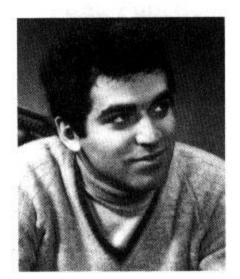
//// Saitek





**POCKET CHESS** 



GARRY KASPAROV WORLD CHESS CHAMPION

Dear Fellow Chess Player,

When computers were first invented just over four decades ago, few people realized that mankind was witness to the single most important development of our time. Today computers have become freely available, and in a few years there will be a computer in almost every household.

Saitek has asked me to write a few words to welcome you to the world of chess playing computers. I have been personally associated with the company since 1983 and can therefore speak about its products from experience.

Until recently chess computers were regarded as simple toys which would never be capable of providing serious opposition for the enthusiast. The rapid advance of technology and programming skills have certainly changed that. Today chess computers have become an accepted part of the chess world, serving not only to introduce new players to the world's finest game, but also encouraging them to take part in tournaments against human opponents. Chess computers can teach you all the basics of the game and keep up with you even if you go on to become a top club player.

Saitek has been at the forefront of this development and has been responsible for many of the most interesting innovations. It is the only chess computer company under Swiss management, and I look forward to a long and productive relationship with Saitek and with you who have chosen their computers.

I wish you enjoyment and satisfaction from your Kasparov chess computer - and who knows, maybe we'll meet in combat across the chessboard in the future!

Good luck!

Garry Kasparov

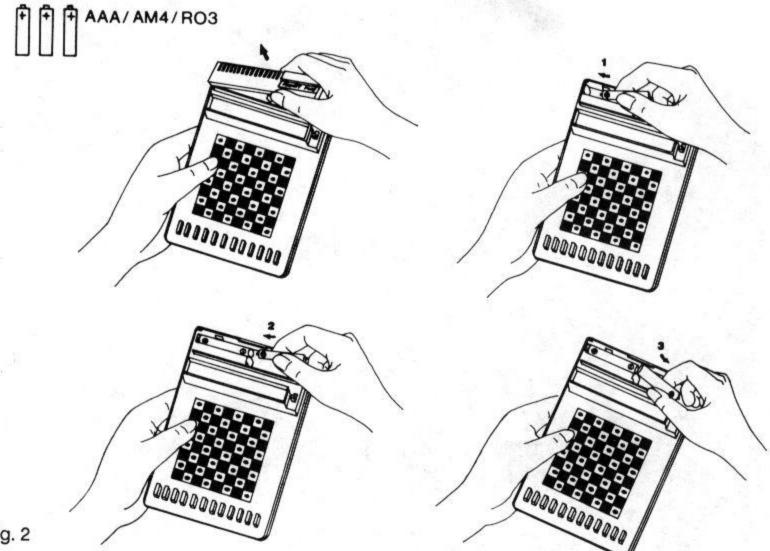
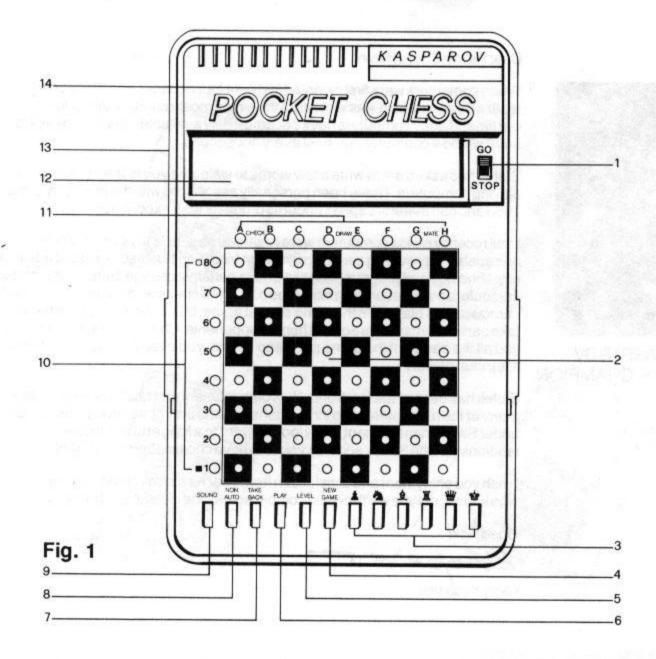


