

# **The K Mines Handbook**

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# The KMines Handbook

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## **Abstract**

K Mines is the KDE version of the classic minesweeper game.

## Chapter 1

# Introduction

KMines is the classic Minesweeper game. You must uncover all the empty squares without blowing up a mine.

When you uncover a square, a number appears: it indicates how many mines surround this square. If there is no number the neighboring squares are automatically uncovered. When you find a square that you are sure contains a mine, it is *very* useful to put a flag on it (by right-clicking).

## Chapter 2

# How to Play

You have to use the mouse and its three buttons to uncover or to flag the squares (with two-buttoned mice, clicking the middle button is generally achieved by simultaneously pressing the left and the right buttons). Here are the details:

- The left button will uncover a square. If there is a bomb below that square, the bomb will explode, and the game will be over.

If there is not a bomb under the square, a number will appear. That is the number of neighboring squares that contain bombs. ‘Which ones?’ you ask: That’s the point of the game.

For each square (excluding edge and corner squares), there are 8 neighboring squares.

If none of the neighboring squares has a bomb, then a blank will be shown under the square, and all neighboring squares will be automatically uncovered.

**NOTE**

Left clicking a flagged square is safe and does nothing.

- The right button will mark a square as containing a mine (by drawing a red flag on it) or, if the option is set, as being uncertain (by drawing a question mark on it). The uncertain tag can be useful when you are puzzled about the positions of mines.
- The middle button will clear the surrounding squares if the right number of squares is already flagged. It is very useful since it is much quicker than uncovering all individual squares.

**WARNING**

If your flags are not properly positioned, you will explode a bomb.

