### **Help Index**

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### **Introduction to K-Chess Elite**

Welcome to K-Chess Elite, the educational <u>chess</u> program.

K-Chess Elite is simple to use, informative, and plays a good game. It comes in both 16 bit and 32 bit editions.

K-Chess Elite allows you to play with two opponents, one person against the computer (either black or white), or the computer against itself. To <u>move</u>, pick up a piece with the mouse and drag it and drop it where you want it. Or just type in the move that you want to perform. Moves can also be made in other ways using either the mouse or keyboard.

At the top of the screen is the <u>Menu Bar</u> from which all functions of the game can be operated. The main part of the screen is occupied by the <u>Board</u> and the <u>Pieces</u> on it. To the right of the board the <u>Status Panel</u> displays information about the game's progress. Below the board all the <u>taken pieces</u> are shown.

You can get all sorts of <u>helpful information</u> by clicking on pieces with the left mouse button and squares with the right mouse button, using the <u>Quick Hint</u> or <u>Computer Move</u> to get assistance from the computer, using <u>undo</u> and <u>redo</u> to experiment with different moves, and watching the computer's analysis of the game in the Workings Box near the bottom of the <u>Status Panel</u>, and the Narration to the right of it. In fact, K-Chess can help you to play better by showing you more information about the game and more flexibility in how you play it.

This help file even includes the <u>rules of chess</u>, <u>history</u> and <u>glossary</u>, some useful <u>guidelines for</u> <u>beginners</u>, and special information about <u>children</u> and also <u>blind and visually impaired players</u>.

<u>Comments</u> can be recorded within games. Whole games can be <u>saved</u> to disk and <u>reopened</u> later. Both the <u>board layout</u> and the <u>list of moves</u> can be printed.

The game is highly customizable, and you can change dozens of <u>options</u> that control the game's operation and behaviour. There are some special settings for <u>beginners</u>.

### **Information for Beginners**

To avoid frustration, beginner chess players should set <u>K-Chess</u> to play it's simplest possible game. This involves a number of options, but they can all be set together by going to the <u>Options dialog box</u>, clicking on the <u>Strength Page</u> and then on the [Novice] button. To get lots of assistance from K-Chess it is also a good idea at this point to click on the <u>Board Page</u> and ensuring that all the Hints options are selected. Finally press <Enter> or click on the [OK] button.

Remember that K-Chess has lots of features and <u>helpful information</u> for beginners, and some <u>guidelines</u> to help you play. There are special tips relating to <u>children</u>.

### **History of Chess**

There are many theories about where and when <u>chess</u> originated, including some that suggest it is thousands of years old. Perhaps some form of it does date back to ancient times.

The best evidence indicates that chess originated in India around 600 A.D. It spread rapidly through Asia, and was cultivated by the Arabs who in turn introduced it to the territories they had conquered. In time it spread to Spain, Italy, France and other European countries.

Since the late eighteenth century the popularity chess has increased dramatically, especially with the introduction of matches and tournaments. It has been said that there is more literature devoted to chess than for all other games combined.

## **The Rules of Chess**

The game of chess is played by two opponents by moving pieces on a square board.

#### The Board

The <u>chess board</u> is made up of 64 equal squares in colour alternately light (the "white" squares) and dark (the "black" squares). The chess board is positioned between the players so that the square in the corner to the right of each player is white.

The 8 rows of squares running between the edges of the chess board nearest the two players are called "ranks". The 8 rows of squares running at right angles to the ranks are called "files". The rows of squares of the same colour touching at the corners are called "diagonals".

#### The Pieces

At the start of the game one player has 16 light coloured pieces (the "White" pieces) and the other player has 16 dark coloured pieces (the "Black" pieces). The <u>pieces</u> consist of one King, one Queen, two Rooks, two Knights, two Bishops and eight Pawns.

Each player's pieces are initially positioned on the board to cover the two ranks nearest the player. The Rooks occupy the two corner squares in the first rank, the Knights occupy the two squares next to the Rooks on the first rank, the Bishops occupy the two squares next to the Knights on the first rank, the King and Queen occupy the two centre squares on the first rank such that the King is on a square of the opposite colour to itself, and the Pawns occupy the whole of the second rank.

#### Play

The two players <u>move</u> alternately, each player making one move at a time. The player who has the White pieces makes the first move.

Except for castling, a move is the transfer of a piece from one square to another square which is either vacant or occupied by an opponent's piece. No piece, except the Rook when castling or the Knight, can cross a square occupied by another piece.

A piece played to a square occupied by an opponent's piece takes the opponent's piece as part of the same move, and removes it from the board.

#### Moves

*The King*, except for castling, can move to any adjacent square that is not attacked by an opponent's piece. Castling is a move of the King and Rook, counted as a single move, in which the King is transferred from it's original square to either of the nearest squares of the same colour in the same rank, then the rook towards which the King has moved is transferred over the King to the square the King has just crossed. Castling may not be performed if the King has already been moved, or with a Rook that has already been moved. Castling may not be performed if there is any piece between the King and the Rook involved, or if the squares that the King is on or that it must cross or that it will occupy is being attacked by an opponent's piece.

The Queen can move to any square on the rank, file or diagonal on which it is placed.

The Rook can move to any square on the rank or file on which it is placed.

*The Knight* can move one square along the rank or file plus one square along a diagonal moving away from the square it left.

The Pawn can move only forward. Except when making a capture, it may advance on it's first move one or two vacant squares along the file on which it is placed, and on subsequent moves one vacant square along the file on which it is placed. When making a capture it advances on one square along either of the diagonals on which it is placed. A Pawn attacking a square crossed by an opponent's Pawn which has advanced two squares on the previous move can capture the pawn as though the latter had only advanced one square. This capture can only be made on the move immediately following such advance, and is known as "en passant".

On reaching the end of a file a Pawn is immediately exchanged, as part of the same move, for a Queen, Rook, Knight or Bishop of the same colour at the player's choice. This is called 'Pawn promotion".

#### Check

The King is in check when it's square is attacked by an opponent's piece. The check must be averted on the move immediately following, otherwise it is "mate". Check can be averted either by taking the attacking piece, moving a piece between the attacking piece (unless the attacking piece is a Knight), or moving the King.

#### The End of the Game

The game is won for the player who has mated the opponent's King. The game is considered won for the player whose opponent resigns. When using clocks, the game is won by the player whose opponent exceeds their allotted time.

The game is drawn under any of the following circumstances:

- 1. When the King of the player whose turn it is to move is not in check, but such player cannot make a legal move. This is called "stalemate".
- 2. On demand by either player when the same position appears three times, the same player having the move each time. The position is considered the same if pieces of the same kind and colour occupy the same squares, and the possible moves of all pieces are the same.
- 3. On demand by the player who's turn it is to move if at least fifty moves have been made by each player without a capture of a piece and without a Pawn move having been made.
- 4. By agreement between the two players.

### **Guidelines for Beginners**

The information below is from a work entitled "Good Chess Guidelines for Beginning & Amateur Players" by Joe Brooks.

First, a quick primer on the relative values of the pieces. These values only have meaning when deciding whether or not to trade pieces. One is not necessarily winning just because one has more material. Having said that, here it is:

Pawn = 1 Knight = 3 Bishop = 3.25 Rook = 5 Queen = 9

The King is never actually captured, and thus is not listed. The Bishop, while slightly more valuable than a Knight in most cases, is often traded on an equal basis with the Knight. Two Bishops, however, is almost always better than Two Knights, as the advantage of the Bishops is additive. In fact, one place they are definitely superior is in the endgame. You can force checkmate with Two Bishops vs. a lone King, but cannot *force* checkmate with two Knights vs. a lone king. Also, in chess parlance, the Pawn is not considered a "piece" Pawns and pieces are usually referred to as separate things. Knights and Bishops are considered minor pieces, Rooks and Queens major pieces. If you hear someone say he is "a piece up", that generally means he is a minor piece ahead in material. If he were a Rook or Queen up, he would usually specify which. If you've managed to trade your Knight or Bishop for a Rook, you are said to be up the Exchange. Trading a Bishop for a Rook is called being up the minor Exchange, and trading a Knight for a Rook is called being up the major Exchange, though most often no distinction is made between the two, as the difference is small. Having defined a few terms, on to the guidelines.

- 1. Start with moving a centre pawn 2 squares forward. This occupies and controls the centre, meanwhile opening lines for your pieces to get into play (in chess parlance, we say the pieces are "developed" when brought into play). This also allows you to keep the side (or "wing") pawns intact so your King has a safe place to castle later. This rule is here because centre pawn openings are both the easiest to play and to understand, and should be concentrated on by the beginning player. It does not mean other choices are bad, they're just not good ones for beginning players.
- 2. Make only as many Pawn moves as is necessary in the opening to effectively develop the rest of your pieces or as necessary for defense. This is usually no more than four in the early opening phase of the game. The end of the opening phase is generally considered to be reached when all the pieces have been developed and the King has castled.
- 3. Get all your pieces developed as quickly as possible. One piece will not accomplish anything by itself, and you basically can't do anything until you do this first.
- 4. Develop Knights before Bishops. People will give many reasons for this, but as William Lombardy, a US Grandmaster, once told me, those other reasons are basically so much hot air. The real reason is that Knights move more slowly than Bishops, and take longer to get where they're going. A Bishop can travel long range and be developed almost instantly to the desired square. While I think the other reasons may have some minor impact, I think he's essentially correct.
- 5. Develop Knights toward the centre (not the edges). Remember, "A Knight on the rim is dim." This is because it only has half the scope there as in the centre. You can prove this by putting a Knight in the centre of the board, and counting the squares it attacks (you should get eight), and then putting it on the side, and counting how many squares it covers (four). Since this placement has a larger effect percentagewise on the Knight than any other piece (try it and notice what happens to the Rook!), and the Knight is also a slow moving piece, this rule actually applies to almost all pieces, but *especially* the Knight.
- 6. Castle early for King safety and to develop the Rooks, usually immediately after the development of Knights and Bishops, sometimes even before both Knights and both Bishops have come into play, depending on necessity. If you can wait until the Knights and Bishops are in play, however, this gives you the choice of deciding on which side to castle, though sometimes there is only one good choice, as one wing or the other may already be weakened, in which case delaying would give no benefit. See items #1 and #21.

- 7. Do not move a piece twice in the opening. Doing so delays getting your other pieces developed and delays castling.
- 8. Do not bring the Queen out too early. It is a valuable piece, and therefore an easy target for lesser pieces. If you bring it out too early, you are likely to find yourself moving the Queen over and over to get it to safety (repeatedly violating guideline #7), and delaying the development of your pieces while your opponent essentially takes one free turn after another, developing his. If you need to move it so your King can castle queenside, generally moving it up to the second rank just to get it out of the way is ok. Moving it farther than this before you've finished development is usually inviting trouble.
- 9. Control the centre squares. Traffic generally has to run through the centre of the board in one way or another. Control the centre of the board, and you usually will have more freedom to put your plans into effect than your opponent, as your pieces will have more scope & power from the centre of the board, being able to get to any spot on the board relatively quickly.
- 10. Keep one or more Pawns in the centre. This helps you achieve #9 above, as one way to control the centre is by occupying it, and Pawns are the most difficult piece to budge.
- 11. Place your pieces on open lines (open lines are lines of movement that are unobstructed by pawns). Place Bishops on open diagonals, Rooks on open files (files are columns, ranks are rows).
- 12. Coordinate your pieces to work together. One common way to do this is to double pieces up, such as putting a Queen and Bishop on the same diagonal, or putting two Rooks on the same file or rank. They support each other's movement along the diagonal, file, or rank in question, and are essentially twice as powerful this way.
- 13. When protecting a piece, use the least valuable piece available to do so. Especially, protect Pawns with Pawns (forming a Pawn chain). Why tie up a valuable piece to protect a Pawn if it's not necessary? Not only does using less valuable pieces for protection free up the more powerful pieces, but the less valuable pieces are less likely to be scared away or dislodged from their defensive posts.
- 14. Avoid isolated Pawns if possible. Isolated pawns are those that can no longer be protected by an adjacent pawn (because there are no pawns on the adjacent files). Isolated pawns generally occur as a result of Pawn captures being made, so carefully look at the resulting Pawn structure when you have the choice of capturing with a Pawn or another piece. Isolated pawns are weak because they are subject to attack and must be defended by other pieces.
- 15. Especially avoid doubled isolated Pawns. Doubled Pawns are two pawns of the same colour on the same file. The Pawn in back is weak because its movement is inhibited by the Pawn in front. This is not terribly weak by itself. However, doubled isolated Pawns are *very* weak, as they both cannot be supported by other pawns and cannot move freely, a bad combination.
- 16. Make moves that threaten, when possible. These moves limit your opponent's choices, and basically allow you to call the shots, as your opponent usually must respond to your threat before proceeding with his own threats. Alternately, do not get carried away with making your own threats to the point that you overlook your opponent's threats. Being the one who is calling the shots is called having the initiative.
- 17. Don't make pointless threats. This includes checks. Checking or attacking something simply for the sake of doing so has no value. If the threatened piece can simply move away with no detrimental consequences, and there is no advantage to you in making the move in the first place, then the threat is pointless. Doing this can even force your opponent to make a good move. Pointlessly threatening a Knight on the rim just forces your opponent to move it back towards the centre of the board, for example. However, if the Knight is trapped there, then attacking it would allow you to win the piece.
- 18. When ahead in material, exchange pieces. For example, if the total value of your pieces on the board (see relative values listed above) is 16, and the total value of your opponents pieces is 11, this is roughly a 3 to 2 edge. Trade Rooks, however, and now the total value of your pieces is 11,

your opponent's pieces have a total value of 6. This is almost a 2 to 1 edge, which is obviously better.