Fig. 2



# Keys and Functions

- Power switch
- 2. Sensor chessboard
- Piece Keys
- 4. New Game
- Level
- 6. Play
- 7. Take Back
- Non Auto
- Sound
- 10. Lamps display row of piece moving
- 11. Lamps display column of piece moving
- 12. Chess pieces storage compartment
- 13. ACL switch (in base of set)
- 14. Battery compartment

## 1. Introduction

Pocket Chess is an advanced portable chess computer. It contains the latest in sensor technology and efficient, low-power electronics. It automatically registers your moves on the built-in board and uses 16 lights on the edge of the board to indicate its own moves. It is fully battery operated and has a unique long-term memory which retains the last position of an interrupted game for up to one year.

The computer requires 3 standard AAA batteries. We recommend the use of alkaline batteries which will provide 200 hours of playing time. Remove the cover of the battery compartment and insert the cells as shown in Fig. 2. Switch the computer on.

**Note:** If at any time you encounter difficulties in getting the computer to respond to your moves, you may clear its memory by pressing **ACL** (use a pencil or a pin to activate this key in the rear of the computer).

## 2. Getting started

After inserting batteries, switch the computer on. You will hear a beep, then the lights flash sequentially and a light at the bottom left of the board (row 1) comes on (normally the row 1 light indicates White and the row 8 light indicates the Black). Press **NEW GAME**. Enter a move by selecting a piece and pressing briefly on it (2 lamps come on), putting it down where you want it to go and pressing again. The computer beeps and replies by turning on 2 lamps of its own. You press the piece on the square designated, pick it up; place it on the square designated and press briefly again.

#### 3. Setting the level of skill

The computer has eight levels of skill which may be changed at the beginning or at any time during a game (but only when it is your turn to move).

#### Average response time per move 1 second

- 2 2 seconds
- 3 10 seconds (switch-on level)
- 4 15 seconds
- 5 90 seconds
- 6 2 minutes
- 7 unlimited (user controlled)
- 8 problem solving

The above times are averaged over a large number of moves. Depending on the stage of the game and the tactical complexity of a position the computer may take considerably more (or less) time on individual moves

On level 8, the computer searches for a forced mate and only plays a move if it actually sees a mate. It solves up to a mate in 4. If the computer cannot find a mate in 1, 2, 3 or 4, it sounds a beep and stops. You may then continue with your game as usual, after switching to another level.

Note: If you would like to interrupt the computer's thought process at Search Level, press PLAY. The computer sounds an error beep to inform you that its search was interrupted and it had not found a mate up to that point. You can now simply make your next move after switching to another level.

When you press LEVEL the computer beeps and lights on the left of the board indicate which level is set. Press LEVEL until the number of lights correspond to the level you want. The level setting may be changed at the beginning or at any time during a game (but only when it is your turn to move).

#### Making moves

Set up the chess pieces in the starting position.

To make a move press down on the piece you wish to move, then place it on its destination square and press down again. Each time you press a piece you should hear a short "beep".

To make a capture key in the move of the capturing piece only. When castling it is necessary to key in the king's move first. The computer automatically recognizes castling maneuvers after the King is moved. After you have pressed the King down on its from and to square the computer uses the board lights to remind you to move the Rook. Press down on the Rook's indicated from and to squares to finish the castling move.

When you promote a pawn, press your pawn down on its from square, as usual. If you wish to promote to a Queen, simply complete your move by pressing down on the to square, and

the computer automatically changes your pawn to a Queen.

If you wish to underpromote (to a Rook, Bishop or Knight), you must follow a slightly different procedure. First, press your pawn down on its from square. Next, before pressing down on the to square, press the Piece Symbol key for the desired underpromotion piece. This enters your choice into the computer. Now move your pawn to its to square on the 8th rank to complete the move.

**Note:** Remember that castling is only allowed if the king and the rook have not moved and the king does not cross or move to a square that is attacked by an enemy piece. You also may not castle when your king is in check. The computer knows these rules perfectly and will not allow you to make an illegal move.

The computer also knows the "en passant capture" (if a pawn makes a double step and avoids capture by an enemy pawn it may be captured on the very next move as though it had moved only one step). The computer uses the board lights to remind you to remove the captured pawn. Be sure to press down on the captured pawn before removing it from the board. If you are not very familiar with this rule consult any elementary book of chess. En passant captures occur very seldom in a normal game.

