ODESTA

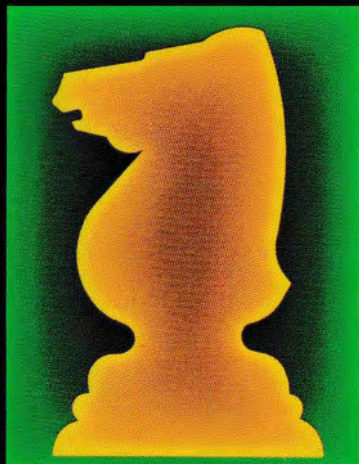*How About A Nice Game of*

CHESS!

*A Very Special Program
with Unique Features Designed to
Teach CHESS to a Beginner
& Help Any Player
Play Better
CHESS.*

Based on ODESTA's Acclaimed
Chess 7.0 by Larry Atkin
"The Best In Chess"

Helps Develop Creative
Problem-Solving Skills
for Ages 8 to Adult

*How
About
A Nice Game
of*

CHESS!
By Larry Atkin

Odesta

Odesta develops and publishes intelligent software for microcomputers, specializing in problem-solving business applications, and in programs that explore the nature of the learning process. Programs are designed to optimize the use of the computer by a non-technical person.

One of the distinguishing characteristics of Odesta software is the combination of ease-of-use with extensive user-oriented features in each program.

We are located at 3186 Doolittle Drive, Northbrook, Illinois 60062 (U.S.A.), and welcome requests for product information.

CONTENTS

Welcome to How About A Nice Game of CHESS!

In the manual, "CHESS" is the program, and "chess" is the game.

This manual is meant to be paged through at your leisure. Feel free to dip in here and there to discover new ways to have fun with the program. You can not damage anything with your experiments, so use your imagination.

CONDITIONAL FEATURES

ADVICE
↕OPTION
BACK
REPLAY
PROGRAM
RERUN
RESUME

MAIN MENU

FLIP
CHANGE
LEVEL
LIST
INWARD
OUTWARD
↓BOARD
MANUAL
SWITCH
AUTO
RESTART
QUIT
↓TUTOR

How About A Nice Game of CHESS!

WHITE
CHESS
CH1 CH2 CH3 CH4 CH5 CH6
CHECKMATE
START NEW GAME

MOVE DISPLAY—Shows the coordinates for each move.

TUTOR MENU—Allows access to all tutorial features.

MESSAGE LINE—Shows checks, mate, prompts, etc.

DOCUMENTATION LINE—Shows description of each feature or each section of a tutorial chapter.

THINGS EVERYONE SHOULD KNOW

✔ The **CHESS** disk must remain in the drive 1 unit as long as you are using the program. The disk will need to be accessed from time to time.

✔ You may fully use this program with a game paddle controller, or the keyboard. If using the keyboard, all functions may be controlled with the right and left Arrow keys, and the **RETURN** key.

For simplicity, throughout this manual the symbol ↔ refers to the rotating knob on the game paddle and the Arrow keys on the computer keyboard.

The ⊙ symbol refers to the push button on the game paddle, which usually performs the same function as pressing **RETURN** on the keyboard. Therefore, RETURN ⊙ means that if you are using the keyboard, press **RETURN**; and if you are using a game paddle, press and release the button.

For those using game paddles, some features are only visible when the paddle button is depressed. In these cases, the description of the feature will show ⊙ (press) to activate, and ⊙ (release) to return to normal. See STEP-BY-STEP for some additional information.

✔ When the **CHESS** program is first loaded, it will begin running a short (but repeated) demonstration routine that shows some basic procedures for using the program. Messages will appear at the bottom of the screen explaining what you are to do. To stop the demo and activate the program, you must press RETURN ⊙.

✔ When playing a game and it is the **CHESS** program's turn to move, no features can be activated until after **CHESS** has made its move. The list of features will disappear and be replaced by the one word, "STOP?". Pressing RETURN ⊙ will stop **CHESS** from continuing to "think" about its move, and the best move found so far will be made. The features will then re-appear, and you will be in full control once again.

✔ Features are only visible on the "menu" when they can be used. Various features are dependent on pre-existing conditions before they can be activated. For instance, BACK (take back a move) will not be visible until the first move in a game has been made.

✔ If you get a **DISK ERROR** message on the message line, it means that the program was unable to obtain useable information when referring to the disk. After making sure that the **CHESS** disk is in place in drive 1, press RETURN ⊙. You should be able to continue with your use of the program. If a **DISK ERROR** message persists, you may need to have your disk drive head cleaned or the drive "tuned up".

QUICK START:
How to not read this manual and still play a game.

✔ Read THINGS EVERYONE SHOULD KNOW

✔ Consult the brief messages at the bottom of the screen as each option is selected.

←BOARD moves the cursor to the chessboard. ↕OPTION moves the cursor from the board to the menu.

To move a chess piece select it with the cursor. Press RETURN ◉◯. Select a square to move to with the cursor. Press RETURN ◉◯. The move will be made and CHESS will begin to respond.

Skill Levels

Ø—basic introductory level. CHESS moves in under one second.
2—intro. level. CHESS averages about 5 seconds/move + OPENING LIBRARY.
5—moderate strength. CHESS averages 20-40 seconds/move.

For level info., see LEVEL in dictionary.

REPLAY and RESUME depend on moves that are still "in memory", but have been "taken back" as far as the game on the board is concerned. Experiment and use the prompts on the display, or consult the FEATURES DICTIONARY (or the STEP-BY-STEP GUIDE).

✔ RESTART will set-up a new game and ERASE ALL PREVIOUS MOVES FROM MEMORY.

✔ Advice is often available only on levels above 3 due to limitations in evaluation time.

● CHANGE is used to set-up a special position. Certain "legal" conditions must be met before you can exit this feature.

● The special instructional and reference material contained in this program is reached by ←TUTOR. Each "CH" entry refers to a chapter in the manual, containing a basic introduction to the how and why of various types of chess play.

All of the "CH" entries and their related "sub" menus are explained on the documentation line.

● There is much more information to be obtained in the various sections of this manual. The FEATURES DICTIONARY is the definitive reference. STEP-BY-STEP is a detailed guide to the basic functions needed to enjoy a game (and more).

AN INTRODUCTION TO
HOW ABOUT A NICE GAME OF CHESS!

The first thing that we do after confronting you with this weighty manual is to try to convince you that you don't really need it to get around in the program. The messages that appear at the bottom of the screen tell you what the options are. If you get into trouble, the FEATURES DICTIONARY is always here in the manual, conveniently arranged in alphabetical order so that you can quickly find whatever feature you wish to learn more about. After all, the main idea is to play chess! The features and this guide have been provided to add to your enjoyment and understanding of the game, and not to be a barrier to playing.

The first third of this user's guide is devoted to giving you the most information possible about the CHESS program. The STEP-BY-STEP guide is a painless exploration of exactly how most of the features work. The RULES OF THE GAME defines some special chess terms, and tells you how to make special moves such as "castling" and "en passant".

The "tutorial" section of the manual is designed expressly for newcomers to chess, and as a "refresher" course for those who don't play frequently. It is packed with diagrams and interesting tips on the play of the game. It also serves as a comprehensive guide to the problems and exercises that are found on the CHESS disk. There is a lot of material here, and you can take it at your own pace. Again, the manual can be considered to be supplementary material, since all of the selections you can make from the program's special menus are explained on the screen. In addition, the on-screen demonstrations have their own running commentary that emphasizes the highlights of what is explained in the text.

Before using the options on the TUTOR menu, you should read the explanation at the end of Chapter One.

The concepts and strategies presented here were selected to help beginning players quickly improve their understanding of both the basic and some of the more subtle aspects of chess play. The recommendations given are not to be thought of as "laws", but simply as ideas that have developed over the years as useful guidelines.

As you gain experience your understanding will grow, and you may find that you need to enlarge upon some of these ideas to better suit more complex strategies.

We think that you will enjoy using How About a Nice Game of Chess! as much as we enjoyed constructing it.

This section of the manual provides a detailed introduction to the **CHESS** program. By the time you have finished this tour, you will know everything you need to play a game and use the game-oriented features. It is assumed that you have read the first part of the manual—THINGS EVERYONE SHOULD KNOW. Feel free to leave STEP BY STEP at any time and go exploring on your own. You can always re-enter where you left off, or consult the FEATURES DICTIONARY for in-depth information. Now...let's begin.

Insert the **CHESS** disk into drive number 1 (label side up and towards you). Turn on the computer. The disk will automatically load into the computer. If this does not work, or the computer is already on, "boot" the disk in the normal way for your system.

You have just "booted" your **CHESS** disk in drive number 1. After a few seconds, the program will be loaded into the computer.

The program will begin with a demonstration on how to move the chess pieces on the board. This "demo" will repeat endlessly.

To stop the demo and begin using the program, you will have to press either the button on one of the game paddles, or the **RETURN** key on the computer keyboard.

● If you press the paddle button ⊚, the computer will respond to commands from the controller, and you may still use the keyboard at any time.

● If you will be only using the keyboard, press **RETURN**. The computer will now respond **ONLY** to commands from the keyboard.

After making your choice, the demo will stop, and you will have control over the cursor movements. While looking over the following notes, you can begin your **CHESS** experience by rotating the game paddle knob ⟷, or by pressing either of the Arrow keys ⟷. These controls are harmless. Nothing will actually be done to anything until you press the paddle button ⊚ or **RETURN**.

✔ REMEMBER: The **CHESS** disk must remain in the drive unit at all times during the game.

If you are using the keyboard, you will quickly notice that the **LEFT** Arrow ← moves the cursor up the list, and the **RIGHT** Arrow → moves the cursor down (the cursor is the "block" graphic that highlights each word as it passes over it). Since it is the only thing moving on the screen as you push the Arrow keys ⟷ at this time, the cursor should be easy to recognize. If you reach the top or bottom of the list, continue to press the same key and see what happens. The cursor will automatically "fold over" to the other end of the list. Therefore, either key may reach any of the features, but the "LEFT—up, RIGHT—down" characteristics will be useful to remember for quick access to any feature.

● **CONCISE DEFINITIONS** of the features appear near the bottom of the display as each feature is "selected" by the cursor. Some "prompts" also appear there. Take a look.

When you first load the program, you are always set to play at level Ø. This is an introductory level, and therefore will not play a strong game. However, even for a strong chess player, it provides a convenient avenue of familiarization with the program. The playing responses are very quick (under 1 second).

MAKE YOUR FIRST CHANGE:

1. Using ⟷ (REMEMBER: paddle controller knob—or—Arrow keys), move the cursor to **FLIP** (near the top of the list).
2. With the cursor resting on the **FLIP** position, press the RETURN ⊚ and watch the board.
3. Press RETURN ⊚ several times. Each time RETURN ⊚ is pressed, the white pieces trade places with the black. This gives you a different perspective on the board, which might be useful as you play either the white or black pieces.
4. Press RETURN ⊚ until the white pieces are on the bottom, and the black are on top. You are now back to where you started.

You have just unlocked for yourself a "secret" of this program:

1. Use ⟷ to select an option with the cursor.
2. Press RETURN (RETURN ⊚ or sometimes only ⊙) to enact that option.

TRY ANOTHER CHANGE:

1. Use ◆▶ to move the cursor down from FLIP to LEVEL. At this position, the playing strength of the program is adjusted. The levels range from 0 to 9.
2. With the cursor resting on LEVEL, press RETURN ⊙⊙ once.
3. You will notice that the cursor moved to the right and became smaller, covering the 0.
4. Now: use ◆▶ again. The display will step, one by one, through the entire range of playing levels. Use ◆▶, and retrace the sequence.
5. When you reach 0, press RETURN ⊙⊙. You are now back to the original setting, and may use the ◆▶ to move the cursor away from the LEVEL option.

This type of change is one of several ``two step'' options, where after you select what you want, you must assign it a value.

● The entry for LEVEL in the FEATURES DICTIONARY will help you decide which level to use.

MAKING A MOVE ON THE BOARD

It is now time to try a move on the chessboard. Check to see if the white pieces are on the lower part of the board, and the LEVEL is set to ``0''. If not, by using the previous two examples, you should set these parameters as outlined.

NOW . . . move the cursor to ◀BOARD. This option is what you must select to gain access to the chess playing board.

Press RETURN ⊙⊙, and the cursor will jump to one of the white pieces on the board.

Use ◆▶, and watch as the cursor moves around the board.

As you will notice, the cursor does not land on every piece. The cursor will only land on pieces that can legally move from a given position. In this case (the first move), the cursor will land on all the Pawns, and the two Knights. If you are unsure of which pieces are which, consult the section RULES OF THE GAME.

The cursor will also jump to ↕OPTION. In a moment, we will make use of this, but for now, let us continue with the board area.

For the purpose of this example, move the cursor to the Pawn directly in front of the King.

With the cursor in this position, press RETURN ⊙⊙.

You will notice that the ``menu'' has disappeared. Don't faint! This is merely acknowledging your entry. You are now in the ``Move Mode''.

NOW . . . use ◆▶. You should notice that the cursor moves to each of two squares immediately in front of the Pawn. These two squares represent the legal moves for this chess piece. Keep using ◆▶. The cursor will continue to move back and forth.

Position the cursor over the square that is farthest from the Pawn (2 squares in front).

Now . . . Press RETURN ⊙⊙.

The Pawn begins to flash, both in the original position, and in the new square you have selected for it to move to.

The Pawn has now advanced two squares. You have made your first move. By the time you have read this, **CHESS** will have responded to your move, probably by moving out a Knight. The program's moves are flashed in the same way as yours.

———— MOVE SUMMARY ————

● All moves are made in the same way:

1. Select the chess piece to move with the cursor.
2. Press RETURN ⊙⊙.
3. Use ◆▶ to scan the possible moves (these may range from 1 to 10 or more, depending on the piece and the position).
4. When you have selected the square to move to with the cursor, press RETURN ⊙⊙ to enter that move.
5. The chess piece will flash between its square of origin and its destination.
6. At the conclusion of this flashing, the piece will have ``moved'' to the destination square.
7. The program will now take over, and either make its move immediately, or ``think'' for awhile and then move.

Let us try one more move before leaving the board for other adventures.

Move the cursor with ◆▶. You might notice that there are some new pieces added to those the cursor will visit (the Queen, the King and the King's Bishop). Because of your Pawn move, these pieces are now unblocked and meet the requirements for a legal move.

With the cursor, select the Queen.

Press RETURN ⊙⊙. Now use ◆▶ to see where the Queen may move. There are more possibilities than with the Pawn.

Wait! You've changed your mind! Maybe the Bishop looks like a better move after all.

Move the cursor until it is covering the Queen. Now . . . press RETURN ⊙.

The board has remain unchanged, and the list of features has returned. It is as though you had never selected the Queen in the first place.

Move the cursor over to the King's Bishop. Press RETURN ⊙. Use ←→ to scan the possible moves for this piece.

Select the square farthest away from the Bishop (on the upper left edge of the board). Keeping your eyes on the board, press RETURN ⊙.

After watching the Bishop flash between its two squares, you may have noticed that your opponent lost no time in capturing your Bishop. So, it wasn't such a great move after all. Everyone makes mistakes, including Grand Masters. With this in mind, the program provides a quick remedy. It's called . . . BACK.

───────────── **LEAVING THE BOARD** ─────────────

Using ←→, move the cursor around the board until it jumps over to the list at the right of the board. It will highlight the word ↕OPTION. This is the doorway from the board to the list.

Press RETURN ⊙. The cursor will jump up to the first feature above ↕OPTION. You are now on the list, and may use ←→ to move up and down.

Notice that the "doorway" you used to get to the list has changed from ↕OPTION to ←BOARD. This is how it looked when you first began using the program.

Remember: ←BOARD directs the cursor onto the chessboard for moving the pieces. ↕OPTION directs the cursor to leave the chessboard and remain on the section containing the list of features (the "menu").

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TAKING BACK A MOVE
Now that you have returned to the "menu", let us continue in our quest to save the white Bishop from a tragic end.

First, find BACK on the list (it is just below what is now the ←BOARD option).

Move the cursor so that it covers BACK. While watching the area of the playing board where the Bishop was last seen, press RETURN ⊙. The black chess piece will move to its original position and your Bishop will have reappeared.

You have now corrected the results of the "blunder", but the blunder itself is still there. The Bishop can be captured again because it is now black's turn to move. You must continue with the procedure and take-back one more move . . . the Bishop's.

Watch the board again, and press RETURN ⊙. The Bishop is now safely in his original position.

You could now return to the board with the ←BOARD option, and continue playing, as though the Bishop never wandered into trouble.

Before you do, however, you might take a look at a few more options.

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REPLAY, RESUME, RERUN, and RESTART—
You have succeeded in taking back one "complete" move, i.e., the move for white and the responding move for black.

The move, however, continues to live in the memory of the computer. There are several ways to use this special storage of information.

When the BACK option was used, two new options appeared on the list: REPLAY & RESUME. We will look at REPLAY first.

Move the cursor to REPLAY. Watch the chessboard and press RETURN ⊙. Press RETURN ⊙ again. The two moves that were taken back have been replayed, one at a time. This will continue until you have REPLAY'ed all moves in memory for the current game.

When you have replayed the final move, REPLAY will disappear (because it is no longer useable), and the cursor will jump to the ←BOARD option, making it easy for you to move directly back to the game.

Move the cursor to BACK. Press RETURN ⊙ four times. The board should now look as though no moves were ever made.

Move the cursor to RESUME. Watch the playing board and press RETURN ⊙. The board has jumped to the most advanced position that was achieved in the game so far.

As with REPLAY, this option disappears when it has performed its job, and is no longer useable. A difference here, however, is that the cursor now has magically jumped to the board—so that you can easily continue your game.

For now, let us continue our look at some of these different features. Move the cursor to ‡OPTION, and press RETURN ⊚.

Move the cursor to RERUN. Watch the board and press RETURN ⊚. The game will automatically replay to the end of the game, or to wherever you stopped during the game. This command is very versatile. You can stop the RERUN at any time by pressing RETURN ⊚. Pressing RETURN ⊚ again will start-up the RERUN from the point you stopped.

NOW . . . if you decide that you do not want to continue with whatever is on the chessboard, the RESTART key will erase the game, with all its moves, from the memory. Once you use RESTART, the recall options such as REPLAY, RESUME, and RERUN will not be available.

--------------------SUMMARY: THE FOUR "R"s--------------------

REPLAY: will replay moves one move at a time (up to the most advanced point). This feature may be used instead of RERUN, if you want to step through previous plays at your own pace.

RERUN: will automatically replay all moves in their proper sequence.

1. If you take back one or more moves, RERUN will replay those moves that have been retracted.
2. If you have not taken back any moves, RERUN will always re-enact all of the moves played so far in the game, until stopped by the RETURN ⊚ key.
3. RERUN may be stopped at any time by pressing RETURN ⊚.

RESUME: will instantly restore the game to its most advanced point.

1. If you have taken back moves in order to review what has just happened in the game, the RESUME option will immediately restore the board to the final position reached before moves were taken back.
2. If you use RERUN to re-enact an entire game and decide you do not want to wait through the entire sequence, stop RERUN and use RESUME to reach the last position played.

RESTART: will set-up the board for a new game. It also completely erases a previous game, or whatever moves have been made, from the computer memory.

--------------------AUTO, SWITCH, MANUAL, PROGRAM--------------------

We will continue our **CHESS** odyssey by first using the RESTART option. This will "erase" the few moves entered so far in our "mini game".

Use ⬌ to move the cursor to RESTART. Press RETURN ⊚. The game board is now set-up for a new game.