- 19. When behind in material, don't exchange pieces. This is essentially #18 looked at from the other side of the coin.
- 20. When you are attacked, try to exchange the attacking pieces to reduce the power of the attack. This takes precedence over #18 & #19, as the safety of the King is more important than anything else.
- 21. Don't weaken Pawns in front of your castled King. Generally this means don't move them unless you absolutely have to. Once moved forward they become easier targets for attack.
- 22. Try not to leave your pieces in positions where they are loose (undefended). Loose pieces become targets for attack, and are more likely to be lost than pieces that are defended.
- 23. Avoid creating holes in your position. A hole is a square that can no longer be defended by a Pawn. Since a Pawn is the most useful piece when it comes to threatening another piece to make it move away from a particular spot, this would mean a piece can lodge itself in this hole and be extremely hard to drive away. This is especially bad if the hole is near where your king is hiding out.
- 24. Bring your King into action in the endgame. Once the danger of the middle game is over and there are very few pieces on the board, the King need not cower in the corner anymore. He instead becomes a powerful attacking piece.
- 25. Find your opponent's weaknesses and exploit them. This may be anything from a set of doubled or isolated pawns to a vulnerable King position to something as esoteric (and beyond the scope of this file) as a weak square or a lack of development. To understand how to exploit these weaknesses, play over master games, and watch how they do it. Games of the old masters (Morphy, Tarrasch, Nimzovitch, Lasker, & Capablanca, for example) often illustrate these concepts better than modern games, as they are simply easier to follow and more straightforward in their style of play.
- 26. Don't sacrifice a piece without a clear reason, like a DEFINITE checkmate. Only masters are justified in making speculative sacrifices, and even they will not generally do so. Speculative sacrifices fail much more often than they succeed. If your name is Mikhail Tal, you can ignore this one.
- 27. Always assume your opponent will make the best move. Assume he will be fooled, and you will eventually set yourself up for trouble. Only by determining the best moves for *both* sides can accurate analysis be done.
- 28. Do not follow any of these preceding guidelines blindly or mechanically. Analysis always supersedes these guidelines. If your analysis says you have checkmate in three moves no matter how your opponent replies (you are said to "have mate in three"), then all the guidelines go out the window. Obviously, it doesn't matter if you have to put your Knight on the rim to deliver checkmate. If you see a *specific* reason to break a guideline, such as mate or the win of material, particularly of a piece or more, and you believe your analysis is sound and the benefits outweigh the negatives of breaking that guideline, then by all means break it. These guidelines are simply to help you win, and are not hard and fast rules for every situation. This leads us to #29...
- 29. Be careful when grabbing material, as it can be used as a way of luring your pieces into positions where they will be useless to prevent an onslaught against your King, or even in preventing your pieces from ever developing and getting into the game. But as Bobby Fischer once said (paraphrased), "If you can't see a good reason not to take a piece, then take it." Simply put, don't get greedy over material at the expense of the safety of your King, but don't refuse outright gifts, either.
- 30. And fittingly last, if you are playing a game and are a Rook down or more, with no attack, passed pawn (a Pawn whose passage is unopposed by other pawns and thus is a serious threat to

promote to a queen), or other significant compensation, against a knowledgeable player who is not likely to blunder badly enough for you to get back in the game, graciously resign and get on with the next game. There are exceptions to this, especially with timed play and/or when tournament prize money is on the line at the amateur level, but it is generally a sign of good sportsmanship to admit when you've been defeated and congratulate your opponent. This almost always occurs at the master level, regardless of circumstance few would be caught dead playing drearily on until the inevitable mate is delivered. It should *always* occur when the games are friendly. Also, if you are the victor, be gracious about winning, don't gloat, and compliment your opponent on the things he did right.

If you have found the above information useful, please let the author Joe Brooks know by mail either through the FidoNet CHESS echo, or at one of the following addresses: FIDONet netmail address 1:2609/202 Internet email address joe.brooks@newhor.uu.holonet.net.

# **Helpful Hints**

During the game you may get help on the game in the following ways:

- a) Click on a piece with the left mouse button. All the squares to which that piece can move will be highlighted.
- b) Click on a square or piece with the right mouse button. All the squares containing pieces which threaten that square will be highlighted.
- c) Use the <u>Quick Hint</u> operation on the <u>Move pull down menu</u> to get a suggestion from the computer. If you like that move then select <u>Redo</u> to make it your own. Note that the computer only thinks for a fraction of a second to work out a Quick Hint.
- d) Use the <u>Analyse</u> operation on the <u>Play pull down menu</u> to do a more comprehensive search for the best move. The analysis will continue until it is stopped, or the search has been exhausted, or a move is made manually. The results are displayed under the Best Line in the <u>Status Panel</u>.
- e) Use the <u>Computer Move</u> operation to accept whatever move the computer determines. This allows the computer to take as much time as allowed by the time limits as specified in the <u>Strength page</u> of the <u>Options dialog box</u>, thereby giving a more thorough analysis than Quick Hint, although not necessarily as much time as you might allow in <u>Analyse Mode</u>. If you do not like the move then select <u>Undo</u> to take it back.
- f) Look in the Workings Box at the bottom of the <u>Status Panel</u> to the right of the screen to see the list of moves the computer is analysing, and the relative score it has given them.
- g) Look in the Narration Box at the right of the Status Panel to see a simple analysis of the state of the board. This includes the relative mobility and strength of forces of the two players.

This help file also includes the <u>rules of chess</u>, and some useful <u>guidelines for beginners</u>.

### **Children and Chess**

There is much discussion and many ideas about how to get children, especially young ones, involved in chess. A common problem is how to maintain a child's interest and enthusiasm while they develop the skills needed to actually start winning. Here are some tips.

- a) Play simple endgame scenarios, such as giving a child a King and Queen against a King. These can be good as they involve few pieces and don't require the child to look ahead many moves.
- b) Set "mate in two" type puzzles for the child to solve. These may have more pieces and more complex combinations, but a limited number of moves.
- c) Play full games with children playing other children or adults of similar skill level. They will get satisfaction in winning sometimes, or at least not getting beaten so soundly.

When a child does play an adult of much higher skill, or a computer chess program, there are still ways to keep the child's interest.

- d) Give the child some odds. Time odds (in which the child has perhaps 10 times as long to play as the adult) are generally better that piece odds (in which the adult starts with some pieces missing), because piece odds distort the game more.
- e) Turn the board around one or more times during the game. This could be after a set number of moves, or at the child's request up to a set number of times (perhaps 2 or 3) during the game.
- f) Make the adult play touch-move, even on the computer, so if they touch a piece (or click on it) they have to move it.
- g) Allow the child, but not the adult, to undo moves and take them again (but perhaps only once per move).

You don't need to deliberately let a child win. The above suggestions will give them a fighting chance at winning, but they still need to work for it. See <u>Information for Beginners</u> for details on using K-Chess Elite for novice players.

### Information for Blind and Visually Impaired players

<u>K-Chess Elite</u> has proven to be very suitable for use by anyone who is blind or has any visual impairment.

- a) All moves and <u>menu commands</u> can be controlled through the keyboard alone, so the mouse need not be used.
- b) The program provides a audio feedback about key events in the game.
- c) The screen will automatically adjust when Windows is set to use large fonts.
- d) A large amount of textual information is available about the state of play, which can be readily picked up by screen reader software. This includes a full move list, details about the most recent move, a narration about the opening and state of the board, and a board layout in <u>FEN format</u>. This information is controlled through the settings on the <u>Display page</u> of the <u>Options dialog box</u>. Tab to each different text area to have the text read out.

K-Chess Elite contains a number of custom controls, however they can all be readily mapped to standard Windows controls in your screen reader software.

### The Board

The chess board is the main area covering the left and centre of the screen, and is where all the action of the game takes place, and where all the <u>pieces</u> are played.

The board is divided into 64 squares, defined as 8 ranks (from one side of the board to the other) and 8 files (from one end of the board to another).

The size, colours and texture of the board can be controlled though the <u>Board page</u> of the <u>Options</u> <u>dialog box</u>.

### **The Pieces**

Each player starts with 16 same coloured pieces on the <u>board</u>, either White or Black, consisting of a King, a Queen, two Rooks, two Knights, two Bishops and eight Pawns. Each piece has it's own set of valid moves.

The King moves to an adjacent square in any direction.

The Queen moves to any square on it's current rank, file or diagonal.

The Rook moves to any square on it's current rank or file.

The Knight moves in an "L" shape, two squares along it's current rank or file then one square away at right angles.

The Pawn only moves forward, normally one square, but optionally two on it's first move.

See the <u>Rules</u> for a complete description of all valid moves in chess.

The size and style of pieces can be controlled though the <u>Pieces page</u> of the <u>Options dialog box</u>.

## **Entering and Displaying Moves**

Pieces may be moved using either the mouse or the keyboard.

Using the mouse, drag and drop the piece where you want it to go. (This involves moving the mouse pointer over the piece to be moved, pressing and holding the left mouse button, moving the mouse to where you want the piece to go, and releasing the mouse button.) Alternatively, click on the piece you want to move, then click on the square where you want it to go or the piece you want it to take. If the move is invalid then the piece will go back to its original location and allow you to make another move. Note: to castle, move the King the two squares and the Rook will automatically jump over it.

Using the keyboard, optionally display the <u>Enter Move dialog box</u> first by pressing the <Enter> key or by selecting the <u>Enter Move</u> operation from the <u>Move pull down menu</u>. Then type in a move using any of the accepted <u>notations</u>. The move does not need to be completely specified, as long as it is not ambiguous. For example, enter the starting square and the destination square as in "e2e4", or the piece and destination square as in "Pe4", or just the destination square "e4" if there is only one piece that can move there. Finally press <Enter> or click on the [OK] button.

An alternate way of moving with the keyboard is to press the Space Bar to display the square cursor, use the arrow keys to locate it over the piece to be moved and press the Space Bar again to select it, then use the arrow keys to locate in onto the destination square and press the Space Bar a third time.

The settings on the <u>Pieces page</u> of the <u>Options dialog box</u> enable the various methods of moving to be turned on and off.

The move list in the <u>Status Panel</u> displays all the moves made in the game using the <u>notation</u> specified in the <u>Text page</u> of the <u>Options dialog box</u>.

### Notation

<u>K-Chess Elite</u> can handle four types of notation to enter moves, and three to display moves. Standard Algebraic Notation (SAN), Long Algebraic Notation (LAN) and Computer Notation (CN) can be used for input and display. English Descriptive Notation (EDN) can be used for input only.

In the various notations, moves are made up of one or more of the following elements, in order:

- 1. In SAN, LAN and EDN, the name of the <u>piece</u>. Pieces are identified by a single letter. In English these are K for King, Q for Queen, R for Rook, N for Knight, B for Bishop and P or blank for Pawn, however the <u>Text Page</u> on the <u>Options dialog box</u> allows piece names for other languages to be entered. Regardless of language, the old form "Kt" is also accepted for Knights when entering moves.
- 2. In LAN and CN, the starting Square on the <u>board</u>, and in SAN or EDN either the Rank, File or Square if required to remove ambiguity. In SAN, LAN and CN, the File is identified by a letter A-H starting from the Queens' side of the board, a Rank is identified by a number 1-8 starting from White's end of the board, and a Square is identified by the two together as in A1, E2, D4. In EDN, the File is identified by the piece that starts on that file plus the side if necessary (from left to right QR, QN, QB, Q, K, KB, KN, KR), the Rank is identified by a number 1-8 starting from the player's end of the board, and a Square is identified by the two together.
- 3. In SAN, LAN and EDN, an "x" if a piece was taken, or in LAN a minus sign "-" for all other moves.
- 4. The destination Square in all four notations.
- 5. For pawn promotion, an optional equals sign "=" followed by the name of the piece to which the pawn has been promoted. Pawn promotions without this indication assume a queen.
- 6. A plus sign "+" to indicate Check, or an asterisk "\*" or hash "#" to indicate mate.

In all notations, castling on the King's side is indicated by "o-o" or "O-O", and castling on the Queen's side is indicated by "o-o-o" or "O-O-O".

No special insignia is used for en passant moves.

#### **FEN Format**

<u>K-Chess Elite</u> uses the standard FEN (Forsyth-Edwards Notation) format to <u>enter</u> and <u>display</u> board layouts using ordinary characters.

FEN is made up of a single line of text comprised of six items: the piece placement, active colour, castling availability, en passant target square, half move clock, and full move number. Each item is separated by a space.

- 1. *Piece placement:* The board contents are specified starting with the eighth rank and ending with the first rank. For each rank, the squares are specified from file a to file h. White pieces are identified by upper case piece letters ("PNBRQK") and black pieces are identified by lowercase piece letters ("pnbrqk"). Empty squares are represented by the digits one through eight; the digit used represents the count of contiguous empty squares along a rank. A slash "/" separates data of adjacent ranks.
- 2. *Active colour:* A lower case "w" is used if White is to move; a lower case "b" is used if Black is the active player.
- 3. *Castling availability:* This indicates potential future castling that may of may not be possible at the moment due to blocking pieces or enemy attacks. If there is no castling availability for either side, the single dash "-" is used. Otherwise, a combination of from one to four characters are present. If White has kingside castling availability, the upper case letter "K" appears. If White has queenside castling availability, the uppercase letter "Q" appears. If Black has kingside castling availability, the lowercase letter "k" appears. If Black has queenside castling availability, then the lowercase letter "q" appears. Those letters which appear will be ordered first uppercase before lowercase and second kingside before queenside. There is no white space between the letters.
- 4. En passant target square: If there is no en passant target square then the single dash "-" appears. If there is an en passant target square then is represented by a lowercase file character immediately followed by a rank digit. Obviously, the rank digit will be "3" following a white pawn double advance (Black is the active colour) or else be the digit "6" after a black pawn double advance (White being the active colour). An en passant target square is given if and only if the last move was a pawn advance of two squares. Therefore, an en passant target square field may have a square name even if there is no pawn of the opposing side that may immediately execute the en passant capture.
- 5. *Half move clock:* This is a number representing the count of half moves (or ply) since the last pawn advance or capturing move. This value is used for the fifty move draw rule.
- 6. *Full move number:* This will have the value "1" for the first move of a game for both White and Black. It is incremented by one immediately after each move by Black.

