead>
<tr>
<th>FIELD</th>
<th>FIELD ITEMS</th>
</tr>
</thead>
<tbody>
<tr>
<td>CODE NUMBER</td>
<td>Not Displayed</td>
</tr>
<tr>
<td>SURNAME</td>
<td>SURNAME</td>
</tr>
<tr>
<td>GIVEN NAME</td>
<td>GIVEN NAME</td>
</tr>
<tr>
<td>METHOD</td>
<td>ALONE</td>
</tr>
<tr>
<td></td>
<td>PAIR</td>
</tr>
<tr>
<td></td>
<td>GANG</td>
</tr>
<tr>
<td>STATE</td>
<td>NEW SOUTH WALES</td>
</tr>
<tr>
<td></td>
<td>QUEENSLAND</td>
</tr>
<tr>
<td></td>
<td>SOUTH AUSTRALIA</td>
</tr>
<tr>
<td></td>
<td>TASMANIA</td>
</tr>
<tr>
<td></td>
<td>VICTORIA</td>
</tr>
<tr>
<td></td>
<td>WESTERN AUSTRALIA</td>
</tr>
<tr>
<td>FATE</td>
<td>ACCIDENT</td>
</tr>
<tr>
<td></td>
<td>DISAPPEARED</td>
</tr>
<tr>
<td></td>
<td>HANGING</td>
</tr>
<tr>
<td></td>
<td>KILLED AND EATEN</td>
</tr>
<tr>
<td></td>
<td>MURDERED</td>
</tr>
<tr>
<td></td>
<td>NATURAL CAUSES</td>
</tr>
<tr>
<td></td>
<td>POLICE GUNFIRE</td>
</tr>
<tr>
<td></td>
<td>PRISON SENTENCE</td>
</tr>
<tr>
<td></td>
<td>SHOOTING</td>
</tr>
<tr>
<td></td>
<td>SUICIDE</td>
</tr>
<tr>
<td></td>
<td>TURNED INFORMER</td>
</tr>
<tr>
<td>POPULAR NAME</td>
<td>BLACK CAESAR</td>
</tr>
<tr>
<td></td>
<td>CAPTAIN MELVILLE</td>
</tr>
<tr>
<td></td>
<td>CAPTAIN MOONLITE</td>
</tr>
<tr>
<td></td>
<td>CAPTAIN STARLIGHT</td>
</tr>
<tr>
<td></td>
<td>CAPTAIN THUNDERBOLT</td>
</tr>
<tr>
<td></td>
<td>NED KELLY</td>
</tr>
<tr>
<td></td>
<td>MAD DAN MORGAN</td>
</tr>
<tr>
<td></td>
<td>THE STRIPPER</td>
</tr>
<tr>
<td></td>
<td>THE WILD SCOTSMAN</td>
</tr>
<tr>
<td></td>
<td>MOONDYNE JOE</td>
</tr>
<tr>
<td></td>
<td>THE FRENCHMAN</td>
</tr>
<tr>
<td></td>
<td>BEN HALL</td>
</tr>
<tr>
<td>BIRTHPLACE</td>
<td>CANADA</td>
</tr>
<tr>
<td></td>
<td>ENGLAND</td>
</tr>
<tr>
<td></td>
<td>IRELAND</td>
</tr>
<tr>
<td></td>
<td>NEW SOUTH WALES</td>
</tr>
<tr>
<td></td>
<td>SCOTLAND</td>
</tr>
<tr>
<td></td>
<td>VICTORIA</td>
</tr>
<tr>
<td></td>
<td>WEST INDIES</td>
</tr>
<tr>
<td></td>
<td>QUEENSLAND</td>
</tr>
<tr>
<td>FIELD</td>
<td>FIELD ITEMS</td>
</tr>
<tr>
<td>---------------</td>
<td>--------------------------------------</td>
</tr>
<tr>
<td>OCCUPATION</td>
<td>BAKER</td>
</tr>
<tr>
<td></td>
<td>BLACKSMITH</td>
</tr>
<tr>
<td></td>
<td>BOOTMAKER</td>
</tr>
<tr>
<td></td>
<td>BUTCHER</td>
</tr>
<tr>