Move the cursor to AUTO. Press RETURN ⊚. The program will ask you to set the LEVEL for the black side. This feature will allow you to play one level against another. To vary the level for black, use ⬌, just as in setting your playing level on the menu. If you do not want to adjust this level, do not use ⬌. For now, before continuing make sure the level is set to Ø. Press RETURN ⊚.

CHESS is now playing both sides in the chess game. It will continue to do so until: A. RETURN ⊚ is pressed; or, B. The game is concluded (checkmate or draw).

You may interrupt the game at any time and begin regular play:

● If you are using the keyboard, simply press RETURN and wait for the last move to be completed.

● If you are using the game paddles, the button must be kept depressed ⊙ until a chess piece starts to flash, then ⊙. Otherwise, your command may not be noticed.

When play has stopped, the menu will return. You may then select the ⬅BOARD option and move to the game board, from where play can proceed as usual. The program will automatically adjust to play the opposite side in the game.

After watching the computer do all the work for a while, press RETURN (⊙, wait for move, ⊙). The program will finish its last move and revert to the "normal" status.

To demonstrate the next feature (SWITCH), you must know what side you are now "playing". To do this, move to the ⬅BOARD option and press RETURN ⊚. Use ⬌ to move the cursor over the pieces. Whatever color the cursor is moving over is the color to move next—your color. If you enter a move for this color, the program will assume it is playing the other side and will respond accordingly.

Note: The labels directly under the board can also help to see which side is to move. The side labelled **CHESS** is the one that moved last.

Do not make a move now, but instead, remember which side you are now playing, and select the ⬍OPTION feature and return to the "menu".

Move the cursor to SWITCH. This option will allow you to "switch" sides with the computer, i.e., the program will now make the next move for your side.

Press RETURN ⊙⊙. You should notice that one of the pieces you scanned with the cursor earlier has now been moved for you. The cursor will reappear on the SWITCH option at the conclusion of the move. Should you press RETURN ⊙⊙ again, the program will "switch sides" again, making a move for the side it was originally playing.

You may continue to press RETURN ⊙⊙ as many times as you wish, essentially duplicating the AUTO function on a step by step basis.

• When playing a "normal" game, the SWITCH option is very useful if you find yourself in a losing position, and you would like to see if the computer could take over for you and improve your situation (you could then take over the "better" position occupied formerly by the computer). If you do not want to play the computer's side of the board, you must activate SWITCH again.

It is now time to consider the next option on our agenda: MANUAL.

Move the cursor to MANUAL. Press RETURN ⊙⊙. The cursor will be "thrown" onto the board, to whichever side's turn it is to move. If this feature is used at the beginning of the game, before any moves are made, the cursor will always go to the white pieces. Later in the game, it will depend on which side moved last.

Use ⟷ to move the cursor. Select a piece and press RETURN ⊙⊙. Select a square to move to in the usual manner. Press RETURN ⊙⊙.

After your move has been completed, the cursor will jump to the other side of the board.

Use ⟷ to move the cursor. As you will see, you are able to select pieces and moves the same as for the other side. If you enter a move here, after the move is completed the cursor will jump back to the other side.

This is what the MANUAL feature is all about. **CHESS** makes no moves, but assumes the role of "Record Keeper" and "Umpire".

Use this option if you wish to make moves for both sides in a game, or, if you wish to play a game with a friend. **CHESS** will not only keep track of all your moves (read about LIST in the FEATURES DICTIONARY), but will also be an "umpire" in the sense that moves will continue to be monitored for their legality. This will prevent errors due to moving a piece to a square to which it cannot legally move; errors in "castling"; recognizing "checks" on a King; etc.

Note: MANUAL is also used to enter a game into the computer that is taken from some source such as a book or magazine. Refer to the entry for MANUAL in the FEATURES DICTIONARY.

• When using the MANUAL option, all the other features discussed, such as BACK, REPLAY, RERUN, etc., are available as in a "normal" game (playing against the program).

When you activated MANUAL, the SWITCH option disappeared and PROGRAM took its place. PROGRAM will achieve the same results as SWITCH. The reason for this change in terminology is to keep the function description accurate. When you are playing a game "manually", the **CHESS** program is not strategically involved and SWITCH would be meaningless. PROGRAM, when selected, simply instructs the **CHESS** program to make the next move. You will then be out of the manual playing mode. After each use of PROGRAM, the word "SWITCH" will return to the screen to take its regular place until the MANUAL feature is used again.

───────SUMMARY: AUTO, SWITCH, MANUAL, PROGRAM───────

AUTO: When selected, **CHESS** will play both sides of the game, switching automatically. To stop the game, press RETURN (or ⊙ until a piece starts to flash, then ⊙). When the last move has stopped flashing the board will revert to normal.

SWITCH: Instructs the program to change sides and make the next move. With repeated use, the program will play both sides, one move for each time RETURN ⊙⊙ is pressed.

MANUAL: In this mode the program will not make moves for either side, allowing two players to use the video display as the "board". The program will continue, however, to record all the moves, and will not allow any illegal moves.

PROGRAM: Instructs **CHESS** to make the next move. PROGRAM replaces SWITCH when you are using the MANUAL feature.

This completes the STEP-BY-STEP introduction to **CHESS**.

• Consult the FEATURES DICTIONARY for information on any feature.
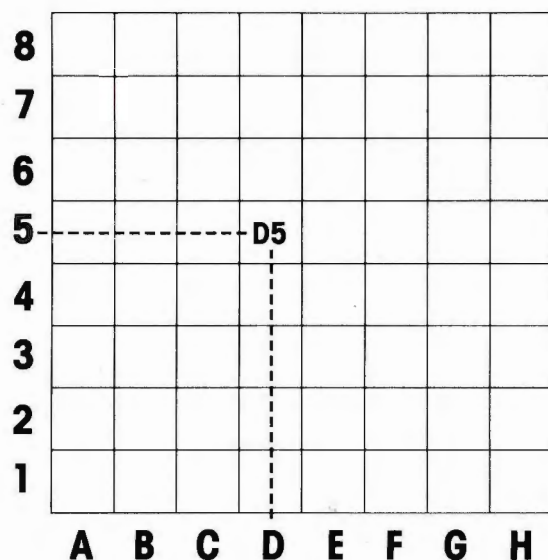
The square notation used by this program

8
7
6
5 - - - - - - - - - D5
4
3
2
1

A B C D E F G H

The Chess Pieces
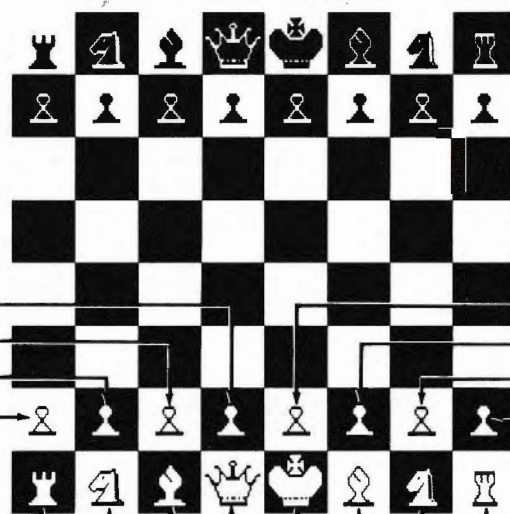
Names used in "descriptive" notation

Queen's Pawn ——————
Queen's Bishop Pawn ——
Queen's Knight Pawn ——
Queen's Rook Pawn ——→

King's Pawn
King's Bishop Pawr
King's Knight Pawn
King's Rook Pawn

Queen's Rook ———
Queen's Knight ————
Queen's Bishop ————

White Queen   White King

King's Rook
King's Knight
King's Bishop

A glossary of specific rules, terms, and special moves that are used by the CHESS program and manual.

● Note: this section does not contain all of the rules of chess, and only defines some terms that will be helpful when reading this manual. The beginning player is encouraged to pursue the matter further in the Tutorial section.

CASTLE An alternate name for the Rook. Also, **the name given to a special move for the King and Rook.** This move (castling), allows the King to move **two** squares, either to the right or left. Simultaneously, the Rook on that side (right or left) moves to the first square on the opposite side of the King.

To initiate castling during a game with CHESS, select the King with the cursor. Press RETURN ⊙⊙. The castling move will be shown as one of the possible moves for the King (the King will be able to move **two** squares to either side where castling is currently permitted, in addition to the usual one square move). Select the square with the cursor that represents a two square jump for the King. Press RETURN ⊙⊙ to enter this move. The King and Rook will automatically make the correct move.

● You will not be able to select the castling move if it is not "legal" to do so.

There are specific rules concerning when and if castling may take place:

1. There may be no chess pieces between the King and the specific Rook to be castled.

2. Neither piece may have moved at any time prior to castling (even if that piece returns to its original square). Moving the King for any reason will permanently cancel the castling option in that game. If one Rook moves it may not be used to castle, but the other Rook may still be used (until it moves).
3. The King may not castle "out of check". That is, if the King is under direct attack from an enemy piece, castling may not be used to move the King to safety.
4. The King may not castle into check, nor may he cross-over any square that is being attacked.

YOU MAY: castle to either side of the board. "Queen-side" castling describes the move of the King into the Queen's side of the board. "King-side" castling moves the opposite way.
YOU MAY: castle if the Rook is under attack. The Rook may also cross-over squares that are under attack by an enemy piece (as long as rule 4, above, is not broken).
YOU MAY: castle at any time in the game if the "legal" requirements are met.

Note that "Queen-side" castling involves moving the Rook three squares, while "King-side" castling moves the Rook only two squares.

CHECK This is the term that describes a direct attack on a King. When a piece is placed on the board so that it attacks the opposing King, the King is "in check". That King must now either be moved or the enemy piece "blocked" or captured. If there is no escape for the King from a check, the game is over. The King has been "checkmated".

There are some special rules concerning "check":

A. A King may never move "into" check. That is, the King may not move onto a square that is under attack by the enemy. Similarly, you may not move a chess piece that will expose your own King to direct attack by an enemy piece.
B. When a King is in check, the check may not be ignored. For example, if your Queen and your King are being attacked at the same time, the first consideration must be given the King even if it means losing the Queen.

When **CHESS** attacks your King and places you in check, it will announce this by displaying the word "CHECK" at the lower left corner of the screen on the message line.

IMPORTANT: The **CHESS** program will not let you select a move that is "illegal". Therefore, if your King is in check, the cursor will only land on pieces that will remedy the check. Also, **CHESS** will not let you move a piece that will expose your King to check. This is a helpful feature, since "checks" are not always obvious to those new to the game.

CHECKMATE This is the winning term used when the King on the losing side is under attack (in check) and there is no way to escape. The game is over.

A special characteristic of the game of chess is that the King is never actually captured. If a King is being attacked by one or more enemy pieces and there is no remedy for these attacks (checks), the game ends before the attacking piece(s) actually swoop in for the capture, allowing the King to avoid this "indignity".

CHESS will announce checkmate with an audible signal (a four-beep melody), and the word "CHECKMATE" will appear near the lower left corner of the screen.

DIAGONAL This terms describes an oblique line across the playing board. If you move in a straight line from the center of one square to the center of another square, and in the process cross over a point where four squares meet, you have moved diagonally.

● Diagonally is how you move in a straight line and always stay on squares of the same color.

A "diagonal" then, describes one of these "slanting" lines across the board (as in the phrase, "the Bishop was placed on an open diagonal", meaning that the Bishop was moved so that it could enjoy a long range of attack on one of these slanting lines of squares).

● There are 26 diagonals on the chess board.

When used in conjunction with terms such as "file" (vertical) and "rank" (horizontal), one can describe any of the possible straight lines of movement on the game board.

DRAW A "drawn" game is one where neither side is able to conclude the game with a decisive victory (checkmate). There are several circumstances where a game is automatically declared a draw.

CHESS will declare a draw under the following conditions:

1. INSUFFICIENT MATING MATERIAL If neither side has the power to checkmate the other, the program will declare a draw. This will happen if there are no **pawns** on the board and both sides contain the following limitations of material.

A. 1 King, or . . .
B. 1 King and 1 Bishop, or . . .
C. 1 King and 1 Knight, or . . .
D. 1 King and 2 Knights.

Note: it is possible under unusual conditions to mate with only two Knights and the King, but **CHESS** follows the general case in its declaration of a draw.

2. 50 MOVES RULE A draw will be declared if there are 50 consecutive moves by each side (100 plays, total) where:

A. none of them were Pawn moves
B. none were captures
C. none were castles.

3. REPETITION A draw occurs if the same position occurs three times in a game, and it is the same side to move. The program only scans the last 16 moves for this occurrence, so a draw will only be declared if the repetition happens during these last 16 moves.

The **MANUAL** playing mode will not declare a game drawn.

● If you play into a draw by mistake, and feel you should be able to win, the last moves can be taken-back. This will give you the opportunity of making different moves from the ones that led to the draw being declared.

CHESS will announce a draw with a four-beep melody, and the word "**DRAWN**" will appear near the lower left corner of the screen.

EN PASSANT This term describes a special type of capturing move available to the Pawn. The word is French for "in passing", which helps describe the move.

This move is available to Pawns on the fifth rank. From this position the Pawn (Pawn "A") attacks two squares on the sixth rank.

If an opposing Pawn now exercises its option to move two squares on the first move, and this Pawn (Pawn "B") passes over one of the squares being attacked by Pawn "A", then Pawn "A" has the ability to capture Pawn "B", as though it had only moved one square. This is an "en passant" capture.

This privilege is available only on the first move after the advance of the enemy Pawn (Pawn "B" in our example).

If an "en passant" capture is possible, the **CHESS** program will show it as one of the legal moves for that particular Pawn. The cursor will move to the empty square just behind the enemy Pawn that just moved forward. With the cursor on this square, press RETURN ⬤⬤ to enter the move. Your Pawn will now move to this square, and the enemy Pawn will disappear.

FILE This is the name given to the vertical columns of squares (there are eight of them). Each column is a file.

Each file has a letter, A to H. The files are also referred to by the names of the pieces that stand at each end of the file when the game starts.

The names of the files, from left to right are:

A. Queen Rook file.
B. Queen Knight file.
C. Queen Bishop file.
D. Queen file.
E. King file.
F. King Bishop file.
G. King Knight file.
H. King Rook file.

NOTATION The numbers and letters that label each square on the board are called the notation. Notation is useful for keeping a record of the game, or when referring to a specific move.

CHESS uses a common type of notation, known as "algebraic notation". In this type of notation, each file is assigned a letter, and each rank is assigned a number. Refer to the notation chart to see how each square on the chessboard is designated.

When a piece is moved, the notation for that move will include the designation for the original square the piece was on, and the designation for the square that was moved to. Thus, if the Pawn on square "B2" moved to square "B4", the listing for that move will read "B2-B4". This is a "move notation".

If a capture takes place, an "X" is placed between the two square notations. So, if the Pawn at B2 captured an enemy Bishop at square A3, the listing will read "B2XA3".

• When **CHESS** is "thinking" about a possible move, the notation that is displayed for the program's move will flash on and off. It may also change as the program considers several different possible moves.

PAWN PROMOTION When a Pawn reaches the eighth rank, it is immediately promoted to a Queen (usually referred to as "queening"). See "**QUEENING**" for more details.

QUEENING When a Pawn reaches the eighth rank, it is immediately promoted to a Queen. This privilege is available to all Pawns. It is perfectly possible to have two, three, or more Queens on the board at one time.

The **CHESS** program will automatically change any Pawn reaching its eighth rank into a Queen.

Note: Strictly speaking, the rules of chess do not force you to promote a Pawn to a Queen. You may select any piece except the King. However, the Queen is almost always used.

If you wish to study some particular endgame situation with the Pawn being promoted into a lesser piece, you will have to use the CHANGE feature to arrange the board accordingly. The use of **CHANGE** will erase the record of the game up to this point.

RANK This name is given to the eight rows of squares that stretch horizontally across the board. When a piece moves forward one square it advances one rank.

The ranks, numbered 1 to 8, are always counted from the perspective of the side being referred to.

This means that the "1st rank" for the white side will be the "8th rank" for the black side.

Looking from white's point of view, its Pawns are on the second rank, and black's Pawns are on the 7th rank. From black's point of view, the numbers are reversed.

STALEMATE This is a special type "drawn" ending to a game. A stalemate occurs when:

A. The side to move is **not** in check, and
B. Any move made by this side will result in the King being placed in check.

In other words, although the King is not under direct attack, all of the possible moves for that side will result in exposing the King to direct attack. Since it is illegal to move the King into check, the side to move has **no** moves and the game is over.

Stalemate may be considered a "blunder" if the winning side (having a significant material advantage and/or a possible mate) allows it to take place.

CHESS will announce a stalemate with a four-beep melody, and the word "STALEMATE" will appear near the lower left corner of the screen.

Pawn.   *Rook.*   *Knight.*   *Bishop.*   *Queen.*   *King.*
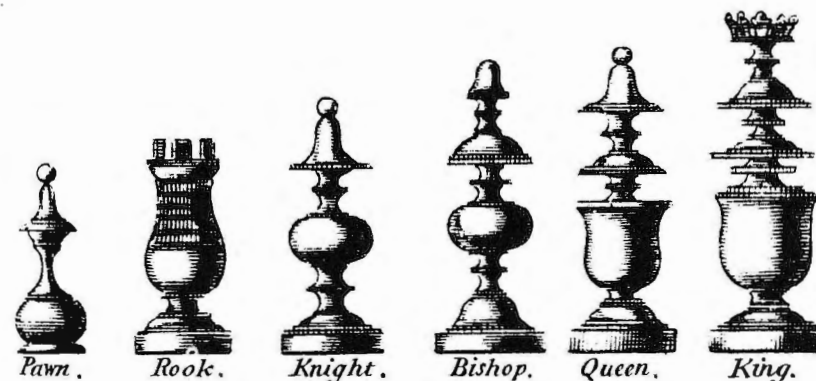
ADVICE When playing against CHESS, you can get a suggested move.

This feature is not always available. There is no ADVICE at skill level Ø. It will most often be available at playing levels above 3. When it is available, it will appear on the menu just below OUTWARD. For more details on availability consult LEVEL.

ADVICE may be activated in two ways:

1. Move the cursor until it rests on ADVICE. While watching the playing board, press RETURN ⊙. One of the pieces will flash between two squares, as in a normal move. At the conclusion of the flashing, however, the piece will be seen to have not moved after all. This is the move that is recommended. The cursor will automatically jump to the suggested piece, for easy continuation of the game. In addition, the notation for this move will be displayed near the lower left of the screen.

2. For added convenience, the ADVICE option may be selected during a game without moving the cursor off the board. Simply type "A" on the keyboard. The suggested move will immediately be shown, as in (1). The cursor will automatically jump to the suggested piece, but you do not have to make the suggested move. The cursor may be moved to any piece.

This recommended move is derived from two sources. When you are playing in the OPENING LIBRARY, the suggestion will be based on the moves stored in the library (see OPENING LIBRARY).

When "out of the library", the suggestion will be based on the look-ahead search performed by the CHESS program. Since the extent of this "searching" will vary greatly at different levels, the usefulness of the advice given will fluctuate as well. If you rely heavily on these suggestions throughout a game, CHESS will probably maintain an advantage over you.

AUTO instructs the CHESS program to play BOTH sides in the game. AUTO may be activated or stopped at any time in a game.

To activate, select AUTO with the cursor. Press RETURN ⊙. The menu will disappear, and you will be asked to set the skill level for black. This will give you the opportunity to select a different skill level than that being played by white.

Adjust the level for black with ←→. When the desired level is shown, press RETURN ⊙. The CHESS program will immediately begin the move (or begin "thinking about" the move), for the side currently to play.

To stop the game:

A. If using the keyboard, press RETURN and wait for the last move to be completed. The menu will then return.
B. If using the game paddles, hold the button down ⊙ until a piece begins to flash. Then release ⊙. Otherwise, the command may not be "seen".