#### 5. Computer moves

When you have entered a move the row 8 light (top left) will begin to flash, indicating that the computer is working on its reply. When it has decided what to play it will sound a beep and turn on two lights on the side of the chessboard. These lights indicate the horizontal rank and vertical column of the piece the computer wishes to move. Press the piece down on its square.

The computer will now show you where the piece must go. Move the piece to the square indicated and press it down to complete the move.

The computer is also capable of making promotions and underpromotions. If it promotes to a Queen, it simply makes its move as usual. If the computer underpromotes, however, it signals this by flashing the lights for its to square after you have moved its piece to that square. You should then use the Piece Symbol keys to find out which piece it has chosen for underpromotion. (See also section 13 for details on verifying pieces.)

# 6. Illegal moves

If you attempt to make an illegal move the computer will sound an error beep (high-low) and show you where the piece you are trying to move came from. You may place the piece on a legal square or replace it on the original square and move another piece.

You will also hear the error beep if you do not execute a computer move correctly or press an improper panel key.

#### Check, Mate, and Draw

When the computer puts your king in check the CHECK lights at the top of the board will flash. You must now make a move that defends the king.

If a game ends in checkmate, the MATE lights will flash. The row 1 or 8 lights tell you which side has been check-mated. In case of a stalemate or consecutive three-fold repetition the DRAW lights will flash.

#### 8. New Game

To start a new game press **NEW GAME** when it is your turn to move. The level setting will remain unchanged.

#### 9. Take Back

When it is your turn to move you may take back (erase) the last six ply by pressing **TAKE BACK**. In each case the computer will show you which piece to move back and where you should replace it.

Note: When taking back a castling maneuver, the computer only indicates the take-back of the King's move, and leaves it up to you to put the Rook back on its original square. When taking back a capture move, the computer guides you through the take-back of the move itself, but leaves it up to you to put the captured piece back on its original square.

# Changing sides

If you wish to change sides with the computer you may do so by pressing **PLAY** instead of making your move. The computer will play the next move for you and you can go on playing for the other side.

You can change sides as often as you like during the course of a game. You can even press **PLAY** after every move and make the computer play an entire game against itself. The **PLAY** key is especially useful when you need help and want the computer to suggest a move for you.

You might want to try playing with the Black pieces and letting the computer play White. Press **NEW GAME**, and then press **PLAY**. The computer then automatically reverses sides, and indicates the first move for white from the top of the board.

The following diagram shows the initial piece set-up when Black plays from the bottom of board. Notice, in particular, that the Kings and Queens are positioned differently in this board set-up.



Note: When you play Black from the bottom of the board, the color indicator lights are also switched (i.e., the 1 light now indicates Black and the 8 light now indicates White).

#### 11. Interrupt

When the computer is computing a move ( row 1 or 8 light flashes) you may interrupt it by pressing **PLAY**. This will cause it to stop computing and play the best move it has found so far.

#### 12. Non Auto

Your Kasparov chess computer has a special mode that allows you to enter moves or to force the computer to play a certain continuation. To do so first press **NON AUTO**. You may now enter moves at will. The computer will keep track of the board position and make sure that the moves entered are legal. To return to normal play you must press **NON AUTO**'a second time.

The NON AUTO mode is useful when you are playing a game with a friend. The computer will act as a referee and each side can always ask it for advice by pressing **PLAY**.

Note: Pressing NEW GAME always sets it to normal mode.

# Checking the board position

If you upset the pieces or for other reasons are not sure that the board position is correct, the computer will show you the proper location of each piece.

Press one of the piece keys when it is your turn to move. Two lights on the side of the board will come on to show you where that piece is located. If they are steady, the piece indicated is white, if they flash the piece is black.

Press the piece key again to see if there are any more pieces of that kind on the board. When the computer finds no more of the piece selected it will sound a double beep and return to play mode.

# 14. Turning sound off

If the computer "beeps" are distracting you or others during a game you may turn off the sound by pressing **SOUND**.

Pressing this key again will turn the sound back on. You must watch the indicator lights and press pieces and keys carefully when playing without sound.

Note: Pressing NEW GAME always turns on the sound.

#### Game memory

Your Kasparov chess computer allows you to interrupt a game at any stage, even when it is computing a move, by moving the GO/STOP switch to STOP. Play will be stopped at that point and battery power conserved. The computer will "remember" the position and resume play when you switch back to GO. With a fresh set of batteries the position will be retained for up to two years.