#### Examples

The FEN for the normal starting position is:

rnbqkbnr/pppppppp/8/8/8/8/PPPPPPP/RNBQKBNR w KQkq - 0 1

After the move 1. e4:

rnbqkbnr/pppppppp/8/8/4P3/8/PPPP1PPP/RNBQKBNR b KQkq e3 0 1

Then after 1. ... c5:

rnbqkbnr/pp1ppppp/8/2p5/4P3/8/PPPP1PPP/RNBQKBNR w KQkq c6 0 2 And then after 2. Nf3:

rnbqkbnr/pp1ppppp/8/2p5/4P3/5N2/PPPP1PPP/RNBQKB1R b KQkq - 1 2

For two kings on their home squares and a white pawn on e2 (White to move) with thirty eight full

moves played with five halfmoves since the last pawn move or capture:

4k3/8/8/8/8/8/4P3/4K3 w - - 5 39

### **The Status Panel**

The Status Panel is the area on the main screen to the right of the <u>board</u>, and displays information about the status and progress of the game.

The first item specifies the turn number, and which player (White or Black) is due to make the next move.

The second item indicates the current <u>Mode of play</u> and whether the computer is thinking (if it is the computer's turn to move) or waiting (if it is the user's turn to move).

The optional third item shows the clocks. The game clock at the top or middle shows the total elapsed game time. The player clocks below or on either side (white on the left and black on the right) show the elapsed time for each player. The operation and appearance of the clocks are specified on the <u>Strength page</u> and <u>Display page</u> respectively of the <u>Options dialog box</u>.

The fourth item is the list of all <u>moves</u> in the game so far. The list is displayed in the <u>notation</u> as set on the <u>Text page</u> of the <u>Options dialog box</u>. The list may be scrolled backwards by clicking on the scroll bar at the right of the list. Click on any move to undo or redo the game to that move. The blue highlight is always immediately after the move that has just been played.

The optional fifth item shows either a <u>Comment</u> (if one has been entered), or the computer player's Workings including thinking status, value of the move being analysed and best line the computer has found so far. Comments allow information about the game to be entered manually, and the Workings show the computer's analysis of the game. The Comment and/or Workings information can be turned on and off through the Show Comments and Show Workings check boxes in the <u>Display page</u> of the <u>Options dialog box</u>.

The last item displays important messages about the status of the game and its completion. In particular, it tells whether either player is in Check, and indicates when the game has come to an end through Checkmate, Stalemate, Resignation, Draw or expiration of time.

To the right of the Status Panel, there may be two more items which describe the layout of the board.

The first item is a Narration of the current board layout. If the board is not at the initial position, and the game has not finished, then the narration includes the name given to the particular opening of the game according to the official Encyclopaedia of Chess Openings (ECO), and a narrative about the relative strength of the pieces each player has, the mobility around the board, and the level of control of the centre of the board.

The second item is a description of the board layout in <u>FEN format</u>. This allows the board layout to be copied to another program, and is particularly useful for <u>blind players</u> using screen reader software.

The Status Panel, and the various items on it, can be displayed or hidden through a set of Status Panel check boxes in the <u>Display page</u> of the <u>Options dialog box</u>.

### **Modes of Play**

K-Chess has many different modes of play. The current mode is displayed near the top of the <u>Status</u> <u>Panel</u>.

a) Board Setup mode allows the <u>board</u> to be set up with the pieces in specific positions. This mode is selected from the <u>Board Setup Mode</u> or <u>Clear Board</u> operations on the <u>Play menu</u>.

The five playing and analysis modes allow different combinations of human and computer opponents:

- b) Auto Play mode has the computer playing against itself. This mode is selected from the <u>Auto Play</u> operation on the <u>Play menu</u>.
- c) Play White mode has a human opponent playing White and the computer playing Black. This mode is selected from the <u>Play White</u> operation on the <u>Play menu</u>.
- d) Play Black mode has a human opponent playing Black and the computer playing White. This mode is selected from the <u>Play Black</u> operation on the <u>Play menu</u>.
- e) Two Player mode allows two human players to play. This mode is selected from the <u>Two Player</u> operation on the <u>Play menu</u>.
- f) Analyse mode allows the computer to do a comprehensive search for the best line of play, without actually making any move. This mode is selected from the <u>Analyse</u> operation on the <u>Play</u> <u>menu</u>.

Other temporary modes are also used at specific times. The first three of these are controlled by the settings on the <u>Pieces page</u> of the <u>Options dialog box</u>.

- g) Loading mode is while the computer is loading a previously saved game to the beginning of the game through the <u>Open</u> operation on the <u>Game menu</u>.
- h) Running mode is while the computer is fast loading a previously saved game to the end of the game through the <u>Open</u> operation on the <u>Game menu</u>, or doing a fast multiple move <u>undo</u> or <u>redo</u>.
- i) Playing mode is while the computer is slow loading a previously saved game to the end of the game through the <u>Open</u> operation on the <u>Game menu</u>, or doing a slow multiple move <u>undo</u> or <u>redo</u>.
- j) Ready mode is when the computer has started a new game but is waiting for the first move to be made, before a specific playing mode has been selected and before the clocks have been activated.
- k) Game Over mode is when the game has been won or drawn.

### **The Taken Pieces Panel**

The Taken Pieces Panel is the area on the main screen below the <u>Board</u>, and shows all the <u>pieces</u> that have been taken by both players during the course of the game.

In <u>Board Setup Mode</u> pieces may be dragged to and from the Board and Taken Pieces Panel to set the board up as desired.

The taken pieces can be displayed either in the order in which they were taken, or in order of value from highest to lowest.

The Taken Pieces Panel can be displayed or hidden, and the order of the pieces changed, through the settings on the <u>Display page</u> of the <u>Options dialog box</u>.

### The Menu Bar

All the functions in K-Chess can be accessed from the Menu Bar at the top of the window above the <u>Board</u> and <u>Status Panel</u>. Selecting any item on the Menu Bar opens a pull down menu which contains many operations that can be performed. Many of these operations can also be activated from the <u>Button Bar</u> or by <u>shortcut keys</u>.

The Menu Bar itself can be activated with the mouse by clicking on any menu item; or with the keyboard by pressing the <F10> or <Alt> keys and then using the cursor movement keys and <Enter> to select the required item; or by holding the <Alt> key and pressing the letter highlighted for a menu item, that pull down menu is opened. For example, the "Game" menu is pulled down by pressing <Alt+G>.

The pull down menus on the Menu Bar are as follows:

The <u>Game menu</u> contains operations to the start, save, reload and print whole games.

The <u>Play menu</u> contains operations to set the board and control how it is played and displayed.

The <u>Move menu</u> contains operations to make and withdraw one or more individual moves.

The <u>Help menu</u> gives access to several types of useful information about K-Chess.

### **The Button Bar**

Many of the functions in K-Chess can be accessed easily from the optional Button Bar. These operations can also be activated from the <u>Menu Bar</u> or by <u>shortcut keys</u>. Move the mouse pointer over any button to display a tool tip which indicates the function of the button.

The Button Bar can be moved or hidden through the settings on the <u>Display page</u> of the <u>Options dialog</u> <u>box</u>.

# **Shortcut Keys**

Most functions within <u>K-Chess Elite</u> can be accessed directly by shortcut keys.

#### MENU SHORTCUTS

<alt+g></alt+g>	Activate Game pull down menu
<alt+p></alt+p>	Activate <u>Play pull down menu</u>
<alt+m></alt+m>	Activate <u>Move pull down menu</u>
<alt+h></alt+h>	Activate <u>Help pull down menu</u>

#### GAME SHORTCUTS

<Ctrl+N>New game<Ctrl+O>Open existing game<Ctrl+R>Reopen current game<Ctrl+S>Save current game<Ctrl+A>Save current game As new name<Ctrl+P>Print Moves<Ctrl+B>Print Board

#### PLAY SHORTCUTS

<alt+a></alt+a>	<u>Auto Play mode</u>
<alt+w></alt+w>	Play White mode
<alt+b></alt+b>	Play Black mode
<alt+t></alt+t>	Two Player mode
<alt+q></alt+q>	<u>Rotate Board</u>
<ctrl+c></ctrl+c>	<u>Copy Game</u>
<ctrl+v></ctrl+v>	<u>Paste Game</u>
<alt+v></alt+v>	<u>Variation</u>
<alt+z></alt+z>	<u>Freeze Game</u>
<alt+f></alt+f>	<u>Information</u>
<alt+0></alt+0>	<u>Options</u>

#### MOVE SHORTCUTS

<alt+u></alt+u>	<u>Undo last move</u>
<alt+r></alt+r>	<u>Redo last move</u>
<alt+d></alt+d>	Undo All
<alt+l></alt+l>	Redo All
<alt+i></alt+i>	Quick Hint
<enter></enter>	Enter move
<alt+c></alt+c>	Computer move
<alt+s></alt+s>	Stop thinking
<alt+y></alt+y>	Replay last move
<alt+n></alt+n>	<u>Resign</u>
<alt+e></alt+e>	Comment

#### HELP SHORTCUTS

<F1> <u>Get Help</u>

#### **Game menu** <Alt+G>

The Game pull down menu on the <u>Menu Bar</u> contains operations to commence, load and save games, and exit the program.

New	Reset the board to commence a new game
<u>Open</u>	Open a previously saved game
<u>Reopen</u>	Open the current game file again
<u>Save</u>	Save the current game
<u>Save As</u>	Save the current game with specific name
<u>Print Moves</u>	Print the game listing
<u>Print Board</u>	Print the current board layout
Print Setup	Change the printer settings
<u>Exit</u>	Exit from K-Chess

The bottom of the Game Menu also contains a list of up to nine of the most recently opened files.

# Game|New <Ctrl+N>

The New operation on the <u>Game pull down menu</u> resets the board to starting positions, ready to commence a new game.

# Game|Open <Ctrl+O>

The Open operation on the <u>Game pull down menu</u> displays the <u>Open dialog box</u>. This allows a previously <u>saved game</u> to be retrieved and reused.

The speed at which the moves are replayed as the game is opened, and whether the game is opened to the beginning or the end, is determined by the settings on the <u>Pieces page</u> of the <u>Options dialog</u> <u>box</u>.

## Game|Reopen <Ctrl+R>

The Reopen operation on the <u>Game pull down menu</u> opens the current game file again. This is a quick way to restore a game back to the point at which is was last saved, or to open another game from the same EPD, FEN or PGN game library.

The way in which the game is opened is as per the <u>Open</u> operation.

# Game|Save <Ctrl+S>

The Save operation on the <u>Game pull down menu</u> saves the current game into a <u>file</u>.

If the current game has not already been given a name (ie it has been created with the <u>New</u> operation) then the <u>Save As dialog box</u> will be shown automatically so that a name can be assigned prior to saving.

# Game|Save As <Ctrl+A>

The Save As operation on the <u>Game pull down menu</u> displays the <u>Save As dialog box</u>. This allows the current game to be saved in a new <u>file</u>.

#### Game|Print Moves <Ctrl+P>

The Print Moves operation on the <u>Game pull down menu</u> prints all the moves in the current game to the default printer.

All <u>game and player information</u> is included at the beginning of the printout. If a Chess figurine font is installed on your computer (several are installed automatically during program installation) then the current board layout is also included in the printout.

The <u>Print dialog box</u> is displayed to allow the printer and certain characteristics to be selected. The printer's attributes are controlled by the <u>Print Setup dialog box</u>. The type and size of print is controlled by the settings on the <u>Print page</u> of the <u>Options dialog box</u>.

## Game|Print Board <Ctrl+B>

The Print Board operation on the <u>Game pull down menu</u> prints the current board layout on the default printer. The whole client area of the main window is printed, including the <u>Status Panel</u> and <u>Taken</u> <u>Pieces Panel</u> if displayed.

The <u>Print dialog box</u> is displayed to allow the printer and certain characteristics to be selected. The printer's attributes are controlled by the <u>Print Setup dialog box</u>.

# Game|Print Setup

The Print Setup operation on the <u>Game pull down menu</u> displays the <u>Print Setup dialog box</u>. This allows the printer settings to be viewed and changed.

# Game|Exit <Alt+X>

The Exit operation terminates <u>K-Chess</u>.

## Play menu <Alt+P>

The Play pull down menu on the <u>Menu Bar</u> contains operations to control the board setup, <u>mode of play</u> and playing options.

Board Setup Mode Set the layout of the board		
Clear all pieces from the board		
Set initial status of the board		
Auto Play mode		
Play White mode		
Play Black mode		
Two Player mode		
Analyse mode		
Rotate the board		
Copy game to the clipboard		
Paste game from the clipboard		
Play a variation of the current game		
Freeze the game		
Record game and player information		
Change the operation and appearance of the game		
#### Play|Board Setup Mode

The Board Setup Mode operation on the <u>Play pull down menu</u> starts <u>Board Setup Mode</u>. This allows pieces to be dragged to and from anywhere on the <u>board</u> (as long as the destination is valid). Pieces may also be dragged on and off the board, to and from the <u>Taken Pieces Panel</u>. The layout of the board can thereby be set up to a specific starting position.

Pawns can be <u>promoted</u> to another piece by dropping them on a square on their last rank.

Take all pieces (except Kings) from the board with the <u>Clear Board</u> operation.

Change the castling and en passant status of the board, and details about who moves first, with the <u>Board Settings</u> operation.

Board Setup Mode may be terminated by selecting the Setup Board operation again, or by choosing one of the four <u>Playing Modes</u>.

# Play|Clear Board

The Clear Board operation on the <u>Play pull down menu</u> removes all pieces except the Kings from the <u>board</u>, and starts <u>Board Setup Mode</u> if it is not in that <u>mode</u> already.

Board Setup Mode may be terminated by selecting the Setup Board operation again, or by choosing one of the four <u>Playing Modes</u>.

# Play|Board Settings

The Board Settings operation on the <u>Play pull down menu</u> displays the <u>Initial Board Settings dialog box</u>. This allows the move number and first player to be set, as well as the castling and en passant status of the board.

This operation is only available in <u>Ready and Board Setup Modes</u>.

# Play|Auto Play <Alt+A>

The Auto Play operation on the <u>Play pull down menu</u> starts <u>Auto Play Mode</u>. In this mode the computer plays both White and Black. The clocks are started immediately.

This mode can also be selected by double clicking on the mode indicator near the top of the <u>Status</u> <u>Panel</u>.

#### Play|Play White <Alt+W>

The Play White operation on the <u>Play pull down menu</u> starts <u>Play White Mode</u>. In this mode a human opponent plays White and the computer plays Black. The Board is rotated if necessary so that the White pieces are at the bottom, and the clocks are started immediately.