You are now "out" of the AUTO mode, and may continue the game in the normal fashion.

BACK This command will retract the last move(s) that were played on the board. It is useful for correcting errors or for reviewing the last few moves made in the game.

BACK (continued)

To take back a move, advance the cursor until it rests on BACK. While watching the board, press RETURN ⊙. The last move made in the game will be "instantly" retracted. Pressing RETURN ⊙ again will retract an additional move. There is no restriction on the number of times you may use BACK. You may take back as many moves as have been made.

Special features for the BACK option:

When BACK is used, the moves that have been retracted are still retained in the computer's memory. To "reclaim" these moves there are three options available:

A. REPLAY You may replay each retracted move, one by one.
B. RESUME This option will "instantly" reset the board to the most advanced position that was achieved during the game (i.e., the position reached before the BACK option was used).
C. RERUN This option can be thought of as an "automatic" REPLAY. When you select RERUN, each and every move that has been taken back will be replayed one by one, automatically.

✔ If you take back a number of moves, and then go directly to the board and make a move, this "new" move is now considered the "last" move in the game so far, and the remaining "un-replayed" moves that were taken back are lost.

Special note: The LIST display will help keep track of moves that are taken back. Each retracted move will show-up in "inverse video" (black type on white background) on the listing. See the LIST entry for additional information.

←BOARD This is the option that directs the cursor from the menu to the chessboard, allowing the player to select a chess piece and move it to a particular square.

Move the cursor until it rests on ←BOARD. Press RETURN ⊙. The cursor will jump to a chess piece on the playing board. This piece will always represent the color that is to move next.

Notice that as soon as you activate the ←BOARD option it will disappear, to be replaced by ⬍OPTION. As you move the cursor around the chessboard, it will always land on ⬍OPTION as part of its route. Selecting ⬍OPTION will move the cursor back to the menu section of the display, and ⬍OPTION will be replaced once again by ←BOARD.

Think of ←BOARD and ⬍OPTION as the "revolving doorway" to and from the chessboard and menu.

CH1 This is one of the "chapter" entries of the tutorial menu (see ←TUTOR).

CHANGE Using this option, you can create any specific board position.

● If you leave a game in progress to enter the CHANGE mode, all memory of the game moves will be erased and a "new" game will be considered to begin from where the CHANGE takes place. Therefore, you will not be able to take-back moves beyond this new starting point.

Move the cursor to CHANGE. Press RETURN ⊙. After activating the CHANGE option, the menu will vanish and the cursor will jump to the upper right corner of the board. ←→ will move the cursor to each square of the board.

Notice the word "CHANGE" in the upper right corner of the display. This is where you "came in" to this mode, and this is what you must select with the cursor to exit and return to the menu from where normal play may be continued. If certain conditions are not met the CHANGE word will disappear.

CHANGE (continued)

If you have many changes to make and/or you wish to remove "superfluous" pieces, select the CLEAR option. This will "erase" all the pieces from the board with one stroke. Notice that when you use CLEAR, the CHANGE word vanished. To leave the CHANGE mode at this point (the board empty), you must at least place one King of each color on the board (they must be separated by at least one square).

The cursor can also be made to scan over the "color to move next" option. If the words "WHITE TO MOVE" are highlighted by the cursor, and RETURN ⊙ pressed, the instruction will change to "BLACK TO MOVE". Each press of RETURN ⊙ will reverse the instruction. By this method, you may designate the side with the first move from this position.

When the cursor is on a square on the playing board that is to have a new piece, press RETURN ⊙. This will change the function of ⟷ from moving the cursor to selecting a piece.

Using ⟷, you can scan through all the possible pieces to be placed on this square. When the desired piece is visible, press RETURN ⊙. The piece will be placed on that square, and the cursor may be moved again using ⟷.

✔ The CHESS program continuously monitors the board for various "legal" constraints. Therefore:

1. You will not be allowed to place a Pawn on the 1st or 8th rank (a Pawn on its 8th rank would automatically become a Queen, and a Pawn on the first rank is simply impossible).

2. No more than 32 pieces, total, may be placed on the board. Strictly speaking, there should never be more than 16 pieces of either color, but CHESS is more lenient in this regard.

This "legal" monitoring is provided to help prevent mistakes when setting-up some complex position. Another aspect of this overseeing function is that:

YOU CANNOT LEAVE THE "CHANGE" MODE if certain conditions are not met:

1. There must be one black King and one white King.
2. If a King is in check, it must be that King's turn to move. Another variation on this theme is: both Kings may not be in check at the same time.

If these requirements are not met, the CHANGE option which should appear at the upper right of the display will not be present, and you will not have entry back to the menu from where you could continue to play.

● If the FLIP option was used before entering the CHANGE mode, the board will remain "inverted".

CURSOR This term refers to the visual "pointer" that you control with the Arrow keys or game paddle knob. The cursor may take various shapes, depending on what it is "pointing to".

The cursor is the means by which you can select among the options, and it is used to select the game pieces that you wish to move (as well as the square the piece will move to).

The cursor will not initiate any change in the operation of the program. It only shows what may be changed. The change or feature will only be initiated when RETURN ⊙ is pressed.

EXIT? Use to end a tutorial demonstration (see ←TUTOR).

FLIP The purpose of this feature is to change the perspective of the board by turning it 180 degrees.

This will reverse the relative top-to-bottom positions of the white and black pieces. The reasoning behind the feature derives from the fact that when playing chess on a physical board, the player using the black pieces views the board differently than the "white" player.

Although the vertical board of the video screen gives a "bird's-eye" view that is somewhat different from usual play, the FLIP option can simulate the natural change of perspective, and can be valuable for keeping "in practice" with this aspect of the game.

Note: When "flipped", the square notation will "flip" also, as though inscribed on the board. This will not affect move entry, which will proceed as usual, but the move numbers displayed at the bottom of the board might become confusing (if you are trying to follow them). Refer to the square notation chart at the front of the manual (turn it to correspond to the current position of the board).

∧GAME This directs the cursor to move from the ←TUTOR menu to the game features menu. It is only visible after you have entered the ←TUTOR menu.

INWARD This is a special feature that will show what chess pieces are affecting (attacking or defending) any specific square.

INWARD may be selected on the menu by the cursor in the usual way, or may be selected during a game without having to move the cursor from the game board.

When using the menu, select this option with the cursor. Press RETURN ⊙. The cursor will jump to square H-8 (the upper right corner, unless the board has been "flipped"). The cursor may now be moved around the board using ⟷.

When you have chosen a square to be investigated, press RETURN ⊙. Any pieces that are attacking or defending that square will show a "union jack" type figure superimposed over the piece. Press RETURN ⊙ once more to "free" the cursor so it may be moved.

Note: The word "INWARD" is your exit from this mode. Move the cursor to this word and use RETURN ⊙ to return to the menu (and normal play).

From the board: When you are playing a game, the INWARD feature is available without having to move the cursor to the menu. Simply type the letter "I". This will implement the feature just as though you had selected it from the menu with the cursor. After typing "I", use ⟷ to move the cursor around the board. Press RETURN ⊙ to look at a specific square, the same as described above. To leave this option and return to normal play, simply press the "I" again.

● For the beginning chess player, INWARD can be used to discover ill-advised moves before they are made, by letting the player know what enemy pieces are attacking a square to which a move is being considered.

LEVEL This option allows you to adjust the playing strength of the CHESS program.

To adjust the skill level, move the cursor to LEVEL. Press RETURN ⊙⊙. The cursor will now highlight the number or letter to the right of the option. Use ⟷ to scan through the range of levels available. When the desired level is reached, press RETURN ⊙⊙. The selected level will be entered, and the cursor will move back to the LEVEL option.

Note: The manner in which CHESS finds its move does not always allow it to come up with the information needed for the ADVICE feature. The availability of this feature also depends on the level selected. The explanations of the various levels will give you a good idea when this feature is useable.

How About A Nice Game of CHESS! SKILL LEVELS

LEVEL	Approx. Average Time Per Move	Approx. Average Search Depth (ply)
Introductory levels		
0	1 sec.	0
1	5 sec.	0-1
2	5 sec.	0-1
		(OPENING LIBRARY)
Intermediate levels		
3	10 sec.	0-1
4	10-20 sec.	0-2
5	20-40 sec.	1-3
6	40-80 sec.	2-4

SKILL LEVELS (continued)

LEVEL	Approx. Average Time Per Move	Approx. Average Search Depth (ply)
Advanced levels		
7	1-2 min.	2-4
8	1-3 min.	2-5
9	2-6 min.	3-6

• The times listed for each level are only very general approximations, and can vary widely from move to move and from game to game.

LEVEL 0: This is the basic introductory level. It performs an "instantaneous" evaluation of the position of the CHESS program's playing pieces, and makes a move. It can teach the beginner about "blunders", and not much else. It is particularly weak in the endgame (when there are few chess pieces left on the board). The program may have a problem figuring out how to checkmate you.

At level 0, the program is not able to give ADVICE. If you need a suggestion, use the SWITCH feature to change sides with the program. CHESS will then take over your position and make a move. Use SWITCH again to return to playing your original side in the game.

LEVEL (continued)

LEVEL 1 has very little more time than level 0. In the opening part of the game it will probably play similarly to level 0. As the game progresses and there are fewer playing pieces left on the board, the program's game will become a little stronger. It is still too weak to play a good endgame. If the program runs out of time before reaching a certain point in its search for a good move, the ADVICE feature will not be available.

LEVEL 2 is identical with level 1, except that the OPENING LIBRARY has been added, giving the player access to well known styles of opening moves while still at an otherwise weak playing level. See OPENING LIBRARY elsewhere in the FEATURES DICTIONARY.

• All the levels above 1 use the OPENING LIBRARY.

LEVEL 3 is still weak in the middle part of the game, but gains much strength in the endgame. The ADVICE feature will appear more often, but the same limitations apply as mentioned in level 1.

LEVELS 4, 5, & 6 become increasingly stronger as the program gains more time to consider a wider range of move possibilities. Beginning especially at level 6, the program is much more capable of foreseeing some of your tricky combinations that can catch lower levels off guard. By the same token, watch out for traps set for you by the program!

LEVELS 7, 8, & 9 show the real strength of the CHESS program. Not only can it play good defense, but it also can be a true terror on the attack. The play of the endgame is good enough to sometimes make up for losses in an earlier part of the game, so be prepared to fight it out to the end. Level 9 can be considered very roughly to fall within the time regulations for official tournament play. One common

tournament guideline is that each player may take no more than two and one half hours to think about and make 40 moves. In regulation play, you and your opponent each has a time clock that measures the duration of each move. After you make a move, you turn off your clock and turn on the opponent's. The times on each clock then represent the time used by each player for their moves. This is the only reliable way to determine the total amount of time used by the individual players.

LIST Selecting this feature will allow you to see the game record for the game you are playing, or have just finished.

To access the listing select LIST with the cursor. Press RETURN ⊙. The last 40 moves will be in view. To return to the menu again, press RETURN ⊙.

The moves are recorded in the proper sequence using algebraic notation. The notation chart in the front of the manual will allow identification of each square with the same alpha-numeric "name" that is used in the listing.

Only 40"complete" moves are displayed at any one time (40moves for white, + 40moves for black). Any other moves that may have been made are not "lost", but may be seen by using some of the other features such as:

RERUN: the listing will "follow" the game on the board. If at the end of the game you have played 60 moves, only the last 40 will be visible on the listing. When RERUN is activated the listing will reset to show the first 40 moves, and will increment forward as needed.

LIST (continued)

BACK: this is a much more tedious method of moving the list back. After having taken-back the last 20 moves of the game, the list will then begin to scroll back.

WHEN MOVES ARE RETRACTED: LIST will show this by highlighting each move that has been taken-back. This is especially helpful when you are re-playing your game, and want to look at a particular move. This "highlighting" will affect one move at a time when using BACK, or will cover the entire game when RERUN is used. During RERUN, as each side moves, the notation for that move will return to normal. By this means you can always tell what move number you are on (stop the RERUN and take a look at the list. RERUN may be restarted again and again).

✔ Note: When you use features such as RESTART and CHANGE the listing for your last game (or game in progress) will disappear. This is because all moves currently in the computer's memory will have been erased.

MANUAL In this mode, the program will not make a move for either side, allowing two players to play a game between themselves.

Select MANUAL with the cursor. Press RETURN ⊙⊙. The cursor will jump to the board. The side the cursor selects will always be the side that is to move next (at the start of the game the cursor will always move to the "white" side).

After a move has been entered for one side, the cursor will automatically jump to the other side and play should continue in the usual way.

TO RETURN TO REGULAR PLAY, select PROGRAM. This will instruct CHESS to make the next move. You then have the option, after CHESS moves, to continue the game manually (select MANUAL again) or to begin play against the program (move the cursor to the board and begin normal play).

Since the program is not searching for moves in this mode, the ADVICE feature will not be available. Use the PROGRAM feature as described above if you desire the CHESS program to make a move. All of the other features will function normally. This includes the full listing of the game.

✔ Note: While in the MANUAL mode, the program continues to monitor the board for legal moves. You will not be allowed to move into check, or to "castle", etc., if the pieces do not meet the requirements. Checks, mates, and stalemates will be announced. "DRAWS" will not be announced.

If the cursor does not move to a piece it is because you cannot legally move that piece. Because of this "monitoring" feature, CHESS performs the role of a play by play umpire in games between two humans. All decisions are final.

● MANUAL is particularly useful for replaying and studying games that are to be found in various books and magazines.

To "enter" a game into the computer, first look at each move notation as listed in the book and then make the corresponding move on the board. The cursor will always jump to the correct side to move next.

MANUAL (continued)

Once you have entered the entire game in this fashion, you may study the game with any of the options normally available in the MANUAL playing mode. You should be careful not to erase your entry before you are finished analyzing it. If you go to the board and try out a move, all entered moves that would have occurred after this point in the game are then erased. Also CHANGE and RESTART will erase move entries.

MENU This is the term that refers to the list of selectable options and features. These options may be thought of as "on the menu".

The CHESS program has a number of menus. The primary ones are:

1. the game features menu (main menu)
2. the tutorial menu

Each "CH" entry in the tutorial menu has its own menu of instructional segments. Most are made up of "PART" options. The menu for CH1 is made up of pictures of the various chess pieces.

To get from the main menu to the tutorial menu, select ←TUTOR with the cursor and then press RETURN ⊙⊙.

OPENING LIBRARY This is not a selectable feature, but it is a feature of the CHESS program, nonetheless.

The "opening library" refers to the storage of a series of moves and counter moves that are known to provide strong play during the "opening" moves of the game.

● The CHESS program has about 7,000 of these moves stored in the program. This forms a solid core of the most frequently encountered moves and counter moves (as well as many that are more "unusual"). Because of the rapid increase in different move possibilities with each play, an opening library with ten times this number of moves would effectively add an advantage of only a couple of more moves. At least one large "main frame" computer program has on file over 250,000 of these moves, which must be updated and corrected on a constant basis as new and "better" moves are discovered.

When playing a game at skill level 0 or 1 the opening library is not used, and the opening moves are weaker. Because of the inability to search for and find a good move this early in the game, the program will usually move out the two Knights first when not using the library. All of the other levels make use of the library.

When you make your first move the program will scan the "library" to see if your move is in it. If it is, then the program selects from one or more different responses to the move. This process usually takes about one second (or up to 10 seconds).

If the move you make is not in the library, the program will have to ponder your move in the usual manner and will take considerably longer in selecting a move.

● There are some lines of opening play where the program may draw from the library as many as 16 moves before having to evaluate the position.

SPECIAL NOTE: As long as the program is still able to use the opening library, the ADVICE feature will suggest a move from the library. Otherwise, the suggestion will be based on the look ahead search. See ADVICE.

✦OPTION This directs the cursor to move from the chessboard to the menu, allowing the player access to the variety of features listed there.

The ✦OPTION directive will always be one of the places the cursor will jump to when scanning the pieces that may be moved on the board.

See ←BOARD.

OUTWARD Will show which squares and pieces are affected (attacked or defended), by any specific piece.

The selection of OUTWARD may be made from the menu in the normal fashion, or may be initiated during a game without moving the cursor from the board.

From the menu: select OUTWARD with the cursor and press RETURN ◉. The cursor will jump to one of your pieces (or a piece of the player whose turn it is to move).

Using ←→ to move the cursor, select the piece you wish to investigate. Press RETURN ◉. The OUTWARD display will now be visible as a "union jack" type of symbol in each square, and superimposed over every piece that your selected piece affects. Notice that there is no discrimination between friendly pieces and enemy pieces. To "free" the cursor to move again, press RETURN ◉.

To return to the normal playing mode, move the cursor to OUTWARD at the right of the board and press RETURN ◉.

From the board: When you are playing a game, the OUTWARD feature may be conveniently accessed without moving the cursor from the chessboard. Simply type the letter "O" on the keyboard. This will put you in the OUTWARD mode, the same as selecting the option from

the menu. After pressing the "O" key, move the cursor with ←→ as before, and press RETURN ◉ to view the OUTWARD display for any selected piece. Press RETURN ◉ again to "dissengage" from that piece and move to another. Press the "O" key a second time to exit from this mode.

• This feature is useful to the beginning chess player who may not always remember how a particular piece may move, or how it attacks.

PART (1, 2, etc.) These are options to be found after selecting one of the "CH" entries on the tutorial menu (CH2 through CH6) (see ←TUTOR).

PLY This is a term that comes up occasionally when some of the features are being explained. It is used to indicate the extent of the "search" performed by the CHESS program for each move.

A 1-ply search means the examination of each possible move by the CHESS program, and the evaluation of each resulting position. CHESS can then judge the resulting scores and arrive at a "best move". A 1-ply search is the minimum needed to protect against many types of "obvious" blunders.

A 2-ply search implies that CHESS will, in addition, consider every possible reply by the opponent to every possible move by CHESS. The resulting positions are then evaluated and scored.

PRACTICE when visible, allows the player to enter the board and try-out moves (see ←TUTOR).

PROGRAM When playing in the MANUAL mode, selecting this will instruct CHESS to make the next move, and gives you the

PROGRAM (continued)

opportunity to resume normal play (against CHESS). PROGRAM is only visible after MANUAL has been activated and it replaces SWITCH on the menu (just above AUTO). See the entry for MANUAL.

To use, move the cursor to PROGRAM. Press RETURN ◉. CHESS will immediately take-over the next move. When the move has been completed, PROGRAM will have vanished from the menu, to be replaced by SWITCH. This indicates that you are no longer in the MANUAL mode.

You now have the choice of either:

1. Moving the cursor to the board, and continuing the game against the CHESS program, or...
2. Selecting MANUAL again, to continue playing the game with a friend.

QUIT Use to leave the CHESS program. This option will automatically "boot" another disk that is placed in the disk drive BEFORE you activate QUIT.

To use: select QUIT with the cursor. Press RETURN ◉. The message "Insert system disk and type Q" will appear. Place another program diskette in the drive-1 unit. Type "Q". The CHESS program will then disappear, and the drive-1 disk unit will be activated, loading into the computer whatever program is on that particular diskette. If you change your mind about QUITTING, press RETURN ◉ instead of "Q" with the CHESS disk in place.

REPLAY This feature will show a replay of a move that has been taken back.

This option will only appear after BACK has been used or if RERUN is initiated and then stopped before reaching the end of the moves stored in memory for that particular game.

When useable, REPLAY will appear just below BACK on the menu.

To use, advance the cursor to REPLAY. Press RETURN ◉. The move that was originally made here during regular play (and then taken back), will be shown moving in the same manner as in a game.

If there are more moves available for recall, continue pressing RETURN ◉ for each move you want replayed. After the final move REPLAY will disappear, and the cursor will appear on the ←BOARD option.