#### 16. The ACL key

Computers sometimes "lock up" because of static discharge or some other electrical disturbance. If this happens use a pin or other sharp object to press the **ACL** key in the base of the set for one second. This resets the computer and clears its memory.

#### Care and maintenance

Your Kasparov chess computer is a precision electronic device. Do not subject it to rough handling or expose it to extreme temperatures or moist, damp areas. If the lights become dim or the computer begins to play erratically, the batteries need to be replaced. Never leave weak or "dead" batteries in the unit, as they may leak and cause damage.

## 18. Technical specifications

LED lamps: 16 red

Kevs: 12

Power consumption: 15mW max

Batteries: 3 "AAA" penlite cells (type AM4, RO3)

Battery life: 200 hours (alkaline batteries)

Dimensions: 164 x 108 x 18 mm

Weight: 0.3 Kg (without batteries)

Saitek reserves the right to make technical changes without notice in the interest of progress.



Do not use rechargeable batteries

# 19. Troubleshooting guide

	SYMPTOMS	POSSIBLE CAUSES, TESTS	WHAT YOU SHOULD DO
1.	Does not work using batteries.	Batteries weak.	Replace batteries.
		Batteries not inserted properly.	Check if batteries are inserted the correct way round.
		Power-on reset problem.	Press the <b>ACL</b> switch in the base of the computer for 5 seconds with a pin, paper-clip or similar.
2.	All lamps light up together.	Power on reset problem or static discharge.	Press ACL switch for 5 seconds.
		Batteries weak.	Replace batteries.
3.	Computer 'freezes' in the middle of a game.	Batteries weak.	Replace batteries.
		Static discharge.	Press ACL switch for 5 seconds.
4.1	Lamp does not work.	Lamp dead.	Service Centre.
4.2	Chessboard square or key does not respond correctly when pressed, OR Lamps do not come on correctly.	Faulty contacts: Hold down the <b>PLAY</b> key for 2 seconds or more immediately after pressing the <b>ACL</b> switch. Press each square on the chessboard and each key in turn. The LED lamps should light up with a beep.	Service Centre.
4.3	MATE lamps do not light up.	Test the control lamps as follows: Press NEW GAME, NON AUTO, F2, F4, E7, E5, G2, G4, D8, H4. The MATE lamps should light up.	Service Centre.
5,	Computer makes illegal move or computer cheats.	It has made a special move like  — En passant  — Castling (King side or Queen side)  — Pawn promotion/underpromotion	Perform the move, then make sure that you are familiar with these rules (Read 'RULES OF CHESS' manual). Use the piece keys to confirm where the pieces are. Then use the TAKE BACK function to return to the previous board position and verify again. This will show you exactly what the computer has done. Repeat tests 4.2 & 4.3 to check computer working correctly.
		You have got pieces on the wrong squares	Make the computer's move, use the piece keys to confirm the board position (See chapter 13).
		Batteries are running out:  — Display dim  — Sound weak  — Lamps blink more slowly	Replace batteries, press ACL and try again.

	SYMPTOMS	POSSIBLE CAUSES, TESTS	WHAT YOU SHOULD DO
6.	Computer does not accept your move in the middle of a game.	Batteries are running out.	Replace batteries.
		Computer locks up.	See chapter 1.
		You are trying to make an illegal move.	Look at the color lamp — is it your turn? Is your King in check? (CHECK lamp) Will your move put your King into check? Are you trying to castle incorrectly? Did you move the Rook first when castling? Use the piece keys to confirm where the pieces are.
7.	A pawn moves like a Queen, a Rook, a Bishop or a Knight.	The pawn has been promoted.	Use the piece keys to confirm the board position.  Use the TAKE BACK function to take back as far as necessary and replay the game.
8.	Computer will not play 8.1 White or Black lamp on steadily	It has not started computing.	Press PLAY to start it computing. If the NON AUTO function is on, read chapter 12.
	8.2 White or Black lamp flashing	You have not waited long enough. The computer is still thinking. In complicated positions it may take many times longer than the average response time. Difficult Mate problems may take weeks to solve.	Verify the level, check chapter 2. To interrupt the thinking process press <b>PLAY</b> .
9	Computer is silent.	The sound is off.	Press SOUND again to turn it on.