This mode can also be selected by double clicking on the white clock in the <u>Status Panel</u>.

#### Play|Play Black <Alt+B>

The Play Black operation on the <u>Play pull down menu</u> starts <u>Play Black Mode</u>. In this mode the computer plays White and a human opponent plays Black. The Board is rotated if necessary so that the Black pieces are at the bottom, and the clocks are started immediately.

This mode can also be selected by double clicking on the black clock in the <u>Status Panel</u>.

# Play|Two Player <Alt+T>

The Two Player operation on the <u>Play pull down menu</u> starts <u>Two Player Mode</u>. In this mode human opponents play both White and Black. The clocks are started immediately.

This mode can also be selected by double clicking on the game clock in the <u>Status Panel</u>.

### **Play|Analyse**

The Analyse operation on the <u>Play pull down menu</u> starts <u>Analyse Mode</u>. In this mode the computer searches for the best line of play, with no time limits. The analysis will continue until it is stopped, or the search has been exhausted, or a move is made manually. The results are displayed under the Best Line in the <u>Status Panel</u>. The status of the clocks is not changed by this operation.

# Play|Rotate Board <Alt+Q>

The Rotate Board operation on the <u>Play pull down menu</u> turns the <u>board</u> 180 degrees, as if looking from the other player's perspective.

The board can also be rotated by double clicking on the edge of the <u>board</u>.

# Play|Copy Game <Ctrl+C>

The Copy Game operation on the <u>Play pull down menu</u> copies the state of the board and all moves to the Windows clipboard. This allows the game to be <u>pasted</u> into a document, an e-mail message, or another running copy of <u>K-Chess</u>.

# Play|Paste Game <Ctrl+V>

The Paste Game operation on the <u>Play pull down menu</u> pastes any previously <u>copied</u> board and moves from the Windows clipboard. This allows for transfer of a complete game from a document, an e-mail message, or another running copy of <u>K-Chess</u>.

#### Play|Variation <Alt+V>

The Variation operation on the <u>Play pull down menu</u> displays a smaller duplicate K-Chess board, to allow for investigation of alternate moves. This is essentially equivalent to <u>copying</u> a game to the clipboard, starting another copy of K-Chess, and <u>pasting</u> the current game into it. Any changed options in the variation game will not affect the main game, or any subsequent game as they are not saved.

### Play|Freeze Game <Alt+Z>

The Freeze Game operation on the <u>Play pull down menu</u> <u>freezes the game</u>. This suspends the computer's calculations and the clocks, allowing you to go and do something else for a while. Normally the board is also covered while the game is frozen, but this can be changed through the settings on the <u>Strength page</u> of the <u>Options dialog box</u>.

This function can also be selected by double clicking on the message panel at the bottom of the <u>Status</u> <u>Panel</u>.

# Play|Information <Alt+F>

The Information operation on the <u>Play pull down menu</u> displays the <u>Game and Player Information</u> <u>dialog box</u>. This enables a number of pieces of information on the game's purpose, location, date and players to be recorded.

# Play|Options <Alt+0>

The Options operation on the <u>Play pull down menu</u> displays the <u>Options dialog box</u>. This contains several pages of options which can be set to customise the way the game plays and how it is displayed.

#### Move menu <Alt+M>

The Move pull down menu on the <u>Menu Bar</u> contains operations to perform or reverse a move, start or pause play, and set options.

<u>Undo</u>	Reverse the last move
Redo	Restore the previous reversed move
<u>Undo All</u>	Reverses all moves
<u>Redo All</u>	Restores all moves
<u>Enter move</u>	Type in a move in normal notation
<u>Enter position</u>	Type in a board layout in FEN format
<u>Quick Hint</u>	Get a hint from the computer
<u>Computer move</u>	Make the computer perform the next move
<u>Stop thinking</u>	Force the computer to make it's move
<u>Replay</u>	See the last move again
<u>Resign</u>	Concede defeat
<u>Offer Draw</u>	Offer the computer a draw
Comment	Enter a comment

#### Move|Undo <Alt+U> or <Left Arrow>

The Undo operation on the <u>Move pull down menu</u> reverses the last move that either the computer or human opponent made. This reversed move may be reinstated by <u>Redo</u> or <u>Redo All</u>. Use <u>Undo All</u> to reverse all moves to the start of the game.

# **Move|Redo** <Alt+R> or <Right Arrow>

The Redo operation on the <u>Move pull down menu</u> reinstates the last move that had been reversed by an <u>Undo</u> or <u>Undo All</u>. Use <u>Redo All</u> to reinstate all moves to the end of the game.

#### Move|Undo All <Alt+D> or <Home>

The Undo All operation on the <u>Move pull down menu</u> reverses all moves that have been made by both players, right back to the start of the game. The reversed moves may be reinstated by <u>Redo</u> or <u>Redo</u> <u>All</u>. Use <u>Undo</u> to reverse just the last move.

The speed at which the pieces move back is determined by the settings on the <u>Pieces page</u> of the <u>Options dialog box</u>.

# Move|Redo All <Alt+L> or <End>

The Redo All operation on the <u>Move pull down menu</u> reinstates all moves that had been reversed by <u>Undo</u> or <u>Undo All</u> to the end of the game. Use <u>Redo</u> to reinstate just the last move.

The speed at which the pieces move is determined by the settings on the <u>Pieces page</u> of the <u>Options</u> <u>dialog box</u>.

# Move|Quick Hint <Alt+I>

The Quick Hint operation on the <u>Move pull down menu</u> shows the move the computer would make in the situation. This function is similar to doing <u>Computer Move</u> then <u>Undo</u>, except that the computer is not given as much time to search for the best move (only about half of one second).

# Move|Enter Move <Enter>

The Enter Move operation on the <u>Move pull down menu</u> displays the <u>Enter Move dialog box</u> in which a <u>move</u> can be typed. This can be used instead of the mouse to perform a move.

This function is not available in <u>Board Setup Mode</u>.

# Move|Enter Position <Enter>

The Enter Position operation on the <u>Move pull down menu</u> displays the <u>Enter Position dialog box</u> in which a board layout in <u>FEN format</u> can be typed. This can be used instead of the mouse to set up a board layout.

This function is only available in **Board Setup Mode**.

### Move|Computer Move <Alt+C>

The Computer Move operation on the  $\underline{\text{Move pull down menu}}$  instructs the Computer to make the next move for you.

If you don't like the move the Computer makes, it can be reversed by selecting <u>Undo</u>.

# Move|Stop thinking <Alt+S>

The Stop thinking operation terminates the computer's searching time and forces it to make it's move immediately.

# Move|Replay <Alt+Y>

The Replay operation on the <u>Move pull down menu</u> replays the last move that was made so that it can be seen again. This function is similar to doing <u>Undo</u> then <u>Redo</u>.

# Move|Resign <Alt+N>

The Resign operation on the <u>Move pull down menu</u> records a resignation against the current player and terminates the game.

#### Move|Offer Draw

The Offer Draw operation on the <u>Move pull down menu</u> makes an offer to the computer opponent to draw the game. The computer will accept the offer if it does not think it has an advantage in the game. Offers of draws can only be made after 30 moves.

#### Move|Comment <Alt+E>

The Comment operation on the <u>Move pull down menu</u> displays the Comment Box into which information about the game can be entered. Any number of comments may be stored throughout the game, and may be reviewed with the <u>Undo</u> and <u>Redo</u> operations. The visibility of the Comment Box is determined by the settings on the <u>Display page</u> of the <u>Options dialog box</u>.

#### Help menu <Alt+H>

The Help pull down menu on the <u>Menu Bar</u> contains a number of different types of assistance and information about <u>K-Chess Elite</u>.

<u>Help</u>	Get help about K-Chess
Using Help	Find out how to use the help system
Help Index	See a list of major Help topics
Search Help for	Search for specific topics in Help
Rules of Chess	Review the rules of chess
Tip of the Day	Obtain a tip about chess or this program
K-Chess Web Site	Go to the ARK ANGLES web site for information and ordering
About K-Chess	See program and author information

### Freezing the game

The game can be frozen by selecting <u>Freeze Game</u> on the <u>Move pull down menu</u>.

When the game is frozen, the clocks are stopped so that you can go away and do something else. If the Freeze Covers Board check box in the <u>Strength page</u> of the <u>Options dialog box</u> is checked, then the board is also covered.

The game can be resumed by selecting <u>Freeze Game</u> on the <u>Move pull down menu</u> again, or by clicking on the board covering, or by selecting a <u>playing mode</u>, or by <u>making a move</u>.

#### **Saved Game Files**

K-Chess Elite can read saved games from all versions of K-Chess, Turbo Chess, and some other chess programs, as well as it's own format files and a number of international standard file formats. The following file extensions are commonly used.

- CHS Turbo Chess format, and some other chess programs
- EPD Extended Position Description, a superset of FEN format
- FEN <u>Forsyth-Edwards Notation</u>, a simple format for describing a board layout
- KCH K-Chess and K-Chess Elite native formats
- PGN Portable Game Notation, a comprehensive and internationally accepted format

On the <u>Game pull down menu</u>, use the <u>Save</u> or <u>Save As</u> operations to save the current game to a file, and the <u>Open</u> or <u>Reopen</u> operations to read it in again.

The K-Chess Elite native format can be viewed and changed with any text editor. It incorporates the initial setup of the board (if not the standard layout), all moves made, the player times, board rotation, and certain program options and settings.

The EPD, FEN and PGN formats are internationally agreed formats recognised by many different chess programs. They all support game libraries, with numerous different games recorded in one file. If opening a game library, K-Chess will allow a specific game to be <u>selected</u>. When saving to an existing EPD, FEN or PGN file, K-Chess gives the option to either append the game to the end of the file, or replace the whole file.

Note that K-Chess Elite 16 is restricted to reading and writing files of no more than 32K records. K-Chess Elite 32 has no such limitation.

### **Open dialog box**

The <u>Open</u> dialog box allows a previously saved <u>game file</u> to be selected and opened.

Press the <Enter> key or click on the [OK] button to open the selected game file.

Press the <Esc> key or click on the [Cancel] button to close the dialog box without opening any game file.

#### Save As dialog box

The <u>Save As</u> dialog box allows a <u>game file</u> to be selected, or a new name to be entered. This will then save the current game under that name. When a game is saved under a new name, the original game file, if any, remains unchanged under it's old name.

Press the <Enter> key or click on the [OK] button to save the current game under the new name.

Press the <Esc> key or click on the [Cancel] button to close the dialog box without saving the game.

#### Print dialog box

The Print dialog box allows some attributes of the printout to be selected.

If printing a list of moves, in Print Range choose All to print the whole game, or Selection to print just up to the currently displayed move.

Press the <Enter> key or click on the [OK] button to close the dialog box and start printing.

Press the <Esc> key or click on the [Cancel] button to close the dialog box without printing.

Press <Alt+S> or click on the [Setup] button to display the <u>Print Setup dialog box</u>, which allows the printer settings to be viewed and changed.

#### **Print Setup dialog box**

The <u>Print Setup</u> dialog box allows the printer and print characteristics to be selected.

The Printer group contains buttons to use the default Windows printer, or select a specific printer from a list.

The Orientation group contains buttons to print on the paper in either Portrait or Landscape orientation.

The Paper group contains lists to select the size of the paper and the source from which the printer will get it.

Press the <Enter> key or click on the [OK] button to accept the new settings and close the dialog box.

Press the <Esc> key or click on the [Cancel] button to close the dialog box without changing the settings.

Press <Alt+O> or click on the [Options] button to choose from additional settings specific to the type of printer selected.

Press <Alt+E> or click on the [Network] button to access a printer on the network (if available).
# **Colours dialog box**

The <u>Colours</u> dialog box allows a colour to be selected from a predefined list, or a new colour to be created.

Click on a specific colour to select it.

To add a custom colour to the list press <Alt+D> or click on the [Define Custom Colors] button, select the new colour from the rainbow or enter the colour details, then press <Alt+A> or click on the [Add to Custom Colors] button to add it to the list.

Press the <Enter> key or click on the [OK] button to change to the new colour.

Press the <Esc> key or click on the [Cancel] button to close the dialog box without changing the colour.

# Select Game dialog box

The Select Game dialog box allows one game from a library of games to be selected. This is displayed when an EPD, FEN or PGN <u>game file</u> is <u>opened</u> or <u>reopened</u>, unless the file contains only one game.

Use the up and down arrows on the keyboard, or click on an item to select the required game.

Select the Keep Library In Memory check box to enable reopening of other games in the library to be much faster.

Press the <Enter> key or click on the [OK] button to open the selected game.

Press the <Esc> key or click on the [Cancel] button to close the dialog box without opening the game.

# Initial Board Settings dialog box

The Initial Board Settings dialog box allows the status of the board to be set.

The Castling Allowed check boxes specify whether or not kingside and queenside castling are available for each player. This allows castling to be disabled if a King or Rook may have moved and then returned to it's original square.

The First Player buttons specify which player has the first move from this board layout.

The First Move Number input line specifies which move the game is up to.

The En Passant Target input line specifies the name of the square, if any, to which the first player can move to take the opponent's pawn en passant.

The Moves Since Capture Or Pawn Move input line specifies how many moves have taken place since the last capture or pawn movement. This is used to calculate when a game is eligible for a draw under the 50 move <u>rule</u>.

The Game Status buttons allow an indication to be made that the game was ended by draw or resignation.

At the start of a new game the default settings are that all castling is allowed, the first player is White, the first move is 1, the en passant target is blank, and the moves since capture is 0. If a game is part way through, and the board is reset with the <u>Board Setup Mode</u> operation, then the above are set as per the state of the board at the time. The game status is always Normal unless overridden.

Press the <Enter> key or click on the [OK] button to accept the new settings and close the dialog box.

Press the <Esc> key or click on the [Cancel] button to close the dialog box without changing the settings.

### Game and Player Information dialog box

The <u>Game and Player Information</u> dialog box enables a number of pieces of information on the game and players to be recorded.

The Event Name is the name of the overall event of which this game is a part, or "Casual Game" if there is no formal event.