RERUN This feature will automatically replay all of the moves in a game.

It may be used at any time during the course of a game to replay the moves made thus far. The moves will be made by flashing the pieces in the normal manner. You can always tell what move number you are on by stopping RERUN and consulting the game listing. See LIST.

To start the RERUN, select the option with the cursor. Press RETURN ◉. The process will begin immediately.

RERUN may be stopped at any time by pressing RETURN ◉. The menu will return, signifying the return to the normal playing mode. You can enter the game at this point and begin play.

• RERUN may be activated at the end of a game and it will replay the entire game.

• RERUN may be activated during a game still in progress, and it will replay all moves made up to that point.

• RERUN may be activated after BACK has been used one or more times, and it will replay the moves that have been taken back.

RESTART This feature is used to set-up the board for a new game. It may be used at any time.

✔ **Note:** The use of RESTART will "erase" the memory in the computer of your previous game (or partial game). The listing will disappear and there will be no RERUN option available. The game is gone.

To use, select RESTART with the cursor. Press RETURN ⊙.

RESUME restores the game to its most advanced point.

It may be used:

A. after BACK is used,
B. if RERUN is stopped before reaching the final move in a game

RESUME is only available when one of these other features is in use. When available, it will appear near the bottom of the menu just above RESTART.

To use, select RESUME with the cursor. Press RETURN ⊙. The board will immediately jump to the most advanced point and the cursor will appear on the board.

● When using RERUN, if you decide you do not want to wait for the RERUN to step through the entire game, stop RERUN and use RESUME to instantly advance to the final position.

SWITCH This option instructs the program to switch sides in a game. Since you can only select features when it is your move, when SWITCH is activated the computer will begin the next move immediately.

To use, select SWITCH with the cursor. Press RETURN ⊙. The CHESS program is now making or "thinking about" the next move.

Use SWITCH if you want to play the black pieces. Before the game starts, select SWITCH. The program will move the white pieces throughout the game, or until SWITCH is activated again.

←TUTOR This is the "doorway" to the special menu of instructional and reference material.

You may choose between six different "chapters" of information concerning basic moves and strategies of the game of chess.

Move the cursor to ←TUTOR and press RETURN ⊙. You will now be on the tutorial menu, and may move the cursor over the possible selections.

● Notice that the word ←TUTOR has been replaced by the word ∧GAME. This new word is what you must select with the cursor to return to the regular game menu of features (and to return to playing a game).

∧GAME This directs the cursor to move from the TUTOR menu to the regular game features menu. It is only visible after you have entered the TUTOR menu (←TUTOR).

CH1 This is one of the "chapter" entries found in the tutorial menu (←TUTOR).

When on the tutorial menu, you have a choice of six "CH" entries, numbered one through six. Each "CH" entry refers directly to a "Chapter" found in the last half of the CHESS User's Guide, and offers on-screen demonstrations of some of the rules and tactics needed to play an effective game of chess.

←TUTOR (continued)

Therefore, "CH1" refers to Chapter One in the manual, "CH2" is for Chapter Two, etc.

To use, you must first be "on" the tutorial menu. Once you have selected ←TUTOR and entered this menu, move the cursor to the desired "CH" entry and press RETURN ⊙.

The regular features menu at the right of the board will disappear, to be replaced by the new menu for whichever entry you selected. You may scan these new menus and select between the options the same as with the regular features menu.

● By watching the documentation line at the bottom of the screen as you move the cursor, you can see a description of the contents of each of these entries.

To return to the normal game playing mode, you must again select the same "CH" entry that was selected in the first place (it will still be visible in its original position). Move the cursor to this entry and press RETURN ⊙. The regular features menu will reappear, and you will now be back to the normal playing mode, and may move off of this menu by selecting ∧GAME.

● A special characteristic of these "CH" selections is that you may view them at any time, even when playing a game. If a game is in progress, you may enter the TUTOR menu and select any of the "CH" entries, and watch the demonstrations they contain. When you exit the "Chapter", you will find that your game is just as you left it.

✔ If you wish to return to a game in progress, you must not go on to the board when given the opportunity to "PRACTICE", such as after the demonstration of how the pieces move in "CH1". If you choose to "PRACTICE", then your game will be erased.

PART (1, 2, etc.). These are options to be found after selecting one of the "CH" entries on the tutorial menu (←TUTOR).

After you have selected a "chapter" entry on the tutorial menu, the regular game features menu will be replaced by the "CH" menu. On chapters two through six, the menu will be made up of "PART 1", "PART 2", etc. These parts are described in the appropriate chapter of the User's Guide.

● You will also see a description of the contents of each PART by watching the documentation line at the bottom of the screen as you scan over them with the cursor.

EXIT? Use to exit a tutorial demonstration. This message can only appear during a demonstration that is part of the tutorial section. When viewing a demonstration, if you press RETURN ⊙, this message will appear at the right of the game board for a few seconds.

1. If you have stopped the demonstration to take a closer look, and then wish to continue, wait until the EXIT? message disappears before pressing RETURN ⊙ again. The demonstration will then continue until it is finished.
2. If you wish to exit the demonstration and go on to something else, press RETURN ⊙ during the time that the EXIT? message is there.

PRACTICE Use to try out your own moves when using the tutorial section. This option appears only after viewing some of the demonstrations contained in the "CH" entries found on the tutorial menu (←TUTOR).

Any time this appears, you have the opportunity to go on to the board and try some moves.

Features Dictionary

Move the cursor until it rests on PRACTICE. Press RETURN ⊚. You will now be able to move the cursor around the board and make moves for the white playing pieces.

Notice that after you selected PRACTICE, this word disappeared, and was replaced by ‡OPTION. As you move the cursor around the board, one of the places it will land on will be the word ‡OPTION, which you must select with the cursor when you wish to leave the practice board.

✔ Do not select PRACTICE if you plan to return to a game in progress after viewing the tutorial demonstrations. If you do so, the game will be erased.

HOW ABOUT A NICE GAME OF CHESS!
Tutorial Section

An Introduction and Beginner's Reference Guide to the Game of Chess.

This section of the User's Guide has been developed to let you in on the ground floor of this fascinating and often complex game. The Tutorial section is divided into two main groups.

The first group is for the newcomer who wants to learn what the different chess pieces are, how they move, and how they can be used to capture the opponent's chess pieces.

● Throughout this section, the term "chess piece" refers to any of the playing pieces used by each side. In typical chess terms, the word "piece", when used alone, refers to playing pieces other than the Pawn.

The second group is where the heart of the game is explored. What are the goals to set—and how do you make your chess pieces work together to realize these goals? By learning more about the ways in which you can attack your opponent, you also can learn to recognize and defend against the same types of attack on your own forces. Your chess army can then be used much more effectively in carrying out your strategies.

Each chapter number refers to one of the "CH" entries that appear on the TUTOR menu. Select ←TUTOR with the cursor and press RETURN ⊚. By now using the right and left arrow keys or game paddle knob (←→), you can move the cursor around to each entry. Press RETURN ⊚ to activate your selection.

After this selection, the original features menu will disappear, to be replaced by a new range of choices. This "CH" menu may be scanned with the cursor and an individual part selected, just as when using the features menu. As you move the cursor, the documentation line at the bottom of the screen will give a brief description of what each selection contains.

You may go back to the "regular" menu (and the game), by selecting the same "CH" option with the cursor and pressing RETURN ⊚. You will then exit this section and be returned to normal play.

● The "CH" option will continue to remain visible in its original place at all times when you are on the special menu.

SOME OF THE BASIC RULES OF PLAY

The General Chess Set-up and Play of the Game

Chess is played by two people (or one person, a computer, and the **CHESS** program). The playing board is composed of 64 squares, which are alternately colored light and dark. The placement of the board is such that there is always a light square on the corner to the right of each player.

Each player begins with 16 chess pieces at opposite ends of the board.

The object of the game is to "checkmate" the opponent's King. The one who accomplishes the checkmate wins. For definitions of "check", "checkmate", and some other special rules and terms, see the section "**RULES OF THE GAME**". These will also be covered further along in the manual.

The player with the lighter pieces (referred to as "white", regardless of actual color), always moves first.

The play then alternates from side to side. There is no such thing as "passing" a move in chess. Each side must move something, somewhere, whether a capture is made or not, or the game is over.

A move takes place when a playing piece is transferred from one square to another.

A capture takes place when a chess piece is moved onto a square that contains a chess piece of the opponent. The opponent's chess piece on that square is then removed from the board, and can not re-enter the game. The second chess piece now occupies that square.

In general, you may never move a chess piece to a square that already contains one of **your** chess pieces. And, except for the piece called the Knight, one chess piece may never jump over any chess piece, whether it is yours or your opponent's.

A game does not always end with a "winner". If both players lose too much material before one of the players can checkmate the other, both may be left with less than is needed for a checkmate. In this instance, the game immediately becomes a "draw" (a tie game). There are other ways for a game to end in a draw. See the definitions for **Draw** and **Stalemate** in the RULES OF THE GAME.

TUTORIAL CHAPTER 1:
How the Chess Pieces Move and Capture

IMPORTANT. Instructions for using the ←TUTOR options for this and other chapters are found after the descriptions of the chess pieces.

THE CHESS PIECES

✔ Remember that the terms "capture" and "defend" refer to the same powers of a playing piece. The area of influence for any chess piece may be seen by use of the OUTWARD option, which shows not only where a chess piece might attack, but which of your own pieces it might defend (protect). If one of your chess pieces can capture an opponent's chess piece on a specific square, it can also defend one of your own chess pieces on the same square. Defend in this case means that you can capture an enemy chess piece that captures the "defended" chess piece. There is no absolute defense, only the threat of recapturing the attacker, or blocking with another of your chess pieces.

● To give you an idea of the value of each chess piece, a number called the "relative value" is given. These numbers are based on the attacking power. The real value of any piece may vary depending on its position on the board (which determines its usefulness).

PAWN (No. of pieces: 8. Relative value: 1) The Pawn can only move forward, and generally for only one square at a time. It always moves towards the opponent's side of the board. When a Pawn reaches the last square on the board in its forward progress, it immediately changes into another chess piece. It must change, and may not remain a Pawn in this position. It may change into any other chess piece except the King. For convenience, when playing with the **CHESS** program, it automatically becomes a Queen, with all of its powers. It is for this reason that the Pawn, although of limited attacking power, is ultimately of great importance.

There are three basic types of moves for the Pawn.

1. On the first move for any Pawn, there is an option to move either one or two squares forward in a straight line. This variation in the Pawn's move was introduced to help speed up the opening part of the game, but the two move option may be used at any time, as long as it is the first move for that Pawn. Note that the Pawn can not jump over another chess piece (on the first move or any other move).
2. After the first move for a Pawn, it may only move one square at a time, and in a forward direction.
3. The Pawn is the only playing piece that does not capture in the same way that it moves. The Pawn may only capture another piece that is located on a square that is in front of, and diagonally adjacent to the square the Pawn is on. This means that the Pawn captures at an angle. If a chess piece is located directly in front of a Pawn, it is safe from attack from that Pawn. The Pawn may only move diagonally when capturing.

4. There is a specific type of capture available to the Pawn under certain conditions called "en passant" capture. For more information, see the RULES OF THE GAME, and Chapter Three of this section.

● Select the Pawn symbol on the CH1 menu for a "movie" starring a Pawn, and also a chance to PRACTICE moving and capturing enemy chess pieces.
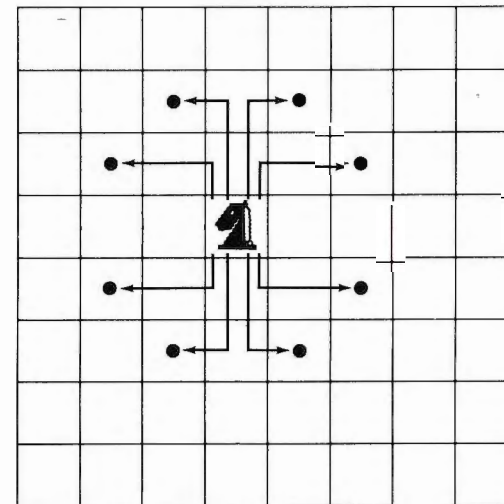
KNIGHT (No. of pieces: 2. Relative value: 3) The Knight moves and captures with a three square "jump". The three squares are not in a straight line, but in an "L" shaped pattern. As the Knight "jumps" to its destination square, it can not be blocked by any chess piece. Any enemy chess piece that may be jumped over is not captured or affected in any way. Captures are only made on the destination square. The Knight is the only chess piece that has the power to jump over other chess pieces.

This "L" shaped move may appear with the short part of the "L" first (one square), or the long part (two squares) first. This means that you may move one square horizontally or vertically, and then two squares in a straight line to either side, or two squares out and then one square to either side.

● Select the Knight symbol on the CH1 menu for a demonstration of how the Knight moves and captures. At the end of the "movie", you have an opportunity to try your hand moving this unusual piece. A good exercise for becoming familiar with the move of the Knight is to try to move it so that it ends up on the square next to where it starts (you will find that it takes three moves to get to the next horizontal or vertical square, and two moves to end up on a square that is adjacent diagonally).

● Notice that the Knight always moves to a square of the opposite color.

THE KNIGHT MOVE

The Knight is usually brought out early in the opening moves of a game. This is because of its ability to jump over the Pawn "barrier", and also because of its value in "controlling the center" of the board (see Chapter Four). A general rule of thumb is to bring out a Knight before moving a Bishop.

BISHOP (No. of pieces: 2. Relative value: 3) The Bishop can move and capture diagonally, and over any distance until encountering another chess piece. If the chess piece is the opponent's, you may capture it. If it is yours, you may not move past.

You start with two Bishops, one on a light square and one on a dark square. Each Bishop can only move or capture on the color of square that it is originally placed. Because of their combined attacking power, two Bishops can be worth more than twice the value of one Bishop.

Note. When using the "practice" part of the CH1 "TUTOR" section, you will be given both Bishops to experiment with, since one Bishop can only attack enemy chess pieces on one color of square. You can then see the advantage of having both of your Bishops at your disposal when trying to attack the enemy.

Tutorial Chapter 1: The Chess Pieces

ROOK (No. of pieces: 2. Relative value: 5) The Rooks can move and capture horizontally or vertically over any distance, until reaching an occupied square. Because of their combined attacking power, two Rooks can be worth more than twice the value of one Rook.

The value of the Rook over the Bishop is that a lone Rook can attack a chess piece on any color of square. Also, the way the chess board is layed out, the horizontal and vertical movement pattern tends to be more of a force than the diagonal.

QUEEN (No. of pieces: 1. Relative value: 9) The Queen can move and capture in any direction (horizontally, vertically, or diagonally), and for any distance until encountering an occupied square.

The Queen combines the moves and capturing power of the Rook and the Bishop. This combination makes it by far the most valuable piece in your army. Because it is so valuable, it must be protected carefully. Your opponent will rarely let an opportunity pass to capture the Queen, even if you are able to capture whatever piece was used in the attack.

The high value placed on the Queen usually makes it unwise to move this piece out during the first few moves in a game. You would then have to spend time protecting the Queen from attack, rather than concentrating on developing your position (see Chapter Four).

KING (No. of pieces: 1. Relative value: invaluable) The King can move and capture one square in any direction. The King is the most important piece. Not the most powerful, just indispensable to the game (see Check and Checkmate in the RULES OF THE GAME).

The King has a special move available to it called "castling". Specific conditions must be met before you are allowed to castle. The RULES OF THE GAME section contains the rules for castling, and it is explained and shown in Chapter Three.

TUTORIAL CHAPTER 1:
How to Use the Disk Tutorial

There are a number of features built in to your **CHESS** program that have been specially designed to help you understand the game. By reading the following, you can get the most use of the **CH1** section, and have some fun as well.

✔ Note. If you are playing a game and wish to use one of the tutorial sections to refresh your memory, you may do so without affecting the game in progress. You may select any of the "CH" sections and the menu selections within them. **HOWEVER,** you should not go onto the board after a demonstration is finished to "practice" unless you don't mind losing the game in progress. If you select **PRACTICE** with the cursor and press RETURN ⊙⊙ when using one of the tutorial sections, the game you were playing will be erased.

When you select "**CH1**", you will see the six basic chess pieces appear to the right of the board. By moving the cursor and watching the documentation line at the bottom of the screen, you can see brief descriptions of each chess piece. By stopping the cursor on a particular picture, and then pressing RETURN ⊙⊙, you will activate a specific demonstration that graphically shows:

A. the board in the starting position with all the playing pieces.
B. your selected chess piece(s) alone on the board.
C. the chess piece moving around the board.
D. The OUTWARD feature being used, which will show where this chess piece can attack, and also how many squares are influenced when it is in different board locations.
E. the chess piece capturing an enemy chess piece.

While the "movie" is in progress, information will appear near the bottom of the screen that emphasizes some of the printed material found in this manual. If you miss something, you can select the same chess piece on the menu and run the "movie" again. They are all under a few minutes in "running time".

If you wish to "freeze" the demonstration, simply press RETURN ⊙⊙. The action on the screen will stop. The word "EXIT?" will appear to the right of the board. This message will remain for a few seconds. If you wish to continue watching the demo, wait until this word disappears before pressing RETURN ⊙⊙ again. The demonstration will then continue as though nothing had happened.

If you wish to end the demonstration, and return to the CH1 menu, press RETURN ⊙⊙ twice. After the first press, the EXIT? message appears. If you now press RETURN ⊙⊙ during the few seconds that this message is visible, you will end the demo, and be returned to the CH1 menu.

At the end of each demonstration in this chapter, you have the option of moving the chess piece around the board yourself, or returning to the menu.

When the demo ends, the word PRACTICE will appear at the right of the board. This message is the "doorway" from the menu to the playing board.

To enter the board to practice moving the chess piece, select PRACTICE with the cursor and press RETURN ⊙⊙. The cursor will then jump onto the board, and the PRACTICE message will change to ↕OPTION.

To move the cursor, use ←→. The cursor will travel to three places, indicating your options. It will land on the featured playing piece with which you may practice moves; it will land on your King, which you may also move if you wish; and it will highlight ↕OPTION.

✔ If you press RETURN ⊙⊙ when the cursor is on ↕OPTION, you will leave the "practice" mode, and be returned to options on the CH1 menu. The cursor may then be used to scan these options as before.

You will see your selected chess piece, plus a few other pieces on the board. Your King and the opponent's King will be there, plus some other enemy pieces. In this special "practice" set-up, none of the enemy pieces are allowed to move. The object here is for you to practice moving your chess piece around the board, and some specific targets have been provided so that you can see how you must maneuver the chess piece in order to capture. Be advised that in a game these pieces do indeed move, and will try to either evade your attack, or to capture you before you capture them.

The opportunity to make moves without worrying about the opponent is not meant to represent how a real game is played. It is "legally" impossible for the opponent to skip a move. The value here is in learning in a unique and uncomplicated manner the special characteristics of each of the playing pieces. The one aspect of "reality" that has been preserved concerns the Kings. You will never play on a board that does not contain both Kings, so they are both here. Also, you can not capture a King.

● If the position of your chess piece attacks the enemy King, the message "CHECK" will appear on the message line. The square containing the enemy King will never be shown as one of the possible moves for your chess piece, since the King is never actually captured during a game.

To move a chess piece, select it with the cursor and press RETURN ⊙⊙. You will then enter the "move mode". Position the cursor on the square to which you wish to move and press RETURN ⊙⊙ again. The chess piece will flash between the original square and the new square, with the chess piece ending up in the new location. The cursor will only travel to squares to which you can legally move with that particular piece.

Several "enemy" pieces will be present on the board, and you can practice capturing them. If the cursor moves over a square that contains a piece of a color different than the piece you are moving, stop the cursor on that square and press RETURN ⊙⊙. Your piece will move to that square, and the enemy piece will disappear. You have captured it!