<td></td>
<td>CARPENTER</td>
</tr>
<tr>
<td></td>
<td>CIVIL ENGINEER</td>
</tr>
<tr>
<td></td>
<td>CLERK</td>
</tr>
<tr>
<td></td>
<td>COOK</td>
</tr>
<tr>
<td></td>
<td>FARMER</td>
</tr>
<tr>
<td></td>
<td>GARDENER</td>
</tr>
<tr>
<td></td>
<td>GROOM</td>
</tr>
<tr>
<td></td>
<td>HAIRDRESSER</td>
</tr>
<tr>
<td></td>
<td>HORSEBREAKER</td>
</tr>
<tr>
<td></td>
<td>LABOURER</td>
</tr>
<tr>
<td></td>
<td>MINER</td>
</tr>
<tr>
<td></td>
<td>PAINTER</td>
</tr>
<tr>
<td></td>
<td>PLASTERER</td>
</tr>
<tr>
<td></td>
<td>PRINTER</td>
</tr>
<tr>
<td></td>
<td>QUARRYMAN</td>
</tr>
<tr>
<td></td>
<td>SAILOR</td>
</tr>
<tr>
<td></td>
<td>SAWYER</td>
</tr>
<tr>
<td></td>
<td>SEAMAN</td>
</tr>
<tr>
<td></td>
<td>SHEARER</td>
</tr>
<tr>
<td></td>
<td>SOLDIER</td>
</tr>
<tr>
<td></td>
<td>STOCKMAN</td>
</tr>
<tr>
<td></td>
<td>STONEMASON</td>
</tr>
<tr>
<td></td>
<td>TINMAN</td>
</tr>
<tr>
<td></td>
<td>WEAVER</td>
</tr>
<tr>
<td>YEAR OF BIRTH</td>
<td>Numeric data (year)</td>
</tr>
<tr>
<td>RELIGION</td>
<td>CHURCH OF ENGLAND</td>
</tr>
<tr>
<td></td>
<td>PRESBYTERIAN</td>
</tr>
<tr>
<td></td>
<td>PROTESTANT</td>
</tr>
<tr>
<td></td>
<td>CATHOLIC</td>
</tr>
<tr>
<td>HEIGHT</td>
<td>Numeric data</td>
</tr>
<tr>
<td>COMPLEXION</td>
<td>BLACK</td>
</tr>
<tr>
<td></td>
<td>BROWN</td>
</tr>
<tr>
<td></td>
<td>DARK</td>
</tr>
<tr>
<td></td>
<td>FAIR</td>
</tr>
<tr>
<td></td>
<td>FLORID</td>
</tr>
<tr>
<td></td>
<td>FRESH</td>
</tr>
<tr>
<td></td>
<td>PALE</td>
</tr>
<tr>
<td></td>
<td>SALLOW</td>
</tr>
<tr>
<td></td>
<td>RUDDY</td>
</tr>
<tr>
<td>HAIR</td>
<td>BLACK</td>
</tr>
<tr>
<td></td>
<td>BROWN</td>
</tr>
<tr>
<td></td>
<td>FAIR</td>
</tr>
<tr>
<td></td>
<td>FLAXEN</td>
</tr>
<tr>
<td></td>
<td>LIGHT BROWN</td>
</tr>
<tr>
<td></td>
<td>LIGHT HAZEL</td>
</tr>
<tr>
<td></td>
<td>RED</td>
</tr>
<tr>
<td></td>
<td>SANDY</td>
</tr>
<tr>
<td>EYES</td>
<td>BLACK</td>
</tr>
<tr>
<td></td>
<td>BLUE</td>
</tr>
<tr>
<td></td>
<td>BROWN</td>
</tr>
<tr>
<td></td>
<td>DARK BLUE</td>
</tr>
<tr>
<td></td>
<td>DARK BROWN</td>
</tr>
<tr>
<td></td>
<td>DARK · GREY</td>
</tr>
<tr>
<td></td>
<td>GREY</td>
</tr>
<tr>
<td></td>
<td>GREY</td>
</tr>
<tr>
<td></td>
<td>HAZEL</td>
</tr>
<tr>
<td>FIELD</td>
<td>FIELD ITEMS</td>
</tr>
<tr>