The Site or Location Name is where the game is played, or blank if not applicable.

The Round Number is the identification of the point in the tournament in which the game is played, or blank if not applicable.

The Event Date is the date of the beginning of the event in which the game is played, or blank if unknown or irrelevant.

The Game Date and Time are when this individual game commenced, or blank if unknown. Time is usually unimportant and can be left blank.

The Annotator is the full name (surname first) of the person who annotated or recorded the game, or blank if unknown or not applicable.

The White Player is the full name (surname first) of the person playing white, or the name of the computer program playing white.

The Black Player is the full name (surname first) of the person playing black, or the name of the computer program playing black.

The Title for each player is the standard FIDE title abbreviations such as "FM", "IM", or "GM", or blank for an untitled player.

The Elo rating for each player is that player's rating, or blank if unknown or if the player does not have a rating.

The Country for each player is the name of the country being represented by the player, or blank if unknown or not applicable.

# Enter Move dialog box

The <u>Enter Move</u> dialog box allows a move to be typed in rather than performed with the mouse. Type in a <u>move</u> in any of the allowable <u>notations</u>.

The move does not need to be completely specified, as long as it is not ambiguous. For example, enter the starting square and the destination square as in "e2e4", or the piece and destination square as in "Pe4", or just the destination square "e4" if there is only one piece that can move there.

You can paste a move from the clipboard by pressing <Ctrl+Insert> or <Ctrl+V>.

Press the <Enter> key or click on the [OK] button to perform the move and close the dialog box.

Press the <Esc> key or click on the [Cancel] button to close the dialog box without performing the move.

# **Enter Position dialog box**

The <u>Enter Position</u> dialog box allows a board layout to be typed in rather than performed with the mouse. Type in the layout in <u>FEN format</u>.

You can paste data from the clipboard by pressing <Ctrl+Insert> or <Ctrl+V>.

Press the <Enter> key or click on the [OK] button to update the position and close the dialog box.

Press the <Esc> key or click on the [Cancel] button to close the dialog box without updating the position.

# **Promotion dialog box**

The Promotion dialog box is displayed when a Pawn advances to the opposite end of the <u>board</u>. It allows a <u>piece</u> to be selected to which the Pawn will be promoted: either a Queen, Rook, Knight or Bishop.

Use the <Tab> key to select the desired piece and then press the <Enter> key, or simply click on the desired piece with the mouse. This will close the dialog box and promote the pawn to the selected piece.

# **Options dialog box**

The <u>Options</u> dialog box contains dozens of settings to control the operation and presentation of the game.

There are seven pages of controls.

The <u>Strength page</u> sets the type, duration and scope of time limits and the playing ability of the computer.

The <u>Display page</u> sets the button bar, what status information is displayed, whether the taken pieces are displayed, and screen appearance.

The <u>Pieces page</u> sets the piece set to be used and how the pieces are displayed and moved.

The <u>Board page</u> sets the size, colour and texture of the board, and what hints are available about the current move and position.

The <u>Text page</u> sets the screen font, move notation and style, and colour and piece names and abbreviations such as for another language.

The <u>Audio page</u> sets the sound effects and spoken messages.

The <u>Print page</u> sets the fonts and styles for printing game listings and board layouts.

Select any page by clicking on it's tab at the top of the dialog box.

Press the <Enter> key or click on the [OK] button to accept the new settings and close the dialog box.

Press the <Esc> key or click on the [Cancel] button to close the dialog box without changing any settings.

Click on the [Defaults] button to set all the options on the current page back to their default values.

## **Options dialog box - Strength page**

The Strength page on the <u>Options dialog box</u> has controls for the type, duration and scope of time limits, and the playing strength of the computer.

The Time Limit Type buttons specify what kind of time limit is to be used in the game. Setting player game time enforces a maximum time for each player to play the whole game, regardless of the number of moves in it. Setting player turn time enforces a maximum time for each move. Setting moves per hour enforces a minimum rate of play. Setting computer to match user's time makes the computer take about the same average time as it's human opponent. Setting the sandclock timer enforces a maximum length of time that one player can take over the other, like a sandclock or hourglass which is inverted at each move.

The Time Limit Value input line allows values to be entered for game time limit (in minutes per player), turn time limit (in seconds per turn), playing rate (in turns per hour) and sandclock length (in seconds).

The User Limit Scope buttons specify how the time limits specified above are enforced on human opponents. The Computer Moves For User setting allows the computer to take over and move for the player when the player's time is up. The User Loses Game setting causes the user to lose the game if they exceed their time (just as the computer opponent does also).

The Playing Options group specifies other features to be enabled or disabled to change the chessplaying capabilities of the program. The Auto Clock Press check box specifies whether the clocks are automatically set to the next player after every turn, or whether players need to manually click on the clocks themselves after they have moved (as if they were pressing the buttons on a real chess clock). The Use Opening Book check box specifies whether the computer can make use of the library of opening moves, thereby speeding up determination of the best move in the early part of the game. The Allow Computer Think-ahead check box specifies whether the computer can think during a human opponent's time. The Freeze Covers Board check box specifies whether the board is to be covered when the game is <u>frozen</u>. The Auto-Freeze When Minimized check box specifies whether the game is frozen when the main window is minimized. The Always Promote to Queen check box specifies whether pawns are automatically promoted to Queens or whether the option is given to the user as to what piece is used. The Allow Computer Resignation check box specifies whether the computer opponent is allowed to resign when it is losing. The Allow Insufficient Forces Draw specifies whether a draw is automatically called when there are not enough pieces left on the board to force a result.

The Search Depth slider specifies how far ahead (number of moves, or ply) the computer searches when analysing moves. The higher the number the further ahead the computer looks therefore the stronger it plays, but the longer each move may take.

The [Novice], [Average] and [Expert] buttons set a combination of options on this page to predefined values suitable for beginners, intermediate and very good players respectively.

# **Options dialog box - Display page**

The Display page on the <u>Options dialog box</u> has controls for the button bar, what status information is displayed, whether the taken pieces are displayed, and screen appearance.

The Button Bar buttons specify whether the <u>Button Bar</u> is to be displayed, and where.

The Taken Pieces group contains check boxes which specify how the <u>taken pieces</u> are displayed. The Show Taken Pieces check box determines whether the taken pieces panel is displayed at all. The Sort Taken Pieces By Value check box determines whether the taken pieces are displayed in the order in which they were taken, or sorted by value.

The Board Edge group contains check boxes which specify what information is shown around the edge of the board. The Show Square Labels check box determines whether the rank and file letters and numbers are displayed around the board. The Show Player Names check box determines whether the colour and name of each player is displayed in the top and bottom edges of the board.

The Board Edge Size slider specifies the width in pixels of the edging around the board. Sizes less than 8 pixels will not display the file and rank letters and numbers.

The Status Panel group contains check boxes which specify what information the <u>status panel</u> displays. The Show Status Panel check box determines whether the status panel is displayed at all. The Show Analogue Clocks and Show Digital Clocks check boxes determine whether the clocks are displayed in analogue or digital format. The Show Comments check box determines whether any entered <u>Comments</u> are displayed. The Show Workings check box determines whether the computer's own analysis of the game is displayed. The Show Narration check box determines whether a description of each player's position, and a text version of the board layout, are displayed. The Show ECO Names check box determines whether the current game are displayed.

The Refresh Frequency slider specifies the length of time between each screen update. The higher the number the less often the computer Workings in the Status Panel are updated, but the more efficient the program is.

# **Options dialog box - Pieces page**

The Pieces page on the <u>Options dialog box</u> has controls for the piece set to be used and how the pieces are displayed and moved.

The Pieces buttons specify which set of pieces are to be used.

The Piece Display Options group contains check boxes which specify how the pieces are displayed. The Scale Pieces To Board Size check box specifies whether pieces are to be resized according to the size of the squares on the board. Note that the pieces are bitmaps, and may be slightly distorted if scaled. The Show Piece Captions check box determines whether the name and status of each piece is displayed when the pointer moves over it.

The Piece Moving Speed slider specifies the number of steps the pieces are to take in each move. The higher the number the slower the movement will be.

The Piece Moving Options group specifies how fast certain moves are made. The Open Files To End check box determines whether <u>saved games</u> are opened to the beginning of the game or played through to the last move. If files are opened to the end, the Fast File Open check box determines how quickly the moves are made. The Fast Move Undo check box determines how quickly multiple move undos are performed. The Fast Move Redo check box determines how quickly multiple move redos are performed. If the Fast File Open, Fast Move Undo or Fast Move Redo check boxes are not selected, then the speed by which moves are performed is determined by the Piece Moving Speed and Delay Between Moves sliders. The Drag Moves Pieces check box determines whether the whole piece moves with the pointer when it is being <u>dragged</u>. The Allow Two Click Moves check box determines whether moves can also be made by clicking on a piece and then on a square. The Enable Space Bar Moves check box determines whether moves can be made using the space bar and arrow keys on the keyboard.

The Delay Between Moves slider specifies the time delay between each move when multiple moves are played together such as when opening saved games and doing Undo All or Redo All. The higher the number the longer the delay between moves.

### **Options dialog box - Board page**

The Board page on the <u>Options dialog box</u> has controls for the size, colour and texture of the board, and which set of chess pieces are used.

The Board Hints group specifies what type of information is displayed on the board itself. The Show Attacks and Show Jeopardies check boxes determine whether threatened pieces are shown surrounded by a coloured border. The Show Piece Hints check box determines whether clicking on a piece with the right mouse button will show the squares to which that piece can move. The Show Square Hints check box determines whether clicking on a square with the left mouse button will show the pieces which threaten or can move to that square. The Show Move Marker check box determines whether an arrow is displayed after each move to show where the last piece moved.

The Board Square Size slider specifies the dimensions in pixels of each square on the board. The higher the number the larger the board.

The Board Texture buttons specify what texture the board is to have.

The Colours buttons display the <u>Colours dialog box</u> to set specific colours on the board. The [White Squares] button allows the colour of the white squares to be changed. The [Black Squares] button allows the colour of the black squares to be changed. The [Attacks] button allows the border colour of squares under attack to be changed. The [Jeopardies] button allows the border colour of squares in jeopardy to be changed.

The Attack/Jeopardy Border Size slider determines the thickness of the highlight border on squares under attack or in jeopardy. The higher the number the thicker the border will be.

### **Options dialog box - Text page**

The Text page on the <u>Options dialog box</u> has controls to set the screen font, move notation and style, and to change the short and long names for each colour and each piece.

The Screen Font group contain items which specify the type to be used on the main window. The list box determines what font is used. Press the down arrow button to the right of the list box to show other fonts that can be selected. The Fixed Width Font For Moves List check box determines whether a fixed width Courier font is used for the moves list (which makes the list align vertically) or whether the same font is used as for the rest of the screen (which left justifies the list).

The Notation buttons specify what <u>notation</u> is to be used to display and print moves. This does not restrict the type of notation that can be used to enter moves through the <u>Enter Move dialog box</u>.

The Text Type buttons specify whether the standard English names and abbreviations are to be used, or whether these can be substituted by customised names and abbreviations.

The Custom Text controls specify the colour and piece names that should be used. The first column specifies the one character abbreviation, and the second column specifies the full colour and piece names up to 24 characters in length.

Piece name abbreviations for the King, Queen, Rook, Bishop, Knight and Pawn in some common languages are as follows:

Czech	Κ	D	V	S	J	Ρ
Danish	Κ	D	Т	L	S	В
Dutch	Κ	D	Т	L	Ρ	0
English	Κ	Q	R	В	Ν	Ρ
Estonian	Κ	L	V	0	R	Ρ
Finnish	Κ	D	Т	L	R	Ρ
French	R	D	Т	F	С	Ρ
German	Κ	D	Т	L	S	В
Hungarian	Κ	V	В	F	Н	G
Icelandic	Κ	D	Н	В	R	Ρ
Italian	R	D	Т	А	С	Ρ
Norwegian	Κ	D	Т	L	S	В
Polish	Κ	Н	W	G	S	Ρ
Portuguese	R	D	Т	В	С	Ρ
Romanian	R	D	Т	Ν	С	Ρ
Spanish	R	D	Т	А	С	Ρ
Swedish	Κ	D	Т	L	S	В

# **Options dialog box - Audio page**

The Audio page on the <u>Options dialog box</u> has controls for the sound effects and speech functions of the program.

The Audio buttons specify whether sound effects and spoken messages are to be used in the game.

The White Voice and Black Voice buttons determine whether the spoken effects for each player are in a male or female voice.

## **Options dialog box - Print page**

The Print page on the <u>Options dialog box</u> has controls to set the fonts and styles for printing game listings and board layouts.

The Printer Font group contains items which specify the type to be used when printing game listings. The first list box determines what font is used. The second list box determines the size of the font. Press the down arrow button to the right of each list box to show other settings that can be selected. The Bold and Italic check boxes allow either or both of those characteristics to be selected. The Fixed Width Font For Moves List In Column Format check box determines whether the moves list is printed in rows in a proportional font, or aligned in columns in a fixed font.

The Figure Font group contains items which specify the symbols to be used when printing a picture of the current board position with game listings. The first list box determines what font is used. Press the down arrow button to the right of the list box to show other fonts that can be selected. The Figure Character Set input line contains the characters used by that font to display the chess pieces, squares and borders. There must be 22 characters in order representing the white king, white queen, white rook, white bishop, white knight, white pawn, black king, black queen, black rook, black bishop, black knight, black pawn, empty white square, empty black square, top left corner, top border, top right corner, left border, right border, bottom left corner, bottom border and bottom right corner.

The [Print Setup] button displays the <u>Print Setup dialog box</u> to allow the printer settings to be viewed and changed.

# Tip of the Day dialog box

The <u>Tip of the Day</u> dialog box displays a useful tip.

The Show Tips On Startup check box determines whether a tip is automatically displayed every time the program is run.

The Show Tip Types buttons determine whether the tips include information about playing chess in general, or the K-Chess Elite program in particular, or both.

Click on the [Prev Tip] and [Next Tip] buttons to cycle through the list of tips.

Press the <Enter> or <Esc> keys or click on the [OK] button to close the dialog box.