When you wish to return to the CH1 menu, remember to select ↕OPTION with the cursor and press RETURN ⊙⊙.

TUTORIAL CHAPTER 2:
Check and Checkmate

This chapter explores the most important aspect of the game of chess: attacks on the King. Some of the moves or combinations of moves that can lead to a checkmate can be quite complicated, so only the more basic forms will be treated here. The reason for presenting this subject just after explaining how to move the pieces is that to checkmate the opponent's King is the prime goal in all games of chess, and the sooner you learn about it the better. Be assured that your computer opponent already knows much about this subject.

There are several specific rules concerning check and checkmate. These are found in the RULES OF THE GAME section of this manual. The player should be familiar with these rules before continuing with this section.

✔ To use the CHESS TUTOR feature when reading this section, select CH2 on the ←TUTOR menu before continuing. The different "PART" options that will appear are referred to in the text.

● In all the following examples and PRACTICE opportunities, the white pieces are the ones to move.

● Board positions (with answers) for the "extra" on screen PRACTICE problems appear near the end of the manual.

CHECK

A simple check takes place when a chess piece directly attacks the King of the opponent. Checks are fairly common, and do not in themselves mean that you are in danger of losing the game. They are an important event, however, and may not be ignored.

When your King is in check, you **must** drop everything you were doing and correct the situation. This is a hard thing for a beginner to accept. After all, you are not checkmated. What if on this move you could checkmate the opponent instead of attending to your King?

It would not matter. You must consider your King the literal head of your army, rather than the figurative head. If your King is lost, your entire army ceases to function instantly. You have to protect your King first, and then go back to your other plans. This is an important reason why the King should be kept safely "stashed away" until needed in a later part of the game (usually after most of the powerful pieces have been removed from the board).

The rules of the game take the matter out of your hands completely by stating that if you cannot remove your King from check, then the game is over (checkmate). The rules do not allow a King ever to be captured, nor do they allow the King to move into a position where it is attacked (check). Furthermore, you can not move another of your chess pieces if by this movement it would cause your own King to be placed in check, even if that move could place your opponent's King in check.

Diagram No. 1 shows the black King in check from the white Queen. The King can easily escape from the check by moving over one square (you have a choice of squares here).
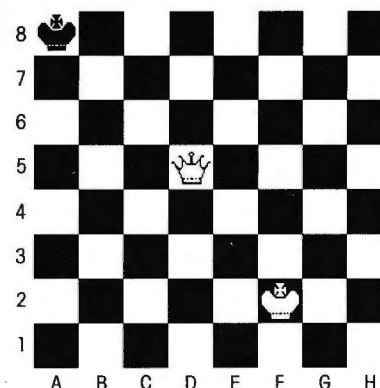

Diagram No. 2 shows a position where the white Bishop can move and place the black King in check. Select PART 1 of the CH2 menu to see how this is done. After the quick movie, PRACTICE will appear, and the board will be set up differently. Select PRACTICE with the cursor to move onto the board and try to find a move for the Bishop that will result in check. If you succeed, the word CHECK will appear on the message line. When you are finished, select ‡OPTION to return to the CH2 menu. This procedure is followed throughout CH2.
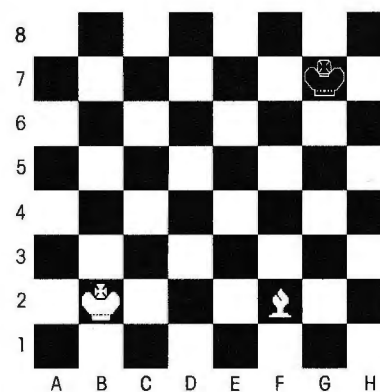
Diagram No. 3 White to check in one move with a Knight. Select PART 2 for the answer and another problem to PRACTICE with.
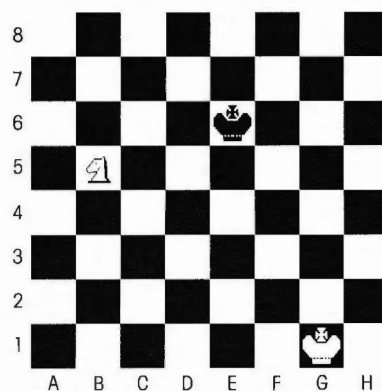

Diagram No. 4 A twist! This is called a "discovered check". Instead of a chess piece moving into attacking position, another of your chess pieces that is not attacking the King moves out of the way to reveal a "hidden" threat to your opponent's King. Here, the white Bishop has a choice of moves that will reveal the attack by the Rook. Select PART 3 for the movie, and another problem to PRACTICE with.
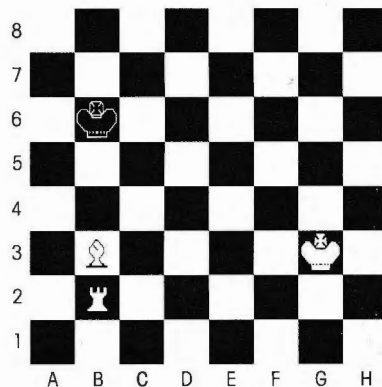
Diagram No. 5 Another example of discovered check (white to move). Select PART 4 for the solution and a different PRACTICE problem.
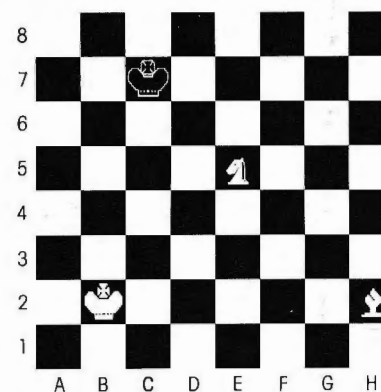
CHECKMATE

Checkmate is the ultimate goal in any chess game. There are hundreds of different, basic checkmates. A few of these basic positions or "patterns" are presented here.

To accomplish a checkmate, your move must put your opponent's King in check, and your opponent must not be able to find a move with any chess piece that will allow his King to escape (either from the checking piece, or another of your chess pieces that may be attacking a square nearby).

Diagram No. 6 This position shows the black King in check from the white Rook. The King cannot escape to a safe square because he is blocked by his own Pawns, and there are no other black chess pieces that can come to the rescue by capturing the white Rook or blocking the Rook's attack. **The black King is considered to be checkmated.** In this and the other positions showing checkmate, look carefully at the moves for the black King and the other black chess pieces to see how there is nothing to be done.
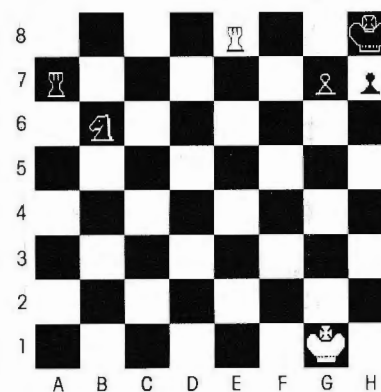

Diagram 6. Black is checkmated.

Diagram No. 7 A "mate-in-one" problem. A "mate-in-one" problem is a position in which you must discover the move that will cause immediate checkmate. White can move one chess piece and checkmate the black King. Select PART 5 for the solution and a similar position for PRACTICE. If you succeed, CHECKMATE will appear on the message line.
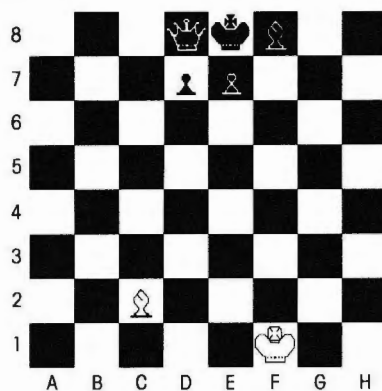
Diagram 7. White to move and checkmate black.

Diagram No. 8 The most common form of checkmate involves two or more of your chess pieces working together. While one chess piece directly attacks the King, the other chess piece or pieces prevents the King's escape. In this position, the white Queen is the direct attacker, and the Rook covers the King's escape route. The attacks that use several of your chess pieces, whether for checkmating or attempting to capture a lesser piece, form the crucial tactical ideas in chess.
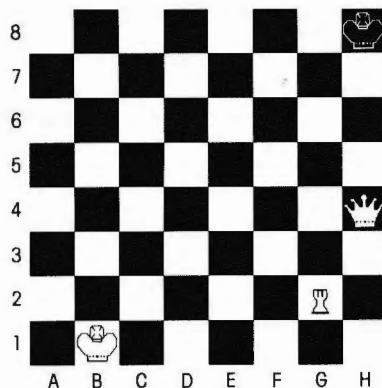
Diagram 8. Black is checkmated.

Diagram No. 9 A mate-in-one problem. Which move by white will result in checkmate of the black King? Select PART 6 for the solution and a different PRACTICE problem.
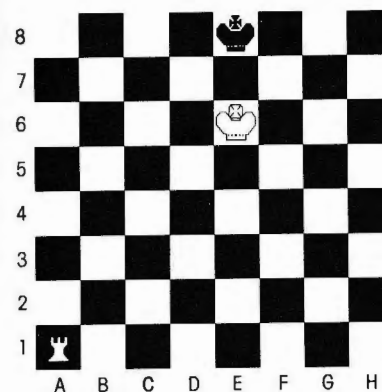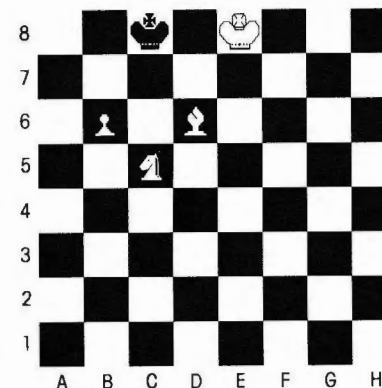
Diagram No. 10 A mate-in-one problem (white to move). Notice how the protective support of your other pieces make this type of mate possible. Select PART 7 for the solution and another PRACTICE problem.

Diagram No. 11 A mate-in-one problem (white to move). This is another problem with a Pawn as the "star". In this problem, you must remember what happens to the Pawn when it reaches the final square in its forward progress. Select PART 8 for the solution and PRACTICE.
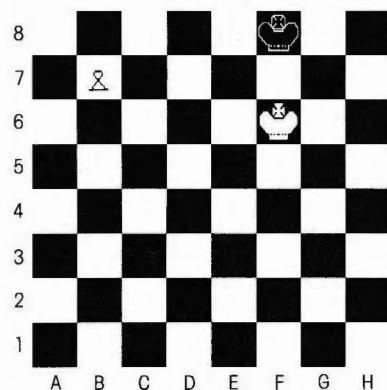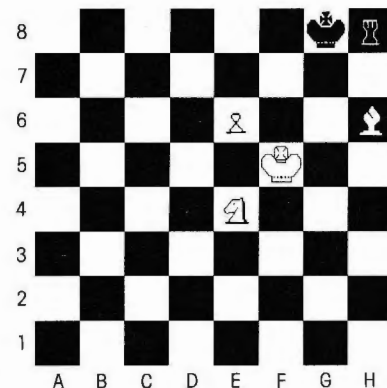
Diagram No. 12 A mate-in-one problem (white to move). Its unique move and ability to jump make the Knight the correct choice here. Select PART 9 for the solution and another PRACTICE with the Knight.

Diagram No. 13 A mate-in-one problem (white to move). The board is more crowded here, so the answer is not so obvious. For the beginner, a board full of chess pieces tends to make the "obvious" not so easy to find. If you know that you are looking for a checkmate, the first thing to do is to determine which of your pieces can at least place the enemy King in check. Without a check, there can be no mate. The most important thing you can learn to do when planning a move in a chess game is to first move a piece "in your mind" to a square you think is good. Then, by imagining the chess piece in this square, try to visualize where it could attack if it were there.
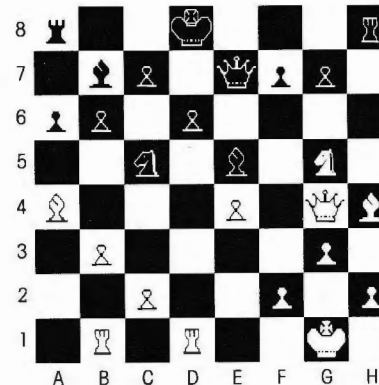
After you mentally move a piece to a square, try to visualize the King trying to escape, or another black chess piece trying to stop the attack in some way.

Select PART 10 for the solution, and an opportunity to PRACTICE with another crowded position.

Diagram No. 14 A mate-in-one problem (white to move). Find the correct mating "pattern". Mate is only a move away. Select PART 11 for the solution and another pattern to solve.
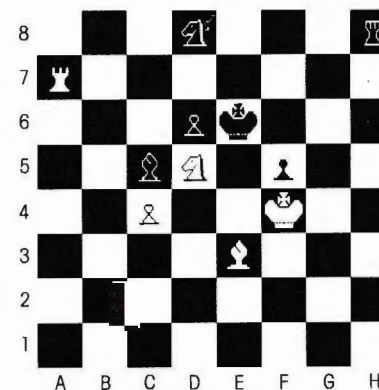
Tutorial Chapter 2: Check and Checkmate

SUMMARY AND PARTING THOUGHTS FOR CHAPTER TWO

1. Checkmate is the goal in any game of chess. This seemingly simple statement is often forgotten by beginners as they are exploring the various ways to move and combine the chess pieces for a clever attack on an enemy chess piece. It is even seemingly forgotten by master players on occasion.

2. A check requires your immediate attention. All of your grand plans must wait while you go about protecting your King. This underlines the general rule that you should keep the King out of harms way, especially during the beginning of the game and during the heated battles of middle game. The King is usually useful only in the endgame (when there are fewer enemy pieces to harass it). The special move of castling (demonstrated in Chapter Three) was custom made to keep the King safely tucked away on one side of the board, and should usually be used at an early opportunity.

3. By examining the various positions involving a one move mate, you should be able to learn from them how to protect your own King from such a fate. There are certain positions where your King is especially vulnerable to even a simple attack of the enemy. Continue to learn about them from your experience as you play more and more games.

4. The most common mates involve more than one of your chess pieces working together in some way.

5. Practice, and learn to visualize a possible position for a chess piece without actually moving it. Imagine the placement of one of your chess pieces on another square, and then look at the enemy chess pieces and imagine what they could do if your chess piece was actually there.

This is the basic method for avoiding "blunders" in chess, and it takes some experience to be able to achieve this with any degree of certainty. There is no substitute for actual play. By constantly practicing "imaginary moves" and then making the move and seeing if you were right, you can quickly develop a skill for this. This "abstract" type of thinking is what chess is all about, and is what needlessly scares some people away. Don't be discouraged when you fail to see a crucial move by the enemy. All players have traveled this sometimes frustrating road on their way to greater proficiency, and even those with a great deal of experience manage to stumble occasionally.

TUTORIAL CHAPTER 3:
Special Moves for the Pieces

This is a short chapter whose purpose is to provide demonstrations of the special King move (castling), and the special capturing move available to the Pawn (en passant).

Select CH3 on the TUTOR menu before continuing.

Castling The RULES OF THE GAME section gives the legal requirements for this move. When and why to use it are covered in Chapter Four. The object here is to give a visual demonstration of the move, and to give you a chance to try it yourself.

Select PART 1 to see a demonstration of both "King side" and "Queen side" castling (King side appears first).

After the demonstration, you will be given an opportunity to PRACTICE making a castling move. You may choose either side to castle to. Remember that you must first select the King with the cursor, press RETURN ⊙⊙, and then choose a square (shown by the cursor) that is two squares away. Press RETURN ⊙⊙ again to make the move. If castling is successful, both the King and the Rook will move simultaneously. This is the only time in a game where two of your pieces can move at the same time.

● If you move a Rook, you may not then use that Rook for castling. If you move the King only one square, you then cannot castle at all. Those are the rules. If you want to try again, you should leave the board, select PART 1 again, and wait for PRACTICE to appear.

Select PART 2 to see a demonstration of a common type of game where both sides are able to castle quickly. This will show the basic preliminary moves that are required to get ready for castling. After the demonstration, you will be given an opportunity to PRACTICE. This time, all the chess pieces are on the board in their starting positions. The idea is for you to select moves for white that will allow castling to take place. You will find that it takes more preliminary moves to castle on the Queen side, which is one reason castling is not as common to this side of the board. As with the other PRACTICE examples, the black chess pieces will not move as you are making your moves.

EN PASSANT "En passant" is explained in the RULES OF THE GAME. This type of capture by the Pawn does not happen in every game because of the special circumstances specified by the rules.

Your opponent must "co-operate" to make the capture possible. You must have advanced a Pawn to the fifth rank (just over the center of the board). With your Pawn in this position, the opponent must (at some point) then use his two-move option when moving out a Pawn that is to one side of your advanced Pawn.

Tutorial Chapter 3: Special Moves

On the next move only, you have the option to capture the opponent's Pawn with the en passant privilege. Your Pawn moves to the square the opponent's Pawn skipped over with its two-square move, and the opponent's Pawn is removed from the board. It is as though the opponent's Pawn only moved forward one square on its move.

Select PART 3 for a demonstration of an en passant capture by white. After the "show", select PRACTICE to try making this move yourself. In the board position you will see, assume that black has just moved the Queen Pawn out two squares. Select your King Pawn with the cursor and press RETURN ⊙. The en passant capturing square will be shown as one of your possible moves with this Pawn. Select the square behind the black Pawn and press RETURN ⊙. That's all there is to it.

Now all you have to do is sit back and wait for the opportunity to use this new found knowledge.

Remember "check-in-one" problems from Chapter Two? Here's one that you may not have

been able to solve only one short chapter ago. White to move and place black in check. Black has just played E7-E5, moving his Pawn.
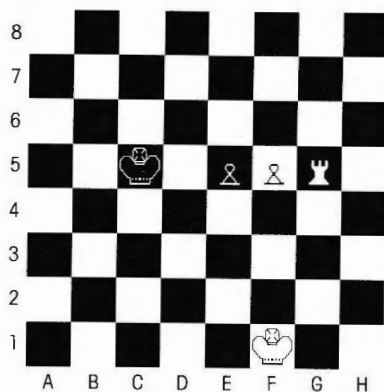
Select PART 4 for the solution.

This shows a dramatic opportunity for using this type of capture. Even though this particular situation may be rare, it shows that even simple plays can affect a position in unexpected ways. The secret lies in being able to recognize the possibilities.

TUTORIAL CHAPTER 4: THE OPENING
Some Strategy and Tactics

✔ This chapter begins by taking a look at the reasoning behind the various styles of opening play. If you wish to go directly to see some actual moves and a description on how to use the CH4 ←TUTOR entries, jump ahead to the section entitled **Some Specific Opening Moves**. Just remember that the opening moves are based more on strategic concepts than on specific moves. Reading about the concepts involved and then trying to use them as you play will bring more understanding and enjoyment to the game than you can achieve by merely memorizing various specific openings.

What is "the opening"?

When trying to describe various aspects of the game of chess, it is convenient to divide the game into three sections. These are:

1. The Opening
2. The Middle Game
3. The Endgame

These "parts" do not always have clear divisions, but often merge gradually into each other. They should be thought of as more conceptual than concrete. They describe the general "look" of the board, and in particular the number of pieces remaining in the game. A checkmate may happen in what is called the "opening", finishing the contest before even the middle game is reached.

The "opening" refers to the initial part of the game where the first plays are being made.

What is Important in the Opening?

Before trying to decide which Pawn or piece to move out, you must first decide what you are trying to accomplish. In the beginning, the ultimate goal of checkmating the opponent should be pushed into the background for a while (not forgotten, just a little delayed). The first moves of the game are usually selected for their effectiveness in securing control of the center of the board, and in bringing into play some of your more powerful pieces. If your opponent gives you a good opportunity for attack, so much the better, but don't play as though this will always happen. If well constructed at the start, a strong position can serve as a base of operations to launch many attacking ventures later in the game.