<td>------------------------</td>
<td>--------------------------------------------------</td>
</tr>
<tr>
<td>YEAR ARRIVED</td>
<td>Numeric data (year)</td>
</tr>
<tr>
<td>PORT</td>
<td>SYDNEY, MELBOURNE, HOBART, ADELAIDE, BRISBANE, FREMANTLE, BORN HERE</td>
</tr>
<tr>
<td>STATUS ON ARRIVAL</td>
<td>FREE, TRANSPORTED, EXILE</td>
</tr>
<tr>
<td>SHIP</td>
<td>Ship's name</td>
</tr>
<tr>
<td>CONVICTION</td>
<td>FELONY, FORGERY, HIGHWAY ROBBERY, HOUSEBREAKING, INTENT TO ROB, LARCENY, ROBBERY, STEALING</td>
</tr>
<tr>
<td>BUSHRANGING BEGAN</td>
<td>Numeric data (year)</td>
</tr>
<tr>
<td>STATUS</td>
<td>FREE, ABSCONDER, ESCAPEE, TICKET-OF-LEAVE</td>
</tr>
<tr>
<td>AGE</td>
<td>Numeric data (years)</td>
</tr>
<tr>
<td>STATE</td>
<td>NEW SOUTH WALES, VICTORIA, TASMANIA, QUEENSLAND, SOUTH AUSTRALIA, WESTERN AUSTRALIA</td>
</tr>
<tr>
<td>DATE OF DEATH</td>
<td>Numeric data (day,month,year)</td>
</tr>
<tr>
<td>CAUSE OF DEATH</td>
<td>ACCIDENT, HANGING, MURDERED, NATURAL CAUSES, POLICE GUNFIRE, SHOOTING, SUICIDE</td>
</tr>
<tr>
<td>AGE AT DEATH</td>
<td>Numeric data</td>
</tr>
<tr>
<td>FIELDS</td>
<td>FIELD ITEMS</td>
</tr>
<tr>
<td>----------------</td>
<td>-----------------------------------------------------------------------------</td>
</tr>
<tr>
<td>NO OF CONVICTIONS</td>
<td>Numeric data</td>
</tr>
<tr>
<td>CONVICTION DATE</td>
<td>Numeric data (day, month, year)</td>
</tr>
<tr>
<td>CRIME</td>
<td>ARSON, Assault, Attempted Murder, Bank Robbery, Burglary, Cattle Stealing,</td>
</tr>
<tr>
<td></td>
<td>Cutting &amp; Maiming, Escape from Custody, Forgery, Fraud, Highway Robbery,</td>
</tr>
<tr>
<td></td>
<td>Horsestealing, Insulting Language</td>
</tr>
<tr>
<td>SENTENCE</td>
<td>Death, Life Imprisonment, Ticket of Leave Cancelled, Life Commuted to 10</td>
</tr>
<tr>
<td></td>
<td>Years, Death Commuted to Life, Death Commuted to 15 Years, Death Commuted</td>
</tr>
<tr>
<td></td>
<td>to 5 Years, Numeric data (years)</td>
</tr>
<tr>
<td>COMPLETION DATE</td>
<td>Numeric data (Day, Month, Year)</td>
</tr>
<tr>
<td>STATUS</td>
<td>Died, Escaped, Executed, Freedom by Remission, Full Pardon, Liberation in</td>
</tr>
<tr>
<td></td>
<td>Colony, Sentence Completed, Ticket of Leave, Sent into Exile</td>
</tr>
</tbody>
</table>
GENERAL COMMENTS