# About dialog box

The <u>About</u> dialog box shows various information about <u>K-Chess Elite</u>, including the program version, <u>copyright</u> and <u>license</u> details.

See <u>Upgrade Information</u> for details about the difference between this and other programs in the K-Chess range. See <u>Support</u> and <u>Warranty</u> information for details about user entitlements.

We welcome <u>feedback</u> about any and all of the features in this program.

Click on the [Register] button to order the full registered version of the program.

If you have already registered the program, click on the [<u>Unlock</u>] button to enter your Name, Serial Number and Unlock Code. This will remove the time limit and unlock all the features of the software.

Click on other parts of the dialog box for special effects .

Press the <Enter> or <Esc> keys or click on the [OK] button to close the dialog box.

# **K-Chess Web Site**

The K-Chess Web Site operation on the <u>Help pull down menu</u> opens your web browser to display the ARK ANGLES web site. From there the program can be ordered online, the latest version of K-Chess Elite can be downloaded, and details of the other products in the ARK ANGLES range can be obtained.

# **Credits and Copyright**

K-Chess Elite 16 and K-Chess Elite 32 were developed by Rob McDonell, ARK ANGLES.

Both programs and all accompanying documentation are Copyright @ 1992-1999 by Rob McDonell, ARK ANGLES. All Rights Reserved.

Thanks are given to the following people for their ideas and feedback: Ed Crosby, Gary Crow, Sam Cubero Jr, Steven J Edwards, Henk Hage, Kathy McDonell, Peter McKenzie, Michael McNeil, Stephen Newlyn, Paul Onstad, Tim Parish, Brian Rondel, Manfred Saliger, Michael Smith, Rohan Smyth, Pablo Urzúa, Kevin Zuvela.

Thanks to Joe Brooks for his work <u>"Good Chess Guidelines for Beginning & Amateur Players"</u>, included with this help file. Unfortunately we have been unable to trace Joe to personally express our appreciation for this useful tutorial.

Thanks to Armando Hernandez Marroquin for his excellent range of chess fonts, used by permission.

For further information or support please contact Rob McDonell, ARK ANGLES.

Note: K-Chess Elite is installed by K-Install for Windows installation and setup package. K-Install has many powerful features for software developers and electronic publishers, and is available as a separate product from ARK ANGLES. See the <u>ARK ANGLES Catalogue</u> for more information.

# **Installation Instructions**

KChess Elite must be installed onto a hard disk with at least 2.5MB of free space. See <u>System</u> <u>Requirements</u> for a complete list of hardware and software pre-requisites.

It may be advisable to close other applications or resident software such as anti-virus programs before commencing installation of K-Chess Elite.

#### Installation from Diskette

KChess Elite is supplied on high density 1.44MB 3.5" diskettes. To install the program from diskette:

- 1. Put the Installation Disk in drive A:.
- 2. Select the Run function from the Start button (in Windows 95/98/NT) or from the File menu in Program Manager (in Windows 3.1).
- 3. Enter "a:setup".
- 4. At the installation screen, press <Enter> to begin installation.
- 5. When requested, enter the drive and/or directory to install the program to, or just press <Enter> to accept the default.

#### Installation from the Internet

- 1. Download the latest version of the program from the <u>ARK ANGLES web site</u>. The software will come compressed into a single archive file. This will be in ZIP format for the 16 bit edition, and self extracting EXE format for the 32 bit edition.
- 2. For the 32 bit edition, run the downloaded EXE file, which will extract all the files automatically and run the setup program. For the 16 bit edition, decompress the downloaded ZIP file with any appropriate unarchiving program such as PKUNZIP, PowerZip or WinZip, then run the extracted setup program.

If there are any problems with running K-Chess or the setup program, see <u>Troubleshooting</u> for assistance. For common questions about the operation of the program after it is installed, see <u>Frequently Asked Questions</u> for some answers.

# **System Requirements**

<u>K-Chess Elite</u> comes in both 16 bit and 32 bit versions.

K-Chess Elite 16 requires a PC with 386 or higher processor, 4MB memory, 3MB free disk space, VGA graphics, and running Windows 3.1 or higher.

K-Chess Elite 32 requires a PC with 386 or higher processor, 8MB memory, 3MB free disk space, VGA graphics, and running Windows 95/98 or Windows NT.

The faster the processor, the better K-Chess will play within the same time limit.

Of the total hard disk space required, 800KB is for the chess fonts which will be put in the Windows Fonts directory on drive C:. The remainder of the space is for the application itself, which can be installed on drive C: or any other hard disk.

The textured backgrounds and some piece sets look best if the video card is set to 256 colours or higher.

A printer is required for printing game listings and board layouts.

A sound card is required for sound effects and voice feedback.

# Troubleshooting

#### **Problems running setup**

- \* Ensure you have at least 4MB memory and Windows 3.1 or higher.
- \* Some anti-virus programs (such as Mcafee Viruscan 3.0 for Windows 95) and other resident software may conflict with the <u>setup</u> program in some circumstances. If so, disable the resident software temporarily, run the K-Chess setup program again, then reload the resident software.

#### **Problems running K-Chess Elite**

- \* Ensure you have the minimum <u>system requirements</u>.
- \* Some other programs, particularly anti-virus programs, may also conflict with <u>K-Chess Elite</u> if they are running at the same time. This is due to K-Chess Elite's intensive use of the processor. If K-Chess Elite displays unusual symptoms (such as pieces unable to move to valid positions, a "check" message when the king is not being threatened, or pieces apparently changing colour) then try shutting down all other programs that may be running and then rerun K-Chess Elite. Also please contact <u>ARK ANGLES</u> with details of the problem.
- \* Some piece sets may not display correctly on certain colour settings on some video cards. For example, on some systems the 256 colour piece sets (Staunton 8 and Rounded 8) may not display correctly if the video card is set to 256 colours and the board is set to textured. To overcome this and similar problems, change the colour depth on your video card, or set the board texture option to None, or use an alternate piece set. Also please contact <u>ARK ANGLES</u> with details of the problem.

# **Frequently Asked Questions**

#### Q. How can I win again this program?

A. K-Chess Elite is a strong opponent, especially for beginners. You can give yourself the best chance of winning by going to the <u>Options dialog box</u>, clicking on the <u>Strength Page</u> and then on the [Novice] button. This still does not give you an easy win - that comes only from practice. However, see the <u>Information for Beginners</u> for ways to get additional assistance.

# Q. The program just moved a pawn illegally, and one of my own pawns just disappeared! Is this a bug?

A. This is probably the valid move called "en passant", which is explained in the <u>rules of chess</u>. Essentially, when a pawn advances two squares on it's first move, an enemy pawn is allowed to take it as if it had only moved one square. This means the enemy pawn will move diagonally onto the square behind where the first pawn moved to, and the first pawn will be removed from the board.

#### Q. The program made two moves in one go, the King and Rook jumping over each other. How do I do that?

A. This move is called "castling", and is explained in the <u>rules</u>. To castle, simple move the king from it's starting position two squares to the left or right, and the rook will automatically move over it. Using the keyboard, enter "g1" or "o-o" to castle on the king's side, or "c1" or "o-o-o" to castle on the queen's side.

#### Q. How do I maintain my child's interest in chess while they are learning how to play?

A. See the <u>Children and Chess</u> section for ideas and tips.

# **Upgrading from earlier versions**

This latest version 3.0 of K-Chess Elite has many enhancements over version 2.5, including

- \* tip of the day with choice of game tips and program tips
- \* partial ply search depth for novices
- \* move input in English Descriptive Notation
- \* move marker arrow to highlight last move made
- \* analyse mode to search for the best move without making it
- \* name and colour of each player in board edge
- \* informative narration and FEN layout for each board position
- \* ECO code and description in narration and information dialog
- \* layout can be entered in FEN during board setup mode
- \* resizable window with automatic square resizing when window is resized, maximised or restored
- \* status panel handles large or small fonts
- \* option for hundredths of a second on digital clocks
- \* fixed or variable font option in moves list
- \* 17 different figurine fonts to print board diagrams
- \* row or column option for printing moves listings
- \* fixed problem with text cutoff in some print drivers
- \* additional piece sets
- \* recent file opened history on Game menu
- \* additional buttons on button bar
- \* board labels shrink as edge gets smaller
- \* separate male/female voice for each player
- \* elapsed times and board rotation setting saved in KCH files
- \* program options can be saved in KCH files
- \* PGN tags Annotator and EventDate
- \* abort of file opening if PGN or KCH files contain invalid moves
- \* stored games directory and default file extension saved
- \* right click on en passant square highlights destination not piece
- \* two knights vs a knight or bishop not necessarily insufficient forces
- \* fixed problem with player times over 6.5 hours
- \* taken pieces aligned more efficiently
- \* game modified indicator in window title
- \* Home and End key shortcuts for Undo All and Redo All
- \* fixed piece display problems on some graphics cards, especially with screen reader software
- \* enhanced Help including FAQ and information for Children and Blind players
- \* faster installation program

Version 2.5 enhancements over version 2.0 included

- \* more piece sets and range of board sizes
- \* latest search information displayed after end of move
- \* status includes count of nodes searched and description of special moves
- \* arrow keys to undo/redo moves
- \* new option to move with space bar and arrow keys
- \* support for Kt abbreviation for Knights when entering moves
- \* cancel option during demo games
- \* drag game files to running program
- \* improved use of book, including fix for inappropriate use in setup games
- \* extensive glossary of chess terms
- \* updated installation program
- \* free bonus chess screen saver

Version 2.0 enhancements over version 1.x included

- \* set the initial state of the board for castling, en passant, move counts and status
- \* single click setting options to novice, average and expert levels
- \* new data fields for recording details about the game and players
- \* sandclock game timer option

- \* optional Standard Algebraic Notation and Computer Notation for moves
- \* improved handling of ambiguous moves
- \* no need to press Enter before entering moves by keyboard
- \* option to move by clicking on the piece then clicking on the destination
- \* customizable letters and names for colours and pieces
- \* single click grid to undo/redo multiple moves
- longer comments up to 32KB
- \* both male and female voices
- \* save and load games in international standard EPD, FEN and PGN formats
- \* copy and paste whole game to and from the clipboard (uses PGN)
- \* start a variation game on another board with the same position
- \* option to always promote to Queen
- \* offer a draw against the computer
- \* optional automatic recognition of minor piece draws
- \* load saved games by a parameter running K-Chess from the command line
- \* printing includes game and player information, and board layout at current position
- \* expanded help

K-Chess Elite 1.x additional features over K-Chess for Windows 2.x included

- \* new Windows 95 look and feel
- \* optional button bar for one click access to common functions
- \* display of taken pieces sorted by value or order taken
- \* hide or show status panel with enhanced information display
- \* variable speed moving pieces
- \* adjust speed of file open, undo and redo functions
- \* sound effects and spoken messages
- \* multiple sets of pieces
- \* easy customisation of colours
- \* textured, resizable board
- board rotation
- print board layout
- \* enhanced print moves with selectable font and size
- \* enhanced attack/jeopardy highlighting
- \* more time limit options
- \* manual or automatic clock setting
- \* analogue or digital clocks
- setup board using drag and drop
- \* adjustable playing strength by changing search depth
- \* add comments to any point in a game
- \* quick hint function to suggest a move
- \* replay last move
- \* undo all and redo all functions
- \* double click on move listing to undo or redo to that move
- \* allows optional resignations by either player
- \* recognises two Kings draws
- \* more sample games complete with comments
- \* games saved in new text format for use outside of K-Chess
- \* reads all earlier K-Chess and Turbo Chess files
- \* enhanced help with rules and guidelines for beginners
- \* full keyword search in help
- \* window maximisation

#### plus more.

K-Chess Elite 2.5 can be installed in the same directory as any other version of K-Chess, or it can be installed in a new directory. If installed in the same directory, it will replace any older version of K-Chess Elite.

# **Registering K-Chess Elite**

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#### U. K.

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# **Glossary of Chess Terms**

Accept	To take an offered piece, as in the King's Gambit Accepted opening 1. e4 e5 2. f4 exf4. See also "Decline".
Active	An aggressive move, line of play, or position. When mentioned in regards to a playing style, it indicates sharp or tactical tendencies.
Active defense	The use of attack as a defense, rather than passively trying to cover weaknesses.
Active piece	A developed piece that is actively participating in the conduct of the game. Active pieces form the basis of any attack.
Advantage	Where the current position of the game favours one side over another. A material advantage refers to having a higher point count than the opponent. A permanent advantage is one with a lasting effect, such as an advantage in material or superior pawn structure. A positional advantage is an advantage in time, space, mobility, pawn structure, or control of critical squares. A temporary advantage is one that may eventually disappear, such as a lead in development.
Alertness	The ability to take advantage of the opponent's inaccuracies while playing accurately yourself.
Algebraic notation	The modern and most popular way of recording chess moves, using single letter piece identifiers and unique alphabetic file and numeric rank identifiers.
AlphaBeta pruning	A technique used by computer programmers to cut down on the number of possible moves a computer has to evaluate before choosing the best move.
Analysis	Calculation of possible moves and variations for a position.
Annotation	Written comments about a game or position. May include variations from the main line of play.
Artificial castling	To exchange the positions of the king and rook other than by castling. Also known as "Castling by hand".
Artificial manoeuvre	Trying a bit too hard, or making an odd use of pieces.
Attack	1. An aggressive move or series of moves in a certain area of the board.
	2. Threatening the capture of a piece or pawn or an empty square.
Back rank	The first rank on the board for each player. It can become weak late in the game if the rooks don't cover it enough.
Backward pawn	<ol> <li>A pawn at the base of a pawn chain that can't move forward due to one or more enemy pawns on the adjacent files.</li> </ol>
	2. A pawn which stands on an open file and cannot be protected by any other pawn.
Bad bishop	A bishop whose movement is restricted by friendly pawns on its colour squares. These friendly pawns are in turn restricted by enemy pawns or pieces, thereby being unable to vacate squares for the bishop.
Base of pawn chain	The very last pawn in a diagonal chain. It is the weakest point due to it not being supported by another pawn.
Battery	A lineup of pieces that move similarly on a single file or diagonal, usually pointing toward a critical point in the enemy's camp. Batteries can be created by Queen and Rooks on a file or rank, and Queen and Bishops on a diagonal.
Berserker	A rash playing style characterized by frenzied attacking with one or two pieces, perhaps with little regard for strategy or danger.
Bind	Where a player is so tied up he has trouble finding useful moves. See "Squeeze".
Bishop pair	Two bishops against a bishop and knight or two knights. Two bishops are effective together because they control diagonals of both colours, and work very well in open positions. See "Opposite colour bishops".