THE CENTER The center four squares of the board are considered important because any pieces located there enjoy the full range of their powers. A Knight, Bishop, Rook or Queen has a much greater influence in the center of the board than in a corner or on the edge. Therefore, these center squares are considered very important in the future development of the game. In CH1, the number of squares reachable by each piece is shown when it is on the edge of the board, and when it is in the center.

"Control of the center". First, a definition of control. You "control" a **square** if:

a. you occupy it, and also defend whatever is occupying it, or
b. it is empty, but you have Pawns or pieces guarding it.

This does not mean that you own the square in any permanent sense. If the enemy attacks, you may have to withdraw. Often there will be an exchange of pieces, and the side with the most pieces or pieces in a better position, will emerge as the side "in control" of the square.

The concept of control can be used in a broader sense when talking about "control of the center". by positioning several Pawns and pieces so that they either occupy or attack these squares, you can establish some sort of control over the entire area, making it hazardous for the opponent to move around in this vicinity and allowing you to attack the opponent over a wider range.

While you are trying to gain control of the center in the opening your opponent may very well have the same goal, and the resulting position gives neither side real "control". When this happens, it is often left to the moves and captures of the middle game to determine who, if anyone, eventually establishes a real claim here.

Control of the center is much less an issue in the endgame, when much of the material on each side is gone. The critical action then revolves around the Kings, and also whatever Pawns may be left (for possible promotion).

DEVELOPMENT OF PIECES To "develop" a piece means to bring it out to where it can exert greater influence. As mentioned earlier, the real value of a piece can depend on its board position. Additionally, a lone piece can usually not accomplish very much without the aid of a supporting piece, so try to get several pieces working together.

A good "developing move" in the opening gets a piece "out" to where its power may be used the most effectively, especially to help you attack and defend the center squares. So try to find a square that is least obstructed by your own Pawns and pieces.

CASTLE EARLY Your King has two important features:

A. It must always be protected at all costs.
B. It has little or no tactical value to you during the opening.

Castling is very useful because it: **1)** gets the King out of the way of your developing pieces; **2)** puts it in a safer position at the side of the board; **3)** brings a powerful Rook into play (develops it).

If you postpone castling because of an attack you are developing, you may find that you are not given the opportunity again. As the game heats up in the middle game, to break away to spend one move castling often becomes dangerous, if not impossible. Remember that if you move your King at all, you cannot castle afterwards.

Watch out for immediate threats This is a general principle throughout the game, but especially affects those attempting to follow a "formula" in the way they play. There are just too many things to remember and think about, and before you know it, your opponent has dived in and captured a valuable piece. And you had been so careful to try for good development and center control!

You have so many things to look at and decide on that it is easy to overlook a little detail like the fact that you have an opponent who is also trying to win the game. This can happen to the best of players, and it is certainly common with beginners.

The special advantage of playing against the CHESS program is that when the inevitable happens, you have the option of taking back the embarrassing moves, and trying again, this time paying more attention to the other side while experimenting with your developing moves. You may also cancel the game and **RESTART**. These features help to make the learning process a little less frustrating, and can speed up the process of learning how different strategies affect your game. Neither action will bring a complaint from your computer opponent.

It is also very valuable, however, to play out complete games, mistakes and all—in chess, you learn from experience. You have the opportunity here to make your own decisions on when to quit and when to continue.

Summary of Opening Strategy

1. Remember the importance of center control (mobility for your own pieces, restricted movements for your opponent).
2. Use your moves efficiently to develop your pieces as quickly as possible, rather than spending too much time moving Pawns around.
3. Castle early.
4. Keep an eye on your opponent, and watch for immediate threats on your developing pieces.
5. (From Chapter 1) Bring out Knights before Bishops, and don't try to move your Queen out too early (you may then spend valuable moves just keeping the Queen out of danger).

SOME SPECIFIC OPENING MOVES

Select **CH4** on the **TUTOR** menu. Each "**PART**" contains a short demonstration of a particular opening "line of play".

✔ "**PART P**" of each number (**PART 1P, PART 2P**, etc.), allows you to play a regular game beginning from the specific board position shown with each opening demonstration. Not all **PART** numbers contain this special "play" option. **Do not select a "PART P" entry if you wish to return to a game in progress.** "**PART P**" will automatically begin a new game.

● By scanning over the "**PART**" entries with the cursor, and watching the information lines at the bottom of the screen, you will see descriptions of what each part contains.

Before going on, look at the illustration "The Chess Pieces" on page 18. It will save a lot of words if, for example, the "Pawn in front of the Bishop to the left of the Queen" can simply be referred to as the "Queen Bishop's Pawn". Also, as a reference, each move will also be given in terms of the square notation used by the **CHESS** program (see "**Notation**" in the **RULES OF THE GAME**).

Many of the different types of opening play have actual names by which they are known. Knowing the name of an opening style will not in itself improve your play. They are used here only as a helpful reference.

Let's get down to cases. The very first move in a game is simplified a great deal by the fact that your choices are limited to either a Pawn move, or a Knight move. The Pawns may be moved one or two squares out, and the Knights each have two possible destinations. This gives you exactly 20 possibilities for the first move.

Of these 20 first moves, there are only a few that are the clearest in addressing both center control and developing your pieces. Most of the following examples concentrate on one opening (the King Pawn), and give some of the typical variations. Keep in mind that just because you want to play a particular style does not mean that your opponent will follow along. Be flexible, and remember the basic ideas that you are trying to explore.

Opening No. 1 (select **PART 1** for the demo). Note: When the **CHESS** program is set to level **0** or **1**, it does not make use of its library of opening moves (see "Opening Library" in the **FEATURES** section). The program does not have enough time to formulate a variety of different moves for its first and second play. It will always move out the two Knights for the first two plays (but not always the same Knight first). These are not bad moves, as two

Knights moved out towards the center can attack any of the center squares. For more variety in the opening, select level 2, which will play from the library of stored moves (as long as your moves are also in the "library"), but will otherwise not play a stronger game than level 1.

This opening is specifically selected to play against the opening Knight moves of level **0**.

Move 1. Move the King Pawn out two squares (E2-E4). Black moves out a Knight.

If black moves out the King Knight (G8-F6), you have the great opportunity to continue the advance of your Pawn (E4-E5). The black Knight will have to move away, which gives you the time to move your Queen Pawn out two squares to protect the far advanced King Pawn (D2-D4). You now are far ahead in gaining power in the center, and should concentrate on developing your King Knight towards the center (which can protect the Queen Pawn), and continuing with your Bishops and other Knight.

If black moves out the Queen Knight first, you can arrive at the same position as above, but you should bring out the Queen Pawn (D2-D4) before advancing the King Pawn. This Pawn is protected from the black Knight by your Queen. After black's second Knight is brought out, advance the King Pawn a square. The Black Knight will move away.

Opening No. 2 "French defense" (select **PART 2** for the demo).

Move 1. King Pawn moves two squares (E2-E4). Black responds with the King Pawn move, but only moves one square (E7-E6).
Move 2. Queen Pawn moves two squares (D2-D4). Black responds the same—Queen Pawn moves two squares (D7-D5). White must now make a choice, as his King Pawn is now under attack, and is undefended.

Why did black only move one square out on his first move, and why did white play the second Pawn all the way forward? In this variation of the King Pawn opening, black has decided on the course of play, and white is obliged to follow along. There are a number of great second moves for white after his two square King Pawn opening. However, when black moves his King Pawn forward only one square, white must usually abandon other opening styles of play to address this particular "defense".

Black held back the first Pawn, so that he could bring out the second to a square that was protected (by the first Pawn). This is a basic concept for Pawn moves, and should be remembered. As for white, there is now an opportunity to bring up a second Pawn to the so far uncontested center area.

Select **PART 2P** to play a game that has opened with the French Defense.

Select PART 2P to play a game that has opened with the French Defense.

This is an initially simple type of opening, whose main advantage is that the second player (black) has a chance to prevent white from taking the initiative with his own favored opening. The resulting Pawn positions are sound, and there are many different opportunities for both sides from now on.

Opening No. 3 "Caro-Kann Defense" (select PART 3 for the demo).

Move 1. Move the King Pawn two squares (E2-E4). Black responds by moving Queen Bishop Pawn up only one square (C7-C6).
Move 2. Move the Queen Pawn up two squares (D2-D4). Black replies with the same move—Queen Pawn forward two squares (D7-D5).

If you paid attention to the last opening, you should be able to see the similarities. Black has the same motives here as in the "French Defense", i.e., get a Pawn advanced two squares to a center square already protected by another Pawn. A difference here is that black's Queen Bishop is not blocked by a Pawn, as it is with the "French Defense". The trade-off is that now black cannot bring out the Queen Knight to the best square (towards the center). It seems there is a drawback with every move!

Select PART 3P to play a Caro-Kann game.

Opening No. 4 "Four Knights" (select PART 4 for the demo).

Move 1. Move the King Pawn two squares (E2-E4). Black responds the same—King Pawn up two squares (E7-E5).
Move 2. Move the King Knight out and towards the center (G1-F3). Black responds with Queen Knight out towards the center (B8-C6).
Move 3. Move the Queen Knight out and towards the center (B1-C3). Black moves his other Knight out also towards the center (G8-F6).

The "Four Knights" name is easy to justify. In this opening, both players have a good opportunity to develop most of their pieces before beginning any real conflict.

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Select PART 4P to play from this opening.

Opening No. 5 "Giuoco Piano" (select PART 5 for the demo).

Move 1. Move the King Pawn two squares (E2-E4). Black responds the same—King Pawn forward two squares (E7-E5).
Move 2. Move the King Knight out towards the center (G1-F3). Black moves the Queen Knight towards the center (B8-C6).
Move 3. Move the King Bishop out 3 squares (F1-C4). Black responds in kind by moving the King Bishop out 3 squares (F8-C5).

This opening style has been used for over five centuries. The Bishops are nicely developed to "open diagonals" (not blocked).

The rest of the openings listed here tend to be a little more involved (some are potentially aggressive, but harder to fully understand).

Opening No. 6 "Ruy Lopez" (select PART 6 for the demo, and PART 6P to play a game with this opening).

Move 1. Move the King Pawn forward two squares (E2-E4). There is no certainty of your opponent's response to this move, but a common one would be the one that is shown in the demo (black uses your same move, the King Pawn forward two squares (E7-E5).
Move 2. Move the King Knight forward and to the left (G1-F3). This adds to the threats on the center squares, and also directly threatens the enemy Pawn. Black should now look to protecting his Pawn, and this is neatly accomplished with a Knight move (B8-C6).
Move 3. Move your unblocked King Bishop out four diagonal squares (F1-B5).

Why this Bishop move? It develops a piece (the Bishop), but it does not seem to add to your control of a central square. Actually it does help with central control, but indirectly. The black Knight is very important at this point for black's attempt at center control, and the white Bishop is threatening to capture it. Even though the white Bishop will then be captured by one of the Pawns protecting the Knight, it would be an even trade, and white's position in the game would not have suffered. The white Bishop may, of course, select another square to move to on its way out, but other positions do not achieve the same strength in both development and exerting pressure on the opponent.

Black has some good counter moves as well, and white should continue concentrating on the center, bringing more pressure to bear here, and protecting the King Pawn that is still out on its own. Moving up the Queen Pawn two squares (D2-D4) will put direct pressure on black's center Pawn. If the black Pawn takes your Pawn, you can recapture with your Knight, and then you would still be left with a Pawn in the center, and black will have none.

Also, don't forget about your other Knight, which can be brought out towards the center (B1-C3), and be effective in protecting your Pawns, and attacking the center in general.

As soon as you stop to catch a breath, notice that you are all set up for King side castling.

These days, this opening is very popular among advanced players since it offers exciting play for both sides, and has not been "refuted" (a definitely winning line of play has not been discovered for either side).

Opening No. 7 "Sicilian defense" (select PART 7 for the demo, and PART 7P to play a game with this opening).

Move 1. Move the King Pawn two squares (E2-E4). Black moves the Queen Bishop Pawn out two squares (C7-C5).

This is aggressive play for black. White will tend to eventually move out the Queen Pawn two squares (D2-D4), and black will then take this Queen Pawn. Even though the black Pawn will be taken also, black has used a non-center Pawn for this maneuver. White now only has one center Pawn, and black has two. The disadvantage for Black is that his center Pawns have not advanced, and he probably ends up behind in developing pieces as well.

QUEEN PAWN OPENINGS

When opening with the Queen Pawn, the emphasis is usually more on long range development than on the immediate attack. There also seems to be more exceptions to some of the general "rules" concerning controlling the center and developing the pieces, so beware.

Opening No. 8 "Queen's Gambit Declined" (select PART 8 for the demo, and PART 8P to play a game with this opening).

Move 1. Move the Queen Pawn two squares (D2-D4). Black responds in kind: Queen Pawn forward two squares (D7-D5).
Move 2. Move the Queen Bishop Pawn two squares (C2-C4). Black responds by advancing the King Pawn one square (E7-E6).

This is called a "gambit" because white is offering a Pawn for black to take, apparently for "free". It becomes a "gambit declined" when black does not take the bait, as is shown here. Why doesn't black take your second Pawn instead of moving up another Pawn? Well, he might, but this can give you a definite advantage in development, which is what "gambits" are all about.

As a gambit, you offer up a Pawn "sacrifice" to your opponent. If he takes the bait, you can continue with your development and can eventually come out ahead in securing your position. You can usually recapture the black Pawn a few moves later with your King Bishop (so it is not really much of a gambit). If you make much of an effort to immediately recapture this black Pawn (such as with your Queen), you will tend to lose this "timing" advantage (called "tempo").

As a gambit "declined", which is the stronger continuation, there are several common variations, especially to move 2 by black. Instead of black moving the King Pawn one square, which blocks the development of the Queen Bishop, he might move the Queen Bishop Pawn up one square. This does not block a Bishop, but takes away the best square for the Queen Knight. Yet another option is for Black to bring out the King Knight towards the center. This will both develop a piece, and will not block the development of another piece.

"Other" Types of Openings

Just to show that there are indeed a wide variety of opening moves with potential, a few are illustrated that open with other than the King Pawn or the Queen Pawn. Against a skilled player these openings can present complex problems and can be more difficult to play than the King Pawn. But for beginners, they can prove exciting, and be a refreshing change from the same old King Pawn opening.

Opening No. 9 "Reti" (Select PART 9 for the demo, and PART 9P to play a game with this opening).

Move 1. Move the King Knight out towards the center (G1-F3). Black **may** respond with the strongest opening Pawn move safely available, moving the Queen Pawn two squares forward (D7-D5).
Move 2. Move the Queen Bishop Pawn forward two squares (C2-C4). There are numerous possibilities for black at this point.

The "Reti" opening needs the first King Knight move, but is primarily characterized by the Bishop Pawn move by white in response to the Queen Pawn move by Black. If Black does not move the Queen Pawn, the opening can take many turns. Black can also respond on the first move with the King Knight. If black opens with moving the King Pawn one square, or the Queen Bishop Pawn two squares, white can easily convert the opening into a "French" or "Sicilian defense" by advancing the King Pawn two squares on the second move.

This type of opening is part of what is (30+ years ago) called "hypermodern". Although the Knight opening is at least 300 years old, the second move of Queen Bishop Pawn is much newer. In the "hypermodern" opening, occupation of the center is not immediately sought by white. Instead, the opponent is encouraged to play for the center. White then tries to gear up for devastating attacks on the center, leaving white in ultimate control with an invincible force. This can make for fun (though experimental) play for the beginner.

Opening No. 10 "English" (select PART 10 for the demo).

Move 1. Move the Queen Bishop Pawn out two squares (C2-C4).

Yes, that's all. This is what identifies this particular type of opening. Although the roots of this opening in tournament play go back over a hundred years, this is another opening referred to as "hypermodern". The Pawn thus placed attacks the center square four squares in front of the Queen. Generally, the play may continue . . .

Move 1. White moves the Queen Bishop Pawn (C2-C4). Black responds by moving the King Pawn forward two squares (E5-E7).
Move 2. Move the Queen Knight out towards the center (B1-C3). Black moves the King Knight out towards the center (G8-F6).

This is often referred to as a Sicilian defense in reverse. The idea being that if this defense is OK for black, then white can gain even more advantage by making the move in advance (for the "offense"). If you can figure that out, then maybe you don't need to be reading this section.

Finally, a Few Pitfalls in the Opening

Opening No. 11 "Fools Mate" (select PART 11 for the demo).

This is the shortest possible game. It demonstrates how a weak type of opening can open up the direst of consequences.

Opening No. 12 "Scholar's Mate" (select PART 12 for demo).

This looks like a reasonably sound opening, but by example pinpoints a weakness. Keep an eye on what the opponent is doing, or could be doing to your position.

So ends the opening examples.

These variations in the opening moves have been illustrated to give the beginner the idea that there are many ways to open a game and still develop strength. Most of these openings illustrate the principles that were outlined in the first part of this chapter. It is tempting to try out attacks right at the outset, and you are encouraged to toy with this idea at first. However, you will quickly discover that the opening is better spent building a sound base, rather than on hasty attacks.

You may, of course, open any way you please, and continue the game with any of thousands, and then millions, of variations. With proper use of tactics learned in the next chapter (the "Middle Game"), even your most "eccentric" openings can turn out OK in the end.

Try different moves, and using the features of the CHESS program, experiment and learn first hand how different moves can aid or hamper your play later in the game.
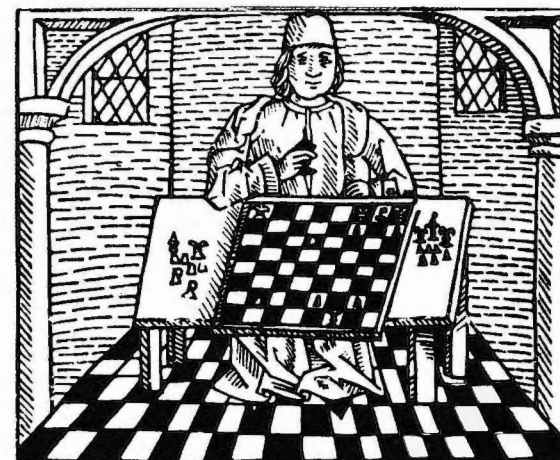
TUTORIAL CHAPTER 5: THE MIDDLE GAME.
Tactics for Attack

This section explores what goes on during the "middle game" phase. The middle game term basically describes the heart of most games of chess—where each side is developing attacking plans (strategy), and figuring exactly how to carry these plans out (tactics). The examples given here, following the initial talk about strategy, cover some of the tactical "patterns", beginning with the most simple, and graduating into patterns that require some real concentration.

INTRODUCTION TO MIDDLE GAME STRATEGY

In the previous chapters, the movements and capturing power of each chess piece have been defined. Chapter Two has shown how chess pieces can work together to devise a powerful attack on the enemy King. Chapter Four has given some basic ideas about the initial moves in a game. With this background, you are ready for the next stage, which is how to recognize some of the "special" powers of your chess pieces, especially when they work together.

Your main goal in the middle game is to checkmate the opponent. This does not mean that every move has to be aimed at the enemy King. Kings are often well protected, so your main goal usually has to be put off for a while. In most games, there must be captures of enemy material (chess pieces) before the checkmate objective can be attained. During the opening moves, checkmating ideas are less prevalent because fewer pieces are in active positions. This all changes during the middle game, where all or most of the pieces are exerting an influence.

The secondary goal of the middle game is to achieve material and positional advantage. If you capture more chess pieces than you lose, and if the ones you capture add up to more "points" in relative value, then you have gained the advantage in material. Positional advantage is more abstract, but generally implies that your chess pieces are in position to deliver stronger attacks, while at the same time hampering the enemy from making effective moves.

● If you have a material advantage, you have a stronger army. This edge in power is a strong advantage when going for a checkmate. Most games between beginning players are decided by material advantage, rather than more subtle positional considerations. A combination of material advantage with superior position forms an irresistible force leading to checkmate.

TACTICS: How to do it

Once you know what you want to do, you have to figure out how to do it. The "doing it" part is what tactics are all about.

You can make use of your chess pieces in many interesting and clever ways that are not always obvious. Defining some of these "tactical patterns" is the goal here. The following is a list of some of these patterns.

- **A.** Simple Capture
- **B.** Piercing Attack
  - 1. The Pin
  - 2. The "X-Ray"
- **C.** The Fork
  - 1. Knight Fork
  - 2. Double Attack
- **D.** Discovered Check
- **E.** Double Check
- **F.** An Overloaded Piece
- **G.** Sacrifice
- **H.** Trapped Piece

Select **CH5** on the **TUTOR** menu before continuing. The different **PARTS** provide demonstrations and answers. There are no **PRACTICE** options. "Additional notes" are given for some of the examples. These explore some of the continuing possibilities for a position, and sometimes involve more complex reasoning.

SIMPLE CAPTURE A "simple capture" is just that: where you can take an enemy chess piece with one of yours. You must determine if it is to your advantage to capture. Most of the time, the enemy will be able to "recapture" your chess piece after you have captured the enemy's.

An even exchange is where you can get full value-for-value for your piece, as in the following example, where you have an opportunity to "exchange" your Bishop for the enemy Knight. Remember that two Bishops can be worth more than twice the value of one, because of the additional squares they can attack; so there is this consideration to make before deciding on whether to capture the enemy Knight. Very generally speaking, one Bishop is worth the same as one Knight.

Diagram No. 1 shows a common "continuation" of the "Ruy Lopez" style of opening moves.
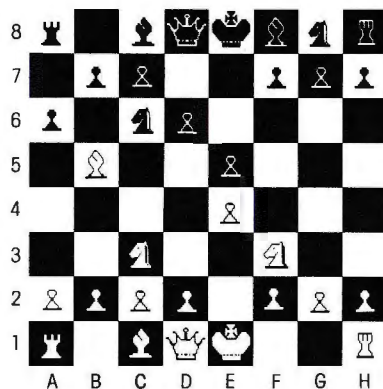
If white does not move the endangered Bishop on B5, the black Pawn will capture it (A6xB5), and although white will be able to recapture the Pawn with his Knight (C3xB5), he will have lost a Bishop for a Pawn and will then be at a significant disadvantage.

Additional Note: White may retreat the Bishop to a safe square that will keep the Bishop in good position (B5-A4), or may exchange it for black's Knight, which is worth about the same value (B5xC6). If white goes for the exchange, black will respond (B7xC6).

Select **PART 1** for a demonstration of the two most likely outcomes of this position.

PIERCING ATTACK A "piercing" attack involves one of the pieces that can move and capture over an entire line of squares in one move. These pieces are: the Bishop, the Rook, and the Queen.

Remember that the power of these pieces does not completely stop on the first square containing a chess piece that would stop their movement along this line. Their power extends indirectly to the edge of the board along any of their particular "lines of influence". This is demonstrated very nicely with the examples of "piercing" types of attack. In this pattern, an enemy chess piece that is **behind** the first enemy piece in the line of attack falls under the influence of the attacking piece.

The Pin A "pinned" chess piece is one that is under attack, but can not move without exposing another chess piece behind it to capture. If this second chess piece is the King, then it would be illegal to move the first out of the way under any circumstance.

Diagram No. 2 shows a pin involving the King. The black Bishop at G5 is "pinned" to its King by white's Queen at G3. The Bishop can not move and expose its King to this attack. This makes the Bishop especially vulnerable to a combined attack by white.
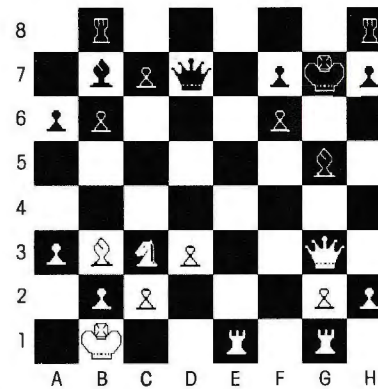
White may play 1. H2-H4, moving the King Rook's Pawn forward two squares to attack the Bishop. Since the black Bishop cannot move, white will soon capture it with the Pawn (2. H4xG5).

Additional note: If black then recaptures with his Pawn (2. ...F6xG5), white can capture again with the Queen 3. G3xG5(check). White will have won a full Bishop. If black puts another defense on the Bishop (with 1. ...H7-H6, for example), then white will not be able to safely capture with the Queen (G3xG5). He can still win a Bishop for a Pawn, which is a considerable value-for-value advantage.

Select **PART 2** for the demonstration of the first "scenario".

Diagram No. 3 shows another pin, but this time the King is not involved. This means that the player may move the chess piece that is "in front" if desired, but risks losing a more valuable piece that is farther back in the same line of attack.
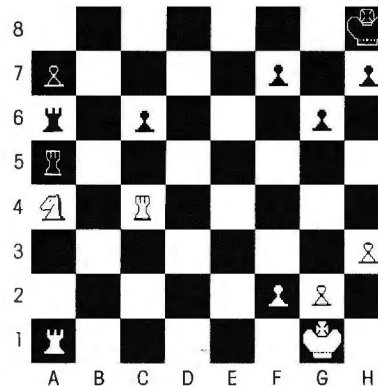
Black's Rook on A6 backs-up his other Rook, and so indirectly attacks the white Knight also. The Knight is defended well enough by the two white Rooks, but the Knight itself can not move. If white moved the Knight at this point, a black Rook could then move down and capture the white Rook at A1, which would be a terrible loss for white. Therefore, the white Knight is "pinned" to the white Rook.

Additional note: This particular position has a few more complications. White cannot move the Rook at A1 away from this file because black could then capture the white Knight (1 ... A5xA4). White could then "trade" Rooks with 2. C4xA4 A6xA4, but the end result is that white still loses a Knight. White's Rook at C4 must stay on the 4th rank for similar reasons. Thus white's Rooks are "tied down" to the defense of his Knight, who in return is tied down to the blocking defense of the Rook at A1.

Select **PART 3** for a demonstration of the consequences if either the white Knight moves, or one of the white Rooks moves.

"X-RAY ATTACK" This is sort of a "reverse pin" in that the first piece in the line of attack is the more valuable and has to be moved, exposing a lesser chess piece that may be captured.

Diagram No. 4 shows a position with a potential for trouble for white. Can you find the move for black that reveals an "x-ray" attack?
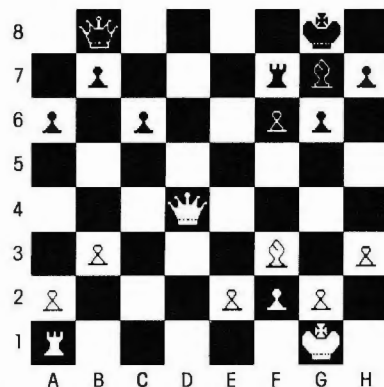
Select **PART 4** to see the answer, along with the consequences.

Additional note: The demonstration shows the best move for white. Under the circumstances, the best white can do is to "protect" the white Rook, and capture the black Bishop after it captures the Rook. Black loses a Bishop, but the exchange of pieces on a value-for-value basis is very much in black's favor.

FORK A "fork" is where one chess piece can simultaneously attack two enemy chess pieces (that, additionally, cannot capture the attacking piece). Since the enemy can only move one of the chess pieces away on the next move, a forking type of attack gives you the opportunity to capture one of the enemy's chess pieces.

Especially in a game between two beginners, it is common to see chess pieces that can be moved into "simple" positions that are very powerful, but the player does not recognize this fact and lets slip an opportunity for capturing material. The "fork" can be one of these basic "positions of power".

Diagram No. 5 shows one of the most apparent types of forking attack, and demonstrates where the name came from—the jabbing prongs of a two pronged fork. Find the Pawn move for white that delivers this type of double attack by one chess piece.
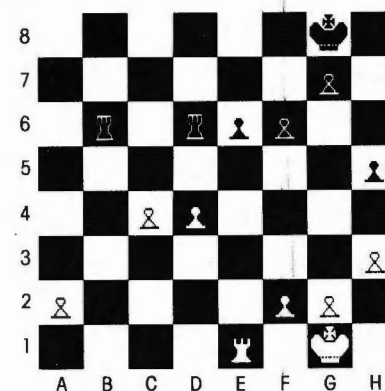
Select **PART 5** for the solution.

Additional note: 1. C4-C5 attacks both Rooks. 1. ... B6-C6; 2. C5xD6 C6xD6. White wins a Rook for a Pawn. You can only dream about finding yourself in this enviable position, but sometimes your opponent slips. Your ability to recognize the possibilities are the key.

Knight fork Because of its move pattern, the Knight tends to be the most difficult piece to anticipate. This is one reason a double attack by a Knight is more likely to surprise the enemy than forking attempts with more obvious pieces.

Diagram No. 6 shows a position where both the black King and the black Rook can be subjected to a forking attack by a white Knight. Can you find the move?
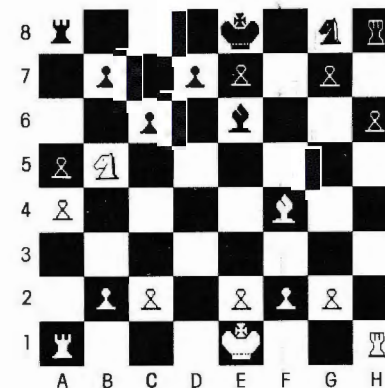
Select **PART 6** for a demonstration of the "solution".

The strongest type of "forking" attack involves the King as one of those under attack. The first consideration must be given to the safety of the King, often leaving the other hapless chess piece to the attacker's whim. In this example, which is a typical threat arising out of many common opening lines of play, the white Knight, by attacking both the King and the Rook (B5-C7 check), has a golden opportunity to make a very advantageous capture.

Additional note: Even if black manages to block the escape of the Knight with subsequent Pawn moves, the Knight has been well used in this venture.

Piece exchange sets up a fork. In this example, the fork is not so easily arrived at.

Diagram No. 7 Can you find the move for black that can win a piece by threatening a fork with the Black Bishop that is lurking two moves away?
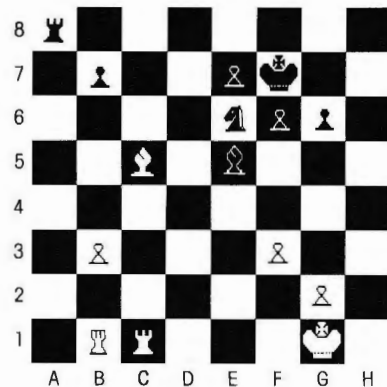
Select PART 7 for the solution.

In this position, black can win a piece with: Knight takes Bishop (1. . . . E6xC5). If white recaptures with his Rook: 2 C1xC5, then black moves the Bishop: 2. . . . E5-D4 check, forking the white King at G1 and the white Rook at C5. After white moves his King, black will capture: 3 . . . . D4xC5, winning the white Rook.

Additional note: Notice that black cannot immediately play the Bishop: 1. . . . E5-D4 check, since white can simply reply: 2. C5xD4. It's hard to fork a Bishop with a Bishop!

Discovered Check A discovered check is where a "non-threatening" chess piece is moved to reveal another chess piece that can attack the enemy King. The piece that is uncovered is always either the Bishop, Rook, or Queen. Only their long range, straight line attacking power makes this kind of "surprise" possible.

Diagram No. 8 In the following position, white has a move that will result in a discovered check on the black King. The power of this type of move is highlighted by white's ability to then capture an important piece.
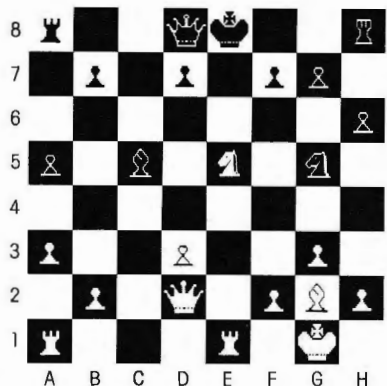
Select PART 8 for a demonstration of the solution.

Additional note: White may play E5-C6 (check). White will be able to capture the black Queen (C6xD8) after black gets out of check. If black plays: 1. . . . D8-E7, white can capture the Queen with C6xE7.

Double Check is another powerful tool. In a double check, there are two pieces that attack the King, and the capture of only one of them would not relieve the threat to the King. This means that the King must be moved, leaving the two attacking chess pieces to move or capture at will.

Diagram No. 9 (black to move) shows how a double check can result in the checkmate of an enemy King. This position shows black in a seemingly hopeless position. White, if it were his turn to move, could take black's Queen (A5xB6), black's Knight (C3xD4), the Rook with G4xH6 (check), or the Pawn with A2xF7 (check). Despite these threats, black can checkmate white in 2 moves, using a double (and a discovered) check as the weapon. Can you find the solution?
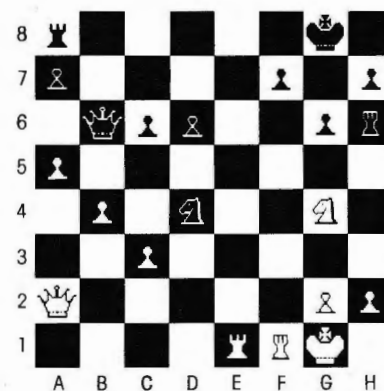
Select PART 9 for a demonstration of the solution.

The winning play is to move the black Knight: 1. . . . D4-E2 check. The Knight moves in to attack the white King, and in so doing reveals another attack on the King from the lurking black Queen (a double check). The Knight may easily be taken with the Rook, but the attack on the King from the black Queen still remains. Therefore, the only possibility for white is to move the King: 2. G1-H1.

Additional note: Now the tricky part begins. Because of the "other" check (by the Queen), the Knight is safe from immediate capture, and may make another move. By moving the Knight to attack the King again (E2-G3), there is checkmate. The Pawn at H2 cannot capture the Knight because it is "pinned" by the black Rook at H6 (remember "pin"?), and the "escape" square for the King, G1, is still attacked by the black Queen. So, checkmate!

An Overloaded Piece If one of your chess pieces is protecting more than one of your other chess pieces, it can be "overloaded" by attacking threats on these "protected" pieces.

Diagram No. 10 shows such a position. Can you find the move by white that will exploit the "overloaded" black Rook?
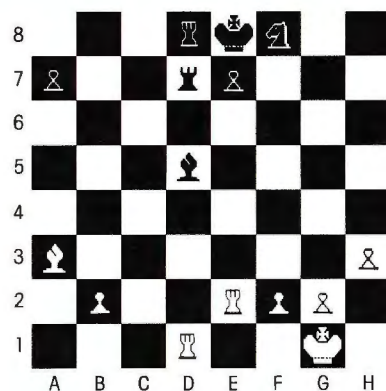
Select **PART 10** for the solution.

In this position, black's Rook at D7 is "overloaded". It must defend both the Bishop at D5 and the Pawn at E7. White may exploit this by playing Rook takes Bishop (1. D1xD5).

Additional note: If black recaptures with the Rook, 1. . . . D7xD5, white responds with the other Rook, 2. E2xE7 checkmate (Rook takes Pawn, and is then protected from capture by the white Bishop). Since this would be worse, white wins a full Bishop by focusing on the overloaded Rook.

Sacrifice A sacrifice is where a player seemingly gives up a chess piece with no chance to recapture and make up the loss. A sacrifice is a very noble thing, and can form the basic foundation of an ingenious attack. One type of sacrifice is found in some opening lines of play, where a Pawn is left unprotected. If the opponent takes the Pawn, you can gain some positional ground in developing your pieces. Another common type of sacrifice aims at the enemy King. Here the intent is more insidious.

Diagram No. 11 shows a sacrifice by black that has as its goal to break through white's defenses around the King. Can you see it?
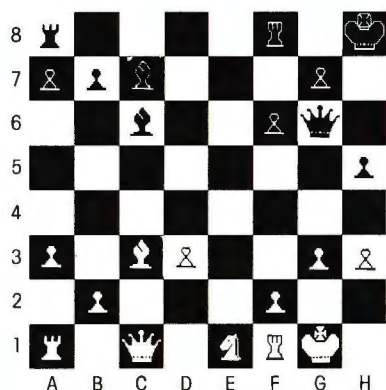
Select **PART 11** for a demonstration of the solution.

In this position, black has a Queen and two Bishops aimed at white's vulnerable Kingside. He can now break through white's defenses by attacking with the Bishop (1. . . . C7xG3). This removes one of the white Pawns defending his King. If white plays the "natural" recapture: 2. F2xG3, then black continues: 2. . . . G6xG3 (check); 3. E1-G2 G3xG2 (checkmate).

Additional note: Notice that white was unable to play: 3. G1-H1, because H1 is attacked by the black Bishop on C6. White's moves besides 2. F2xG3 also suffer: 2. E1-G2 is answered by: 2. . . . G3-H2 (check); 3. G1xH2 G6xG2 (checkmate); or, 3. G1-H1 G6xG2 (checkmate). A "waiting" move such as 2. A1-B1 is countered by: 2. . . . G3-F4 (a "discovered" check); 3. E1-G2 G6xG2 (checkmate). The only move that staves off immediate checkmate is: 2. F2-F3 to which black also replies: 2. . . . G3-F4 (check); 3. (any move) F4xC1 (winning the white Queen).

TRAPPED PIECE A "trapped" piece is one that finds itself running out of squares to retreat to. Even though not under "heavy" attack from powerful enemy pieces, the trapped piece all of a sudden finds itself . . . trapped! This situation is not limited to Bishops (as demonstrated below), but can include Knights, Rooks, and even the Queen (this is one of the dangers in bringing the Queen out onto a "crowded" board).

Diagram No. 12 In the following example, the white Bishop has "painted itself into a corner" with its prior moves. Can you find the Pawn move for black that will attack the Bishop at A4? If so, can you visualize the only retreating move for the white Bishop, and the final attacking move by black?
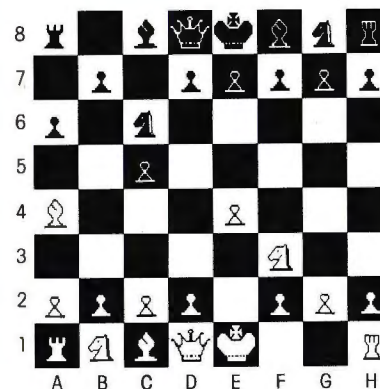
Select **PART 12** for a demonstration of the solution.

Additional note: 1. . . . B7-B5 will attack the Bishop. If white ignores the attack, black will jump at the chance to capture (2. . . . B5xA4). If white does the only obvious thing and retreats the Bishop (2. A4-B3), black can then press on with his Pawns to 2. . . . C5-C4. Once again white's Bishop is attacked by a black Pawn. Black will win the Bishop in exchange for his Pawn. Two possible lines of play are: 3. B3xC4 B5xC4 or 3. 0-0 C4xB3; 4. A2xB3. This final series shows white resigned to losing the piece, and going ahead with his development (castling).

CHECKMATE IN THE MIDDLE GAME

Remember that checkmate is the overriding goal. Here are some examples that can occur in what is still called the middle game (you don't have to wait for the "endgame" for a mate).

Tutorial Chapter 5: The Middle Game

Simple Checkmate. Black has been careless, and now white can checkmate in one move. Can you find it?

Diagram No. 13 A simple checkmate in the middle game.
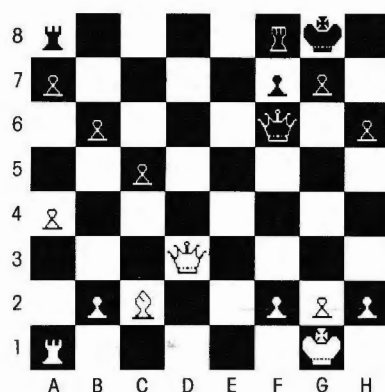
Select PART 13 for a demonstration of the solution.

White can move the Queen from D3-H7 checkmate. On H7, the Queen attacks the black King. The King may not capture the Queen because it would put him in check from the white Bishop on C2. Nor has black any other piece that can capture the white Queen. All squares that the black King could move to are either blocked by his own pieces, or are attacked by the white Queen or Bishop.

Diagram No. 14 The final position in this chapter does not show an attacking pattern that is on the "tactical list", but shows where the threat of a mate can sometimes serve to protect an otherwise "lost" piece.
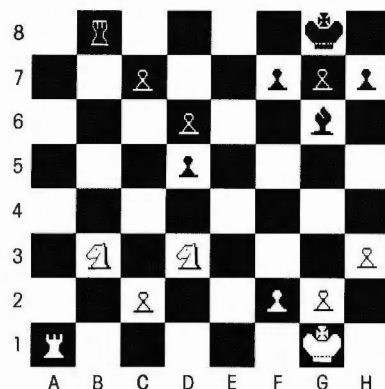
Select PART 14 to see the possible result if black captures a white Knight.

Additional note: In this position, white's Knights are both attacked: the one on B3 by black's Rook, and the one on D3 by the Bishop. The white Pawn on C2 defends both Knights, but is "overloaded". It cannot adequately protect both Knights at the same time. Thus black may try to win a piece by: 1. ... G6xD3; 2. C2xD3 B8xB3. But white then has a saving move with his Rook: 3. A1-A8 (check). This puts the black King in check.

Notice that the King cannot move off of his back rank because his own pawns hem him in. His only move is to interpose his own Rook: 3. ... B3-B8. White may then capture: 4. A8xB8 (checkmate). So white's threat of a "back rank mate" indirectly defends his Knight on B3. Notice that if the black Pawn on H7 were on H6 instead, white would no longer have the mate threat, and his Knight really would be in danger.

TUTORIAL CHAPTER 6: THE ENDGAME
Some Specific Procedures

The "endgame" is reached (eventually) if there has been no successful mating attack earlier in the game (of course). By this point, most of the pieces have been captured (usually including both of the Queens)—leaving only the two Kings, up to one or two pieces for each side, and often one or more Pawns.

Several things become very apparent in the endgame.

First, the game seems "quieter". There are fewer complications, and you are able to foresee attacks on your King, for instance, much more clearly.

Second, if you have managed to gain a material advantage earlier in the game, you can finally get a real chance to use this superiority. An "extra" piece (one more than the opponent) in the endgame becomes worth much more than in any other time in the game.

Third, along the same line, any Pawns that may be left are a constant threat (because of their "queening" ability). A "new" Queen on the board at this time is usually devastating, and most often results in a quick win for the player who manages to accomplish this first. You will find that your remaining Pawns are much more effective if you keep them "linked"— with one protected by another.

Fourth, since the King's army has been whittled down substantially, his majesty usually must now take an active role in fighting the battle. This becomes possible as never before because the opponent's army is reduced also, allowing the King to move out-and-about to a much greater degree. The level of danger is usually low enough for the King to more or less fend for himself. The King does not necessarily go on an attacking rampage—rather, the King can often become an important "protector" of his remaining forces, especially the slow moving Pawns (which are subjected to attacks from the opponent's pieces).

Fifth, you will find that you need to know how to checkmate the opponent with a minimal amount of power. Many games finally come down to a King on one side, and a King and one or two pieces on the other. Even though one side has a clear advantage, there can be problems in making the lone King "cooperate". This King is running for his life, and can be frustratingly elusive. Remember that for a checkmate, the King must be both in check, and unable to get to a safe square. On an open board, there can be a lot of "safe" squares!

Sixth (and finally), you may find that although the board seems to be much simpler in many respects, the play in the endgame may take on more subtle aspects and may even prove to be the most difficult (and longest) part of the game. Knowing **when** and **how** to do what can make all the difference.

In summary:

1. Don't "give away" any of your Pawns earlier in the game (without a definite plan in mind that justifies it).

2. Try to come into the endgame with some advantage in material.

3. Don't be timid about using your King. He has suddenly become a valuable component of your "active" army.

4. Learn the basic ideas for checkmating with the least amount of power. If you do not understand how to do this, you may only draw (tie) a game that you could otherwise win (remember the "50 move rule" listed under "Draw" in the RULES OF THE GAME).

Select CH6 on the TUTOR menu before continuing.

EXCHANGING PIECES TO GET TO THE ENDGAME

Simplify. If you gain a material advantage in a game, unless you have clear checkmating opportunities, you should try to get to the endgame as quickly as possible. Once in the endgame, your advantage is multiplied in value, and you have a better chance of seeing the winning possibilities than on a board where the opponent still has a number of strong pieces (you also have less of a chance of "blundering" into getting checkmated). For the beginner in particular, simplifying a "winning" game by exchanging pieces of equal value can prove an important strategy.

Diagram No. 1 (white to move) shows a position where white is ahead, but black has a

powerful Rook. This can greatly complicate the "win" by white. With accurate play, white could move the Queen away, and eventually promote his Pawn. With skillful play, white could also manage to out-maneuver the black Rook and capture it or checkmate the black King. However, white has an easier method by just trading his Queen for the black Rook immediately and then promoting his Pawn to a Queen. Then the white King and Queen can easily drive the lone black King to a corner or edge of the board and checkmate it.
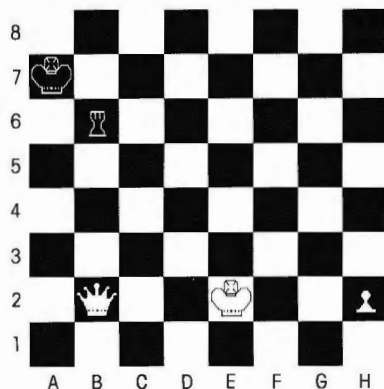
Select PART 1 for a demonstration of this "simplified" type of win.

Diagram No. 2 (black to move) shows another "simplification" of a winning advantage.
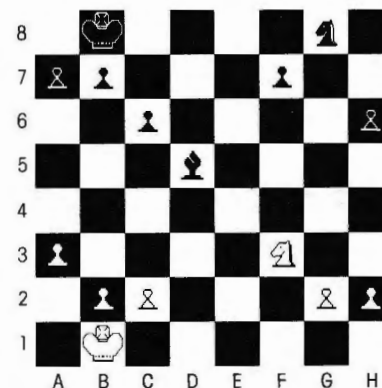
In this position, black has a comfortable material advantage of an extra Bishop. He now has an opportunity to swap his Bishop for white's Knight by playing 1. ... D5xF3. After white recaptures 2. G2xF3, black has an easy win. With the help of his extra Knight, the black King will easily be able to outmaneuver the white King and attack and capture white's King-side Pawns. Then a black Pawn can be advanced and promoted to a Queen. Black could still accomplish this if he left white's Knight on the board, but the process would be more complicated and tedious since black would have to watch out for any threats that the Knight could create while it was still able to hop around the board.
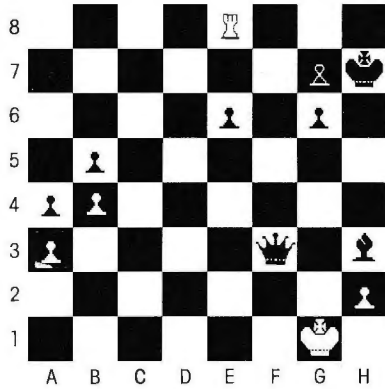
Select PART 2 to see the demonstration.

STALEMATE

The greater the advantage in power on one side, the greater the possibilities for a stalemate. In the endgame it is very possible for one side to find that it has no legal moves, even though there is no check on the King. This position is called a **stalemate**. The game is over, and is scored as a draw (see RULES OF THE GAME for details). A stalemate can occur under many circumstances, and one side does not necessarily have to be "ahead" in the game. Stalemate can be a "trap" for beginners (and very experienced players). If you find yourself ahead in the endgame, but are not confident in your ability to checkmate the opponent with the pieces at your disposal, it is understandable that you would go ahead and promote as many Pawns as you could. You may then find yourself with one, two, or even more Queens to play with, and a win seems assured. But wait! All of a sudden you have not won the game after all, but have merely ended up with a draw—a **stalemate**—because you have not left your opponent any moves. The best advice under these circumstances is to always make a move that will at least "check" the enemy King. In so doing, a stalemate will be avoided (and a checkmate may be found).

There are many more "humble" examples of stalemate, and on more than one occasion a player in a losing position has discovered a way to force a stalemate, thereby turning a lost game into a draw.

Diagram No. 3 (white to move) shows a position where white appears to be in big

trouble: he has only a Rook against black's Queen and Bishop. In addition, black is threatening immediate checkmate by moving his Queen to G2 or F1. But white has a saving move. Can you find it? The ingenious solution to white's dilemma in the face of total defeat is: 1 E8-H8 (check)! Black is in check and has no choice but to capture the white Rook: 1. . . . H7xH8. But now white has no legal moves, and, since he is not in check, the game is a draw by stalemate. White has ''sacrificed'' his Rook for a drawn game! This situation comes up, in one form or another, just often enough to warrant watching out for it.
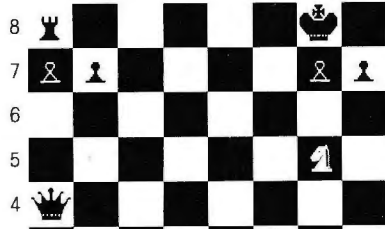
Select PART 3 to see the only ''saving'' move by white.

A Smothered Mate

A ''smothered'' mate occurs where a King is under direct attack, but cannot escape because he is blocked by his own pieces. Smothered mates are actually more common in the middle game (because there are more pieces to do the ''smothering''). Because of their leaping move, the Knight is a favorite candidate to attack the King while he is surrounded by his protectors, who in this case leave no avenue for escape. The following example is presented here because a) it is a little complicated (there are five ''forced'' moves leading to the mate), and b) this particular example takes place with a minimum of pieces left in play. As a form of checkmate the smothered mate certainly bears remembering—it is a case of your opponent's chess pieces actually helping you win the game!

Diagram No. 4 (white to move and mate in five). Can you find the sequence of moves by

white that will checkmate the black King in five moves? As a hint in 'multiple move'' problems of this type, always look for ''forced moves''. This is a type of move where the opponent has no choice, or is very restricted. A forced move only occurs when the King is directly attacked (check), and the rules of the game severely limit the opponent in the possible course of action.

Select PART 4 for a demonstration of the solution.

Additional note: White can execute a very pretty combination to checkmate black in five moves (or less, if blacks permits). The sequence of moves is: 1. F3-D5 (check) G8-H8; 2. G5-F7 (check) H8-G8; 3. F7-H6 (check) G8-H8; 4. D5-G8 (check) A8xG8; 5. H6-F7 (checkmate). In the final position, black is in check from the white Knight. The black King is ''smothered'' by his own Rook and Pawns which cut off his escape. Note that if black plays G8-F8 at moves 1 or 3, white will play D5-F7 (checkmate).
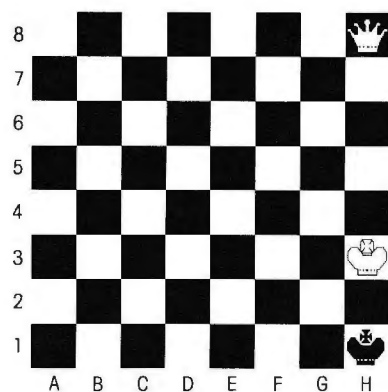
Diagram 9B.
White to move and mate.
Answer: H8-A1 (checkmate)

Diagram 12B.
White to move and mate.
Answer: B2-C4 (checkmate)
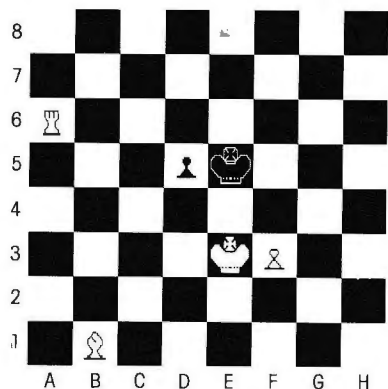
Diagram 10B.
White to move and mate.
Answer: F3-F4 (checkmate). All of white's
pieces (and the black Pawn) block the black
King's escape.
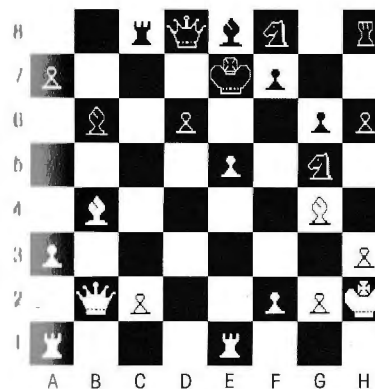
Diagram 13B.
White to move and mate.
Answer: E5xD6 (checkmate)

Diagram 11B.
White to move and mate.
Answer: D7xC8 (checkmate). The Pawn
is "queened", putting a whole new light
on things.
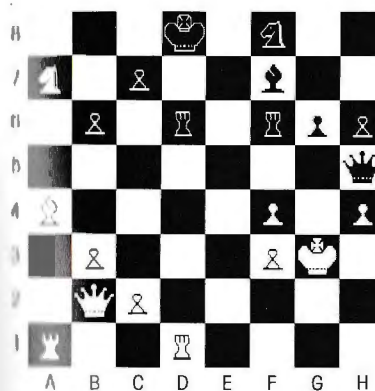
Diagram 14B.
White to move and mate.
Answer: B2xF6 (checkmate)

Index

Notes and corrections to the User's Guide,
&
Supplemental information for using this program with the AppleMouse

CORRECTIONS TO THE USER'S GUIDE:

TUTORIAL SECTION:

Page 82, Diagram No. 3. The note "(black to move)" should be changed to "(white to move)".

Page 84, example 3. In explaining the procedure for checkmate with a King and Rook against a lone King, the opening text implies that you must drive the enemy King into a corner. As the demonstration on the disk shows, the King does not have to be in a corner for the mate. The King will, however, often be moved near or into a corner as the opponent tries to escape being pinned down on an edge of the board by the King and Rook.

FEATURES DICTIONARY

Page 25, left side of the page, second paragraph from the top. This paragraph points out a characteristic of the FLIP option, and belongs in the FLIP entry on page 27.

USING THIS PROGRAM WITH AN AppleMouse

The User's Guide was written assuming game paddle/keyboard use. If you use an AppleMouse, the following material details some of the differences you will find.

Your HOW ABOUT A NICE GAME OF CHESS diskette contains two versions of the program. One version is for use with the AppleMouse, and the other version is for "non-mouse" use (game paddles and/or keyboard control).

The program automatically attempts to make some decisions by itself. If you have an Apple II, II+, //e, you must have a "mouse card" in the unit to be able to select the mouse version. Otherwise, the program automatically loads the game paddle/keyboard version, and the operation follows the instructions as presented in the manual.

If you have a //c, or a mouse card is present in your machine, the program loads the mouse version, and assumes that there is a mouse connected to the machine and that you wish to use it. To stop the demonstration program that is automatically running when you load the program, simply press the mouse button (you may need to keep the button depressed for a few seconds—until the cursor stops its automatic movements).

If you do not wish to use the mouse, type the letter "P" (for "paddle") on the keyboard during the "demo". The demonstration will end, and the other version of the program will be loaded. You must then select either the game paddle or the keyboard to control the game. This is done in the usual manner—by pressing the game paddle button for paddle/keyboard control, or by pressing RETURN for keyboard-only control.

DIFFERENCES IN OPERATION WITH THE MOUSE

When playing a game with the game paddle or keyboard, the cursor will move only onto playing pieces that can legally move, and then will travel only to squares that may be legally moved to. The mouse can move the "+" shaped cursor to any piece or square, but only allowable pieces and squares will "light up" with a square indicator. If you "click" on a square that is not indicated with a small square, a beep will sound, denoting an invalid attempt. This "indicator" will always show when a valid move is recognized by the program.

The full procedure is similar for all versions: First, select a piece to move with the cursor. If a small square appears over the desired piece, press the mouse button to enter the "move mode". Then move the cursor to the desired destination square for that playing piece. If this square "lights up", it is a legal move, and the mouse button can be pressed again to complete the move.

"Doorways" With the mouse, you don't have to use "doorways". When using the game paddles or keyboard, you must select one of the "doorways" to enter and leave the board, or to access the tutor menu (⬥OPTION/◀BOARD; ⬥GAME/◀TUTOR; and ⬥OPTION/PRACTICE when in one of the tutorial sections with a practice option).

These selections are unnecessary with the mouse, which can make the cursor roam all over the screen area. With the mouse, you can move the cursor directly to whatever you wish to do. Therefore, these "cursor directing" options do not even appear on the mouse version.

"CHANGE" & "LEVEL"

The operation of CHANGE and LEVEL are different because without the mouse you would use the game paddle or arrow keys to vary either the piece to be placed on a square, or the level of play.

CHANGE When using the mouse, after selecting CHANGE (move the cursor until CHANGE is highlighted. "Click" (press the mouse button) to select this option), use the mouse to move the cursor to the square you wish to change. Each "click" (press) of the mouse button will change the piece that is on that square. Holding the button down will flip through the entire range of possibilities for that square, including the "empty" option. When the square contains the desired piece, move the cursor on to another square, or move to select the color to move next, or return to the CHANGE option at the right of the board to exit this mode and return to normal play. Remember that the CHANGE word will not be visible if you have set-up an illegal board position (see CHANGE in the FEATURES DICTIONARY).

LEVEL To change the playing strength of the program when using the mouse, select LEVEL with the cursor and "click" the mouse button. The level will advance upwards, one level at a time, through the entire range (0-9) with each click of the mouse. After "9", the sequence will restart with "0". Holding the button down will automatically advance the number. Move the cursor away from this option when the desired level is displayed.

The mouse hardware allows for more accurate timing controls on the moves, which means that the program may play a little differently when using the mouse rather than the paddle/keyboard.

AUTO When "AUTO" is selected, you can choose a different playing strength for black. This is accomplished by selecting the "LEVEL" option after AUTO is clicked the first time. The level of play is changed in the same way as in the regular LEVEL option. After the desired playing strength for black is selected, the AUTO option must be clicked again before the play will begin (even if no change is made, AUTO must be clicked again.)

NOTE: When using the mouse, no commands or operations may be initiated from the keyboard. This includes the "I", "O", & "A" keys that normally access some options while the cursor is in the board area. With the freedom of mouse control, you may easily access these commands at any time just by moving the cursor directly to the feature.

How About a Nice Game of Chess!

"PRACTICE" You encounter "PRACTICE" opportunities in some of the TUTOR sections. With the game paddle/keyboard version, you must select the "PRACTICE" word with the cursor to try out moves for yourself on the keyboard. Also, there is a message indicating what the practice is all about that appears at the bottom of the screen when this is selected.

When using the mouse, since you have more freedom of movement with the cursor, the PRACTICE word does not appear. To "PRACTICE" all you have to do (after the demonstration is over), is to move the cursor onto the board and move the desired playing piece. The correct "PRACTICE" message will appear near the bottom of the screen as soon as you move the cursor off of the particular "PART".

NOTE: "PRACTICE" is not always available. See the TUTORIAL section of the USER'S GUIDE.