Material for the bushrangers database has been gathered from a variety of sources including books, government publications, library collections, newspapers and official records.

It should be noted that in some instances these sources revealed conflicting information and also indicated that some "facts" were erroneously recorded. There is bound to be a certain amount of guesswork, myth and prejudice in our historical records and books, thus making it very difficult, if not impossible, to eliminate errors.

With regard to official records, we would point out that they were incomplete, often vague or silent on particular points, in part subjective and in part reliant upon the honesty of officials and prisoners.

We have endeavoured to ensure that the data contained in this package is as complete and accurate as possible, and would welcome any advice which either fills in a gap or identifies an error.

Following is information on the nature of the fields and the data contained in them.

MINOR DATABASE

SURNAME
Where sources disagreed on the spelling of a surname, we used that name recorded in official records or notices.

GIVEN NAME
In most cases, the bushranger's first full Given Name has been recorded. It should be noted that in the early days of colonial settlement, officials and newspapers tended to avoid using given names preferring to address convicts as: convict Wilson, convict Jones, etc. We were unable to find given names in a number of cases because of this.

METHOD
We have classified bushrangers into three categories, those believed to have largely acted alone, those who had one partner and those who were part of a gang.

STATE
The area in which a bushranger mainly operated is recorded in terms of modern State boundaries. It is important to note the emphasis on "mainly" and also that colonial boundaries have not been used in this regard.
FATE

Under this heading, we have recorded what happened or is believed to have happened to the bushranger at the end of his bushranging career. In many cases the fate of the bushranger is well known - he was either shot or executed. However, some faded from history and nothing further was heard about them.

BUSHRANGING BEGAN

This field records the year in which a bushranger began his activities. The year could be inaccurate for a variety of reasons: the definition of what constituted an act of bushranging; minor bushranging not reported to the authorities; lack of identification; concealment by the bushranger of his past activities; and so on. Most of the data for this field was collected from Government notices and books.

BUSHRANGING ENDED

In many cases, the exact date when a bushranger stopped his activities is not known. We have therefore only recorded the year in which each bushranger is believed to have ceased bushranging. The information in this field is generally accurate, particularly for those bushrangers who appeared in court or who were shot by police or troopers. In a number of cases, lesser known bushrangers just faded from history.

MAJOR DATABASE

SURNAME (details in Minor Database section)

GIVEN NAME (details in Minor Database section)

POPULAR NAME

Several bushrangers were known by a name other than their true name. Examples include Captain Starlight, Captain Thunderbolt and The Wild Scotsman. Recorded in this field are those popular names which are well known today and most often referred to by historians and writers.

BIRTHPLACE

The country of birth is recorded for those bushrangers born outside Australia and the State of birth for those who were Australian born. The States are identified in terms of modern boundaries. Official records were the main source of data for this field.
<table>
<thead>
<tr>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>OCCUPATION</td>
<td>The data for this field was gathered mainly from official records. There were anomalies in classifying occupations, for example, the records tended to list Australian stockmen as labourers rather than stockmen.</td>
</tr>
<tr>
<td>YEAR OF BIRTH</td>
<td>There were instances of conflicting information on a bushranger's year of birth. Generally, the variation was only of a minor nature, usually a year. Official records were generally used as the authoritative source.</td>
</tr>
<tr>
<td>RELIGION</td>
<td>We have to be somewhat suspicious of data in this field. We suspect that in some instances, officials labelled people by their birthplace, for example, the Irish as Catholics. Official records were generally used as the authoritative source.</td>
</tr>
<tr>
<td>HEIGHT (cms)</td>
<td>Almost all the data for this field came from official records (expressed in feet and inches). This data could be inaccurate for a variety of reasons: the carry forward of personal details from one record to another without any allowance for aging; an estimate of height by an official; attempts by bushrangers to disguise their height by giving false information; and so on.</td>
</tr>
<tr>
<td>COMPLEXION</td>
<td></td>
</tr>
<tr>
<td>HAIR</td>
<td>Data for all these fields came from official records. These records would contain some inaccuracies, particularly where a subjective judgement was made. It should be noted that physical details are recorded at a point in time and therefore records usually do not reflect changes caused by the environment or aging.</td>
</tr>
<tr>
<td>EYES</td>
<td></td>
</tr>
<tr>
<td>YEAR ARRIVED</td>
<td></td>
</tr>
<tr>
<td>PORT</td>
<td></td>
</tr>
<tr>
<td>STATUS ON ARRIVAL</td>
<td></td>
</tr>
<tr>
<td>SHIP</td>
<td></td>
</tr>
<tr>
<td>CONVICTION</td>
<td>All these fields relate to those bushrangers born outside Australia. The data was collected from a variety of sources. We found a few references to bushrangers who manufactured details of their past, particularly on how they came to Australia. In the Conviction field we have recorded the crime which led to transportation.</td>
</tr>
</tbody>
</table>
BUSHRANGING BEGAN
This field records the year in which a bushranger began his activities. The year could be inaccurate for a variety of reasons: the definition of what constituted an act of bushranging; minor bushranging not reported to authorities; lack of identification; concealment by the bushranger of his past activities; and so on. Most of the data for this field was collected from Government notices and books.

STATUS
The official status of a bushranger at the time he began bushranging is recorded in this field. A free person may be free by birth, free by pardon or free by completion of sentence. Those who ran away from assigned service have been classified as absconders, those who escaped from prison, a penal settlement or a chain gang as escapees and those who broke ticket of leave conditions as Ticket of Leave. Official documents including government notices and reward posters were the main source of data for this field.

AGE
The figure recorded in this field is approximate only as it was calculated by subtracting the year of birth from the year bushranging began. Day and month details for both fields could not be determined in the majority of cases.

STATE
The area in which a bushranger mainly operated is recorded in terms of modern state boundaries. It is important to note the emphasis on "mainly" and also that colonial boundaries have not been used in this regard.

DATE OF DEATH
The data for this field was gathered mainly from official documents, newspaper reports and authoritative books. In those cases where the exact date could not be identified, we recorded those details which were found, for example month and year, or just year only.

CAUSE OF DEATH
We have recorded in this field the official version of cause of death. Folk lore or populace versions, for example, describing the shooting of a bushranger by police as murder, have been ignored. Data for this field was collected from official documents, newspaper reports and other sources. Bushrangers killed by their companions or by others illegally, have been recorded as murdered. Those shot and killed by black trackers, the police or troopers have been recorded as death by police gunfire. Those shot and killed by civilians such as bounty hunters, convicts, settlers, etc. have been recorded as death by shooting.
<table>
<thead>
<tr>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>AGE AT DEATH</td>
<td>This figure is approximate only as it was calculated by subtracting year of birth from the year component of date of death. Day and month details for the field, Year of Birth, could not be determined in the majority of cases.</td>
</tr>
<tr>
<td>NO OF CONVICTIONS</td>
<td>This field records the number of convictions listed in the bushranger's record. The convictions recorded are from official records and represent all Australian court convictions we found for the bushranger. It should be noted that the recorded data covers the period before and after a bushranger began his bushranging career.</td>
</tr>
<tr>
<td>CONVICTION DATE</td>
<td>The actual date of conviction where available has been recorded in this field. Where the exact date could not be identified, we recorded those details which were found, for example, month and year or just year only. The sources for this data were official records and newspapers, however, we would point out that in some cases, the trial date could have been recorded in prison records as the conviction date.</td>
</tr>
<tr>
<td>CRIME</td>
<td>The major crime leading to a conviction has been recorded. In some cases, the precise wording of a crime differs slightly from the title in the database. For example, mail robbery and robbery of His Majesty's mail are both recorded as Mail Robbery. Official records, historical documents and publications were the main source for this data.</td>
</tr>
<tr>
<td>SENTENCE</td>
<td>Information recorded in this field ranges from the death sentence to a prison sentence recorded in years. For a variety of reasons, we decided not to include details of whether any part or the whole of a prison sentence was to be served &quot;in irons&quot; or &quot;on the roads&quot;, etc. In many cases, such information would have been misleading as court decisions sentencing a bushranger to serve time &quot;on the roads&quot; were not implemented, nor was there any likelihood that they would be.</td>
</tr>
<tr>
<td>COMPLETION DATE</td>
<td>The date a prisoner left official custody either through execution, death due to other causes, release or escape is recorded in this field. The sources for this data were official records and books. Where the exact date could not be found, we recorded those details which were found, for example, month and year or just year only.</td>
</tr>
<tr>
<td>STATUS</td>
<td>The status of the prisoner at Completion Date is recorded in this field.</td>
</tr>
</tbody>
</table>
ADDENDUM B
ADDENDUM B

THE PRINTER

The ability to print the contents of any file or record in The Bushrangers Database package was a primary objective in its design.

Programs have been written to recognise a serial or parallel printer card provided it is located in slot 1 of your computer.

DO NOT INSERT THE CARD WHILE THE COMPUTER IS TURNED ON.

If you wish to use your printer to print histograms (see page 49) and you're sure it will do so, then enter the command code using the Printer utility on Disk 3 (see page 34).

HAVING PROBLEMS?

THE BELL SOUNDS THREE TIMES

This indicates that what is currently displayed on your screen cannot be printed. The print commands CTRL P and CTRL S cannot be used to print a Menu, a Map or data from a dictionary.

NOTHING HAPPENS AND THE PROGRAM STOPS

There are a number of possible explanations for this:

1. the printer card is not in slot 1. Check by removing the computer's cover. If you need to transfer or insert a card, make sure the computer is turned OFF before doing so.

2. the printer is not turned on or receive mode has not been enabled. Turn your printer on or press the receive mode button (and RETURN if necessary). If nothing happens, you will have to re-start the disk.

3. the printer has run out of paper (most printers emit a warning sound when this happens). Insert paper. If nothing happens, you will have to re-start the disk.

THE PRINTER WON'T PRINT HISTOGRAM GRAPHS

Your printer must be capable of printing screen graphics to use the CTRL S option on disk 3. Further, the graphs utility must be told the command code for your particular printer. Use the Printer utility on disk 3 to enter the command code if you have not already done so.

If you have not identified the reason for your problem, check for other possible causes as per 1 to 3 above.

AND NOTHING FIXES THE PROBLEM

Try your printer and printer card with another package or list a program to make sure both are working properly. If both are in working order, ring KnowWare on (042) 94.1829 giving us details of your problem and your equipment.
ADDENDUM C
0-3 ) You may have attempted to run one of our programs without first booting the disk
5 ) DOS or Applesoft error or
7 ) You could have encountered a fault in a program. If this is suspected, contact Know Ware and give us details of the error and when and how it occurred. We will correct any program faults and replace disks if necessary.
9-254 )

DISK OPERATING SYSTEM

Each disk contains a high-speed operating system called diversi-dos (TM), which is licensed for use with this package only. To legally use diversi-dos with other programs, you may send $US30 directly to: DSR, Inc., 5848 Crampton Ct., Rockford, Ill. 61111. United States of America. You will receive a diversi-dos utility disk with documentation.
ADDENDUM D
Absconder
Absentee
Absolute Pardon
Approver
Assigned
Bail up
Banditti
Black Tracker
Bolter
Brigand
Bushman
Bushranger
Bushranging
Bush Telegraph
Chain Gang
Colony
Committed
Conditional Pardon
Crusher
Debility
Digger
Diggings
Duffer
Duffing
Dysentery
Flogging
Free by Servitude
Free Pardon
Gallows
Gold Escort
Gully Raker
Hawker
Highwayman
Hulk
Insobriety
Larceny
Lashes
Macquarie Harbour
Moreton Bay
Mounted Police
Newcastle
Norfolk Island
Overseer
Pass
Penal Settlement
Pneumonia
Point Puer
Port Arthur
Port Macquarie
Pound
Rationing
Remitted
Road Parties
Runaway
Seditious
Station
<table>
<thead>
<tr>
<th><strong>ALL WORDS AND MEANINGS</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Absconder</strong></td>
</tr>
<tr>
<td><strong>Absentee</strong></td>
</tr>
<tr>
<td><strong>Absolute Pardon</strong></td>
</tr>
<tr>
<td><strong>Approver</strong></td>
</tr>
<tr>
<td><strong>Arsonist</strong></td>
</tr>
<tr>
<td><strong>Assigned</strong></td>
</tr>
<tr>
<td><strong>Bail Up</strong></td>
</tr>
<tr>
<td><strong>Bailed Up</strong></td>
</tr>
<tr>
<td><strong>Banditti</strong></td>
</tr>
<tr>
<td><strong>Black Tracker</strong></td>
</tr>
<tr>
<td><strong>Bobbery</strong></td>
</tr>
<tr>
<td><strong>Bolter</strong></td>
</tr>
<tr>
<td><strong>Brigand</strong></td>
</tr>
<tr>
<td><strong>Bushman</strong></td>
</tr>
<tr>
<td><strong>Bushranger</strong></td>
</tr>
<tr>
<td>Term</td>
</tr>
<tr>
<td>--------------------</td>
</tr>
<tr>
<td>Bushranging</td>
</tr>
<tr>
<td>Bush Telegraph</td>
</tr>
<tr>
<td>Carcass</td>
</tr>
<tr>
<td>Chain Gang</td>
</tr>
<tr>
<td>Cockatoo</td>
</tr>
<tr>
<td>Colony</td>
</tr>
<tr>
<td>Commuted</td>
</tr>
<tr>
<td>Conditional Pardon</td>
</tr>
<tr>
<td>Crusher</td>
</tr>
<tr>
<td>Debility</td>
</tr>
<tr>
<td>Depression</td>
</tr>
<tr>
<td>Destitute</td>
</tr>
<tr>
<td>Digger</td>
</tr>
<tr>
<td>Diggings</td>
</tr>
<tr>
<td>Dray</td>
</tr>
<tr>
<td>Duffer</td>
</tr>
<tr>
<td>Duffing</td>
</tr>
</tbody>
</table>
Dysentery is a disease which causes vomiting or diarrhoea. It is usually spread by contaminated food or water.

A term for an ex-convict who had been pardoned or who served his/her sentence.

A person, usually a convict, who was used to flog another with a whip called a cat-o'-nine-tails.

Many convicts were flogged with a whip called a cat-o'-nine-tails.

The making of a false document or the changing of an existing document is a crime called Forgery.

A term used for a prisoner who served his sentence in full before being freed.

A means of release for a prisoner: complete and unconditional.

An apparatus used to execute criminals by hanging.

A Gold Escort consisted of a group of police or troopers protecting gold as it was moved by road.

One who illegally acquired cattle or horses branded or unbranded, which strayed into gullies or other secluded places.

A person who gave shelter and food to a criminal.

A person who goes about offering goods for sale.

A common term for the robbery of travellers and coaches on public roads.

A common description for robbers who bailed up and robbed travellers and coaches on public roads.

A dismantled ship used as a prison: often described as a hell ship because of the bad physical conditions on board.

A term used for a person who supplied information to the police.

An Inn is a place open to the public for drinking and lodgings.
<table>
<thead>
<tr>
<th>Term</th>
<th>Definition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Superintendent</td>
<td>An official ranked above overseer in the control and supervision of convicts.</td>
</tr>
<tr>
<td>Ticket of Leave</td>
<td>A Ticket of Leave was a form of freedom given to convicts who could then employ themselves or buy property on condition that they remained in a certain district.</td>
</tr>
<tr>
<td>Torturer</td>
<td>A person who inflicts severe physical pain on another person against his will.</td>
</tr>
<tr>
<td>Transportation</td>
<td>The movement of convicts to overseas colonies as a part of punishment.</td>
</tr>
<tr>
<td>Trap</td>
<td>A term for a mounted policeman.</td>
</tr>
<tr>
<td>Trooper</td>
<td>A term used to describe a mounted policeman.</td>
</tr>
</tbody>
</table>
West, John, The History of Tasmania, Angus and Robertson, Australia, 1971.


White, Charles, Short-Lived Bushrangers, Sydney, 1911.


NEWSPAPERS

New South Wales Advertiser.
Sydney Gazette.
The Hobart Town Gazette.
The Launceston Advertiser.

GOVERNMENT

Archives Office of New South Wales.
Archives Office of Tasmania.
La Trobe Collection, State Library of Victoria.
Mitchell Library, State Library of New South Wales.
Public Records Office of Victoria.