Blockade	Immobilization of an enemy pawn by placing a piece (preferably a knight) on the square directly in front of it.
Blockading square	The square directly in front of an isolated or backward pawn. This square can also serve as an outpost square, as an occupying piece cannot be chased away by pawns.
Blunder	A horrible mistake where material is lost, serious tactical or positional concessions are made, or the game is lost.
Book	1. Published opening theory.
	2. The library of opening moves maintained by a computer chess playing program.
Book Player	A person who memorizes opening theory. Taking someone "out of book" refers to avoiding theory and playing a new or unorthodox move, which may confuse a book player.
Break	A pawn move that proposes a pawn trade in order to increase space or relieve a cramped position.
Breakthrough	Penetrating the enemy's position, whether by a pawn break or the sacrifice of pieces or pawns.
Brilliancy	A game containing a very deep strategic idea, a beautiful combination, or an original idea or plan.
Broad pawn centre	Three or four centre pawns abreast, which indicate very aggressive intentions. The opponent of such a "big centre" must look to restrain it and break it up.
Buried piece	A piece hemmed in by friendly pieces and pawns. Such a piece will have a difficult time actively participating, and may also interfere with the development of other pieces.
Calculation	The working out of variations mentally, without moving the pieces.
Candidate move	A move considered as a starting point in the analysis of variations.
Capped pawn	A marked pawn with which a player engages to deliver checkmate, in giving extreme odds to a weaker opponent.
Capture	Moving a piece to a square occupied by an enemy piece, thereby removing the enemy piece from the board, out of play. Once a piece is captured, it may never return to the game.
Castle	1. The act of moving the king and rook simultaneously. This is the only time in the game where two pieces can be moved in the same turn. Castling consists of moving the king two squares either right or left, and placing the rook on the square beside the king closest to the centre. There must be no pieces between king and rook, neither piece may have already moved, and the King may not move out of Check, over it, or into it. Castling is usually worthwhile because it moves the King to a safer position in the wings behind pawns, and the rook to a more powerful position in the centre of the board at the same time.
	2. Unsophisticated term for Rook.
Castle long	Queenside castling.
Castle short	Kingside castling.
Centralisation	To move pieces towards the centre. This can be useful if there is no obvious alternative plan.
Centre	The four centre squares e4, d4, e5 and d5. The area bounded by c3, c6, f3 and f6 is also considered central. The d and e files are the centre files. The centre of the board is of great strategic significance, as pieces placed there generally have the greatest scope.
Centre break	The attack on two or more pawns abreast on the 4th rank by an opposing pawn in order to break up their formation.
Centre fork trick	A series of moves where a knight is sacrificed for a centre pawn, knowing that

	it can be recovered by a pawn fork and the enemy's central pawn structure will be destroyed by doing so.			
Centre pawns	The king's and queen's pawns.			
Centralize	Placing of pieces and pawns so they both control the centre, and influence other areas of the board. Pieces usually have maximum mobility (and therefore power) when centrally placed.			
Check	The act of attacking the opponent's king. When check takes place, a player usually calls out "check" so the opponent is aware of the threat. The opponent must get out of check on the next move, either by moving the King, capturing the attacking piece, or moving another piece between the King and the attacking piece.			
Checkmate	Threatening the capture of the enemy king such that it cannot escape. This wins the game for the attacking side.			
Chessmen	Pieces.			
Classical	1. A playing style based on the formation of a full pawn centre. The strategic concepts involved are seen as ultimate laws, and therefore rather dogmatic.			
	<ol><li>An era where all players used this style and those that did not were considered irregular.</li></ol>			
Clearance	A move that clears a square for use by a different piece. The new piece can use the square to better advantage. A "clearance sacrifice" is where the vacating piece is sacrificed to make room.			
Closed game	A position where the pawn structure is fixed, the centre cluttered with interlocked pawns. Knights thrive in such positions, and play is generally focussed on the flanks.			
Combination	A sacrifice and forced sequence of moves to gain a certain advantage.			
Compensation	An equivalent advantage that offsets an advantage of the enemy's, for example material vs. development, space vs. superior minor piece, or three pawns vs. knight.			
Connected passed pawns Two or more samecolour passed pawns on adjacent files. See "Passed pawn".				
Connected rooks	When the two rooks are on the same rank or file, with no pieces or pawns between them. Rooks are very strong when they are connected, as they support each other.			
Consolidate	Taking care of your position before continuing active operations. This could mean adding protection to critical pawns or squares, improving the placement of pieces, or making the king safer.			
Control	The domination or sole use of a square, group of squares, file ordiagonal. One is also "in control" when one has the initiative.			
Coordinates	Unique square identifiers, made up of a number indicating rank and a letter indicating file.			
Counterplay	Aggressive actions by the defender. Counterplay may equalize the chances, may be not quite enough to equalize, or may seize the initiative and gain an advantage.			
Counter attack	The launch of an attack by the defender, rather than making more defensive moves. Designed to place the opponent on the defensive.			
Counter threat	See "Counter attack".			
Cramped	Disadvantaged in space, leading to a reduction in mobility of one's pieces.			
Cross-check	A check in reply to a check. Typical of queen endings.			
Critical position	A point where the evaluation of the position will obviously favour one side, or where it will equalize. The position is delicately balanced and the slightest mistake could be disastrous.			
Decisive	A move which alters or makes certain the result of a game. A decisive move			
	may make an advantageous position a winning one. A decisive error may lose the advantage or the game.			
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Decoy	1. The offering of material in order to get an enemy piece to move.			
	2. The lure of an opponent's piece to a square that is particularly vulnerable.			
Defense	<ol> <li>Any move or plan that is intended to meet or stop an enemy's threats or attack.</li> </ol>			
	2. Name used for openings initiated by black, such as Petroff Defense, French Defense. etc. These systems are called defenses due to black having the second move, and being forced to respond to white's first move.			
Deflection	A tactic which forces an opponent piece from a square where it had to be, either because it was defending a piece or square or because it was blocking a threat.			
Destructive sacrifice	Sacrificing material to destroy the pawn cover or other protection around the enemy king. Usually a point of no return.			
Development	The moving of pieces from their starting positions to new positions where their mobility and activity are increased. To bring pieces into play.			
Diagonal	A diagonal row of squares. Diagonals are named by the coordinates of their starting and ending squares.			
Discovered attack	The creation of an attack from one piece caused by the moving away of another piece that was masking it. These are potent moves, as they may enable a piece to move away from a threat in safety, or enables two attacks to be launched simultaneously.			
Discovered check	Check given by one piece as the result of the moving away of another piece that was masking it.			
Dislodging manoeuvre	A move to upset a defensive formation.			
Distance	The number of squares between two pieces. This is a crucial calculation in endgames to determine whether a king can stop a hostile passed pawn.			
Double attack	The launch of two threats simultaneously. It is different from a fork in that either or both threats need not be a capture.			
Double check	A simultaneous check given by moving one piece to give check, thereby also unmasking another piece which also gives check.			
Doubled pawns	Two pawns of the same colour on the same file, put there by a capture. These pawns are generally considered to be weak, but they can control valuable squares and create open or halfopen files.			
Draw	A game that ends in a tie, where each player is awarded half a point. A draw occurs when 1) there's not enough material to force mate; 2) there is a stalemate; 3) a 3time repetition of position has been reached, or 4) there is mutual agreement (see "Draw offer").			
Draw offer	The suggestion by one player to the other that they agree to call the game a draw. When playing manually, the correct way to make a draw offer is to make your move, say clearly "Draw?", and then start your opponent's clock. Never make a draw offer when it's your opponent's turn to move.			
Dynamic	Dynamics are represented by the aggressive potential in a move or position.			
Dynamic play	Dynamic play occurs as a result of frequent structural changes that demand constant reevaluation of one's strategy. These changes are usually as a result of tactical threats or significant changes in the pawn structure.			
Echos	Two functionally identical positions on the same board, one the mirror image of the other, due to the arrangement of the defender's pieces being effectively symmetrical. This allows the same attack to be made down either side of the board.			
Elo rating	An internationally accepted mathematical system for ranking chess players, created by Arpad Elo. International Grandmasters are typically in the range 2500 to 2700, world champions often over 2700. The standard deviation is			

	200 points. The scale is such that a player at 1800 would be expected to beat one at 1600 by the same margin as a player at 2600 against one at 2400. Many games must be played before an Elo rating can be estimated with confidence. The Elo rating is the foundation for the award of FIDE titles.
Endgame	The final phase of the game when there are few pieces left on the board. The endgame generally starts after queens have been exchanged or when the immediate goal is to promote a pawn.
En passant	French "in passing." It occurs when a pawn moves two squares from its starting position, and passes an enemy pawn that has advanced to its fifth rank. The advanced pawn on the fifth rank may choose to capture the pawn as if the pawn had only moved forward one square. This capture must be made immediately after the two square advance, or else the right to capture "en passant" is lost. In chess notation an en passant capture is labelled "e.p."
En prise	French "in take" A piece or pawn that is unprotected and exposed to capture.
Equality	Where neither player has a discernible advantage over the opponent.
Exchange	A trade of pieces. Trading a minor piece for the opponent's rook is called "winning the exchange". Trading a rook for the opponent's minor piece is called "losing the exchange". See "Point count".
Exchange sacrifice	Where a player willfully trades a rook for a minor piece in return for compensation of some kind. See "Compensation".
Expansion	Increasing the amount of space directly under your control. To expand, push pawns forward in an attempt to increase the boundaries of your territory.
Fianchetto	Italian "on the flank". The development of a bishop to b2 or g2 (b7 or g7 for Black).
FIDE	Federation Internationale des Echecs, the world governing body for chess. Founded in 1924, it organizes world championship competitions, draws up rules of the game, and awards the international titles to top players.
Fifty move rule	A game can be drawn when fifty moves have been made by each player without a capture or pawn advancement.
File	A row of eight squares from one end of the chessboard to the other. In Algebraic Notation these are labelled a to h, starting from the queenside of the board.
Fixed centre	Where the centre of the board is occupied by multiple pawns and some of them are fixed in place by opposing pawns. In some cases, pawn movement is possible but the advancing pawns will be subject to capture.
Fixed pawn structure	Pawn setups where there is little or no possible mobility. Since there will be little pawn play, strategies are easier to determine.
Flank	The files that do not belong to the centre, that is the a, b and c files on the queenside, and the f, g and h files on the kingside. Certain openings that focus on flank development are called "flank openings." Typical first moves for these openings are 1.c4; 1.b3; 1.Nf3; etc.
Flank attack	Attacking on either the kingside or queenside. Such attacks are much more successful when the centre is closed.
Fluid pawn structure	Structures where future pawn movement is likely. Strategy may be difficult to determine, as a change in the pawn structure necessitates a change in strategy.
Focal point	A weak square near the enemy king. This is targeted by the attacker, and the defender may find it difficult to protect. More than one focal point makes an attack stronger.
Fool's mate	Checkmate in the manner of 1. f3 e3 2. g4 Qh4*
Force	Your army. All pawns and pieces are units of force.
Forced	A move or series of moves that must be played to avoid loss of the game or catastrophic loss of material.

Forcing move	A move which leads the opponent into a forced move or moves.
Forepost	An advanced square which cannot be attacked by a hostile piece of inferior rank. Foreposts are ideal squares for attacking knights as they have a short range. An absolute forepost is where the position is unassailable. A contingent forepost can only be attacked at the cost of creating a weakness elsewhere.
Fork	A form of double attack where one piece threatens two enemy pieces at the same time. In a triple fork, three enemy pieces are threatened.
Fortress	A defensive blockade to keep out the enemy forces, especially the king.
Forward Pawn	A pawn that is at the very front of a pawn chain. It is the only pawn contained in the chain that does not protect another pawn.
Frontal assault	A direct attack on an enemy pawn that is located on the same halfopen file as your heavy pieces.
Gambit	Italian "a trip up". Where the first player voluntarily sacrifices a pawn or piece in the opening for positional or developmental advantage. A counter-gambit is where the second player makes a similar sacrifice for similar aims.
General principles	Basic rules that serve as guidelines for less advanced players. Basic rules don't apply to all situations, and more experienced players learn when to apply them in each specific position.
Ghosts	Threats created in the mind of inexperienced players due to lack of confidence or fear of their opponent.
Good bishop	1. A bishop not hindered by friendly pawns on the same colour squares.
	2. A bishop with adequate scope.
Grab	Capture a piece, perhaps making a positional concession in the process.
Grandmaster	The highest title (apart from World Champion) that a chess player can achieve. It is bestowed by FIDE upon players who have achieved certain performance norms. Abbreviation GM. Other titles (in order of importance) are International Master and FIDE Master.
Grandmaster draw	A quick, uninteresting draw.
Halfopen file	A file with pawns of only one colour on it. This file is closed to the pawn owner, and open to the other player.
Hanging	A pawn or piece subject to immediate capture. Also "En prise".
Heavy pieces	Rooks and queens, also known as "major pieces" or "heavy artillery."
Hold	To hang on, to allow a successful defense.
Hole	A square that is undefendable by pawns. Such a square serves as an excellent home for enemy pieces, especially the knight.
Illegal move	A move made contrary to the rules of chess.
Imbalance	A noticeable difference between the white and black armies. This may include material advantage, superior pawn structure, space, development, the initiative, or a superior minor piece.
Impossible move	A move which has obvious unfavourable results, and so is to be avoided.
Inactive piece	A piece not directly involved in the flow of the game.
Initiative	The player that is on the attack, or otherwise applying pressure to the opponent on the defensive, is said to "have the initiative."
Innovation	A novel move or idea in an established line of play.
Insufficient material	When neither player has enough pieces to mate their opponent. A draw is declared.
Interference move	A move which obstructs the line of attack of an enemy piece.
International master	The next highest title below Grandmaster. Abbreviation IM.
Interpose	Placement of a piece between an attacking enemy queen, rook or bishop, and the piece being attacked.

Intuition	A ability of an experienced player to decide on a move or plan by feel, rather than by extensive analysis.
Isolated pawn	A pawn with no friendly pawns on the adjacent files. It cannot be protected by pawns, and the square directly in front of it can be a safe haven for enemy pieces as they cannot be threatened by pawns.
J'Adoube	French "I adjust". Expression used prior to a piece being adjusted on its square.
Kingside	The half of the board from which the king starts. The e, f, g and h files.
Knight on the rim	A knight on the edge of the board. Unless it is performing a specific duty, its future is said to be "dim," as it attacks very few squares, none in the centre. It may even become trapped on the edge.
Liquidation	1. A series of exchanges that are done to slow or halt the enemy's attack.
	2. To trade off in order to enter a drawn or won endgame.
Locked centre	Similar to a fixed centre except that no pawn movement is possible.
Luft	German "air." Moving a pawn so the king has an escape square to prevent backrank mates.
Main line	The principal variation used or analysed.
Major piece	A rook or queen.
Manoeuver	A series of quiet moves designed to redeploy your pieces more favorably.
Master	A player whose Elo rating is 2200 or higher. If the player's rating drops below 2200 the title is revoked.
Mate	See "Checkmate".
Material	Your pieces and pawns (excluding the king). See "Force".
Mating attack	An attack against the enemy king that leads to possible checkmate, or where mate can be averted by the enemy sacrificing material. Either way, a winning advantage is obtained by the attacker.
Mating net	A mating attack that leads to mate with correct play, no matter what the enemy does. A forced mating attack.
Middlegame	The phase of the game between the opening and endgame. The middlegame generally commences after development has been completed by both sides.
Minor piece	A bishop or knight.
Minority attack	An attack on a pawn majority by a pawn minority. This usually occurs on the queenside. The idea is to force a pawn trade that creates a pawn weakness in the enemy pawn structure.
Mobility	How much freedom of movement the pieces have. A piece's value is increased when it has more mobility, as it has more attacking power. See "Scope".
Notation	A system of symbols and coordinates for recording the moves of a game. See "Algebraic notation".
Occupation	1. Placement of a rook or queen on a rank or file, or a bishop or queen on a diagonal, to exert control over it.
	2. Placement of a piece safely on a square to exert pressure from it.
Open	1. A type of position (see "Open Game") or file (see "Open File").
	2. A type of tournament in which any class of player can participate.
Open file	A file where no pawns are present. Rooks are at their strongest when placed on open files.
Open game	A position where there are few centre pawns, and many open attacking lines. A lead in development is crucial to exploiting an open position.
Opening	The beginning phase of a game, usually the first 10-15 moves. It is characterized by rapid development of forces, control and/or occupation of the centre, and getting the king to safety. The real purpose of the opening is to

	create an imbalance in the enemy's camp, and development of pieces to exploit this imbalance.
Openings	A specific sequence of moves which have been catalogued over time. Specific openings are often played because players have analysed them thoroughly and believe they are the best way to achieve the initiative. There are over 1000 openings and many, many more variations. Most are named after the player, region or type of moves that are played, such as the Alekhine Defense, King's Gambit and Sicilian Defense.
Opening book	See "Book".
Opening library	See "Book".
Opening repertoire	A set of openings that a player prepares in advance to get to a preferred middlegame position.
Opposite colour bishops	Where each side has only one bishop that travels on squares of a different colour from that of the enemy. This can be effective during an attacking middlegame, as the defending bishop cannot control the squares the attacking bishop travels on. In an endgame, opposite colour bishops generally signal a draw, as the defender can put his king and pawns on the opposite colour of the attacker's bishop.
Opposition	An endgame term meaning the king not forced to move. Where the two kings stand on the same file or diagonal with an odd number of squares between them, the player that doesn't have to move is said to "have the opposition." This is important in king and pawn endings as the player who can secure the opposition can effectively guard certain spaces or drive the opposing king back.
Orientation	The way the board is positioned. The correct way has each player with a white square in their right hand corner.
Outflanking	A maneuver in the endgame with kings where one makes forward progress up the board while: 1) not allowing the opponent to gain the opposition, or 2) temporarily giving up the opposition in order to achieve a certain goal.
Outpost	A safe square near or in enemy territory that is protected by friendly pawns or pieces, and subject to effective occupation by one of your pieces.
Outside passed pawn	A passed pawn on the flank which is far from all the other pawns on the board.
Overextended	The position after a failed offensive or advance, in which a player's position is left with various weaknesses and no compensation for them.
Overprotection	Defending a strong point more times than appears necessary. The idea is that the overprotected pawn or square may be causing considerable problems for the opponent, who would be unwise to try to break the strong point, because he would release the latent power of the protecting pieces. See also "Prophylaxis".
Overworked piece	A piece which is required to do too much, defending too many pieces or squares at once. These pieces are open to attack, because moving them leads to a number of weaknesses being exposed.
Passed pawn	A pawn that has advanced past any enemy pawn that could hinder or capture it. Passed pawns are what are needed to promote.
Passive	An inactive move or plan that doesn't fight for the initiative. A passive position has no hope of counterplay or active possibilities. A passive player favours defense rather than attack.
Pawn centre	Pawns based in the centre of the board, primarily on d4, e4, d5 or e5.
Pawn chain	Two or more similarlycoloured pawns linked on a diagonal. The weakest point of such a chain is its base, as that pawn cannot be defended by another pawn.
Pawn contact	Opposing pawns are "in contact" when they are able to capture each other. Capturing resolves the tension in the position; maintaining contact maintains the tension.
Pawn duo	Two pawns of the same colour that are side by side and touching each other.

Pawn island	A group of pawns of the same colour separated from the next pawn by at least one open file. More islands indicates a weaker pawn structure.
Pawn storm	Advancing one or more pawns towards the enemy king with the intent of ripping up his pawn cover. Often used when both players have castled to opposite sides.
Pawn structure	The position of all the pawns.
Petite combination	A combination involving only a few moves and often only one tactical theme.
Perpetual check	Unremitting attack on a king, without checkmate. Under some rules this may result in a draw.
Piece	Sometimes used in a particular sense to refer to any piece other than a pawn.
Pin	At attack by a queen, rook or bishop on a piece which cannot move without exposing a more important piece or square. The pinned piece is said to be masking or screening the more important piece or square. An absolute pin is where the screened piece is a king, therefore it is illegal for the pinned piece to move as it would expose the king to check. A relative pin is where moving the pinned piece would result in a loss of material or other unfavourable effects.
Pinned piece	The piece under attack which cannot or should not be moved because of a pin.
Pinning piece	The attacking piece in a pin.
Plan	A short or long term goal which a player bases his moves on. The goal may be to attack a weak spot in the camp or to checkmate the opponent. Formation of a solid plan is vital in a game of chess.
Point count	A way of determining the worth of the pieces by assigning them a numerical value. Typically the queen is worth 9 points, rooks 5 points, bishops 3 or 3.25 points (depending on who you talk to), knights 3 points and pawns 1 point. A higher point count denotes material superiority.
Poisoned pawn	A pawn that, if captured, would cause serious disadvantage to the capturing side.
Position	The arrangement of the pieces on the board at any given moment.
Positional	A move, series of moves, plan, or playing style concerned with exploiting small advantages.
Positional mistake	A mistake with no immediate tactical repercussions, but will lead to a disadvantage by surrendering control of critical squares, losing time or space, or creating a structural weakness.
Positional sacrifice	A sacrifice that has no immediate tactical results, but will lead to a positional advantage.
Premature	A hasty move or series of moves or plan, or to act without enough preparation.
Prepared variation	A very well researched opening variation, often strengthened by new moves. It is common for grandmasters to prepare certain opening lines before playing.
Problem child	A blocked in queen bishop.
Prophylaxis	A strategy explored by Nimzovich, where you prevent your opponent from taking action in a certain area for fear of reprisal. Overprotection is a form of prophylaxis.
Promotion	When a pawn reaches the final rank, it can be turned into another piece (except a pawn or king), usually a queen. Also known as "Queening". See also "Underpromotion".
Protected passed pawn	A passed pawn that is protected by another friendly pawn.
Queening	See "Promotion".
Queenside	The half of the board from which the queen starts. The a, b, c and d files.

Quiet move	A move that neither captures anything, checks, or directly attacks an enemy piece.
Rank	A row of eight squares across the chessboard. In Algebraic Notation these are labelled 1 to 8, starting with the rank at White's end of the board.
Rating	A measure of a player's skill, calculated as a number using a generally accepted formula by an official organization. See "Elo rating".
Redeploy	To maneuver a piece onto a more effective square, file or diagonal.
Refutation	A move or series of moves that demonstrates a flaw in a game, move, plan, variation, or analysis.
Resign	When a player sees his position is hopeless, and ends the game before checkmate.
Restrain	Controlling the enemy pieces in order to keep them from becoming active.
Risk	A move or series of moves designed to gain an advantage but which has a chance of causing a disadvantage.
Romantic	An era when all players attacked and sacrificed. If a sacrifice was offered, it was considered cowardly not to take it. A romantic player is one who enjoys attacking and sacrificing.
Rook lift	Moving a rook off the bank rank, and up a few squares, in order to slide it to a new file so it can help in the attack without being blocked by its own pawns.
Royal fork	A fork between king and queen.
Running	Rapidly transferring the king from one sector of the board to another in order to evade attack.
Sacrifice	Voluntarily offering material in exchange for a perceived favourable advantage other than the material.
Sans voir	French "without seeing". Playing chess blindfolded.
Scholar's mate	Checkmate in the manner of 1. e4 e5 2. Bc4 Bc5 3. Qh5 Nf6 4. Qxf7*
Scope	The number of squares to which a piece can move. See "Mobility".
Screened piece	The piece which is guarded from attack in a pin.
Sector	One of three areas of the board, being the queenside, the centre, and the kingside.
Semiopen game	A position that contains some open and closed qualities.
Sharp	Bold, aggressive moves or positions. A sharp player is a player who revels in dynamic, tactical situations.
Shot	A strong move that was not expected.
Simplify	Exchanging pieces in order to reach a winning endgame, neutralize your enemy's attack, or clarify the position.
Simultaneous play	A player contesting a number of games against a number of players at the same time.
Skewer	A tactic where an enemy piece is attacked and forced to move, exposing another enemy piece behind it to capture.
Smothered mate	Checkmate by a knight, all squares adjacent to the king being blocked by its own pieces.
Sound	A safe, solid position, or a correct plan or move.
Space	The amount of area of the chess board controlled by each side.
Space count	A method of counting the squares controlled or attacked by each side's pieces (A square can be attacked more than once.) The player ahead in the space count has a spatial advantage, and thus more mobility.
Speculative	A risky or unclear move or plan.
Squeeze	Exploiting a bind by the gradual buildup of pressure upon the enemy's

	position. This is done by creating more new threats until your opponent cannot meet them all.
Stalemate	A position is which the player who's turn it is to move has no legal move but is not in check. A drawn game.
Strategy	The formation and execution of an overall plan.
Study	A make believe position that highlights tactical themes.
Style	Preferring certain type of positions and moves. Typically opponents will have different styles (such as preferring open or closed types of positions), so both fight to determine the type of position that is reached.
Support point	A square that serves as a home for a pieces, usually a knight, because they can't be driven away from it by a pawn.
Swindle	A trick pulled from an inferior position.
Symmetry	Where both armies, or both sets of pawns, are identically placed on their respective sides of the board.
Tactics	Traps, threats, and plans based on the calculation of combinations or variations. A position where many combinational ideas are present is a tactical position.
Tempo	A unit of time represented by a move. For example, forcing the opponent to move a piece twice in the opening can gain a tempo. Plural is "tempi".
Tension	A position where pieces and/or pawns face off against each other without capturing. Such positions require precise calculation, and nerves of steel.
Territory	See "Space".
Theory	Known and played variations and positions in any phase of the game. Opening theory is also known as the "book."
Threat	A move or plan, that, if allowed, leads to immediate reduction of the enemy's position.
Three repeats rule	A game can be drawn when the same board layout occurs three times during a game.
Time	1. The period allotted for playing the game. See "Time control".
	2. Whether a particular action can be stopped ("He doesn't have time to create a defense against this attack.").
	3. A measure of development. A development advantage is an advantage in time.
	4. The rate at which an attack can be prosecuted or defended.
Time control	Used to limit the length of a game. It is the time allotted to reach a certain number of moves. Most GM games are 40 moves in 2 hours, in which case a player forfeits the game if they have not played 40 moves in the first two hours.
Time pressure	When one or both players has used most of their allotted time, and must make moves with little or no thinking. This should be avoided if possible, as it often leads to mistakes or game losing blunders.
Transition	Changing from one phase of the game into another; i.e. from the opening into the middlegame, or the middlegame into the endgame.
Transposition	Reaching an identical position from a different sequence of moves.
Trap	A hidden method of luring the opponent into making an error. The lure or bait must be just enough to entice, without making the opponent suspicious - pawns are usually used. Traps should only be laid if they fit into an overall strategy, so even if the trap fails your position is improved or at least maintained. Always assume an opponent will see the trap: simply playing for traps is bad strategy.
Unclear	An uncertain situation in which is it not apparent whether either side has an advantage.

Underpromotion	Promotion of a pawn to anything other than a queen.
Variation	1. A line of play that is an alternative to the moves actually played.
	2. One possible line of play calculated by a player prior to making a move.
Value	The worth of a piece. Static value is the nominal value of a piece (see "Point count"). Dynamic value is the value of a piece in its current position, accounting for such factors as mobility, attacking strength, defending ability etc.
Valve	A move which simultaneously opens one line of play while closing another.
Weakness	A pawn or square that is difficult to defend.
Weak square	See "Hole".
Wild	Extremely unclear position or move, with almost unfathomable complications.
Zeitnot	German "time trouble".
Zugzwang	German "forced to move". A position where a player would prefer to pass his move (but of course cannot, as it is illegal) as any move damages his game.
Zwischenzug	German "inbetween move". An unexpected move tossed into an expected series of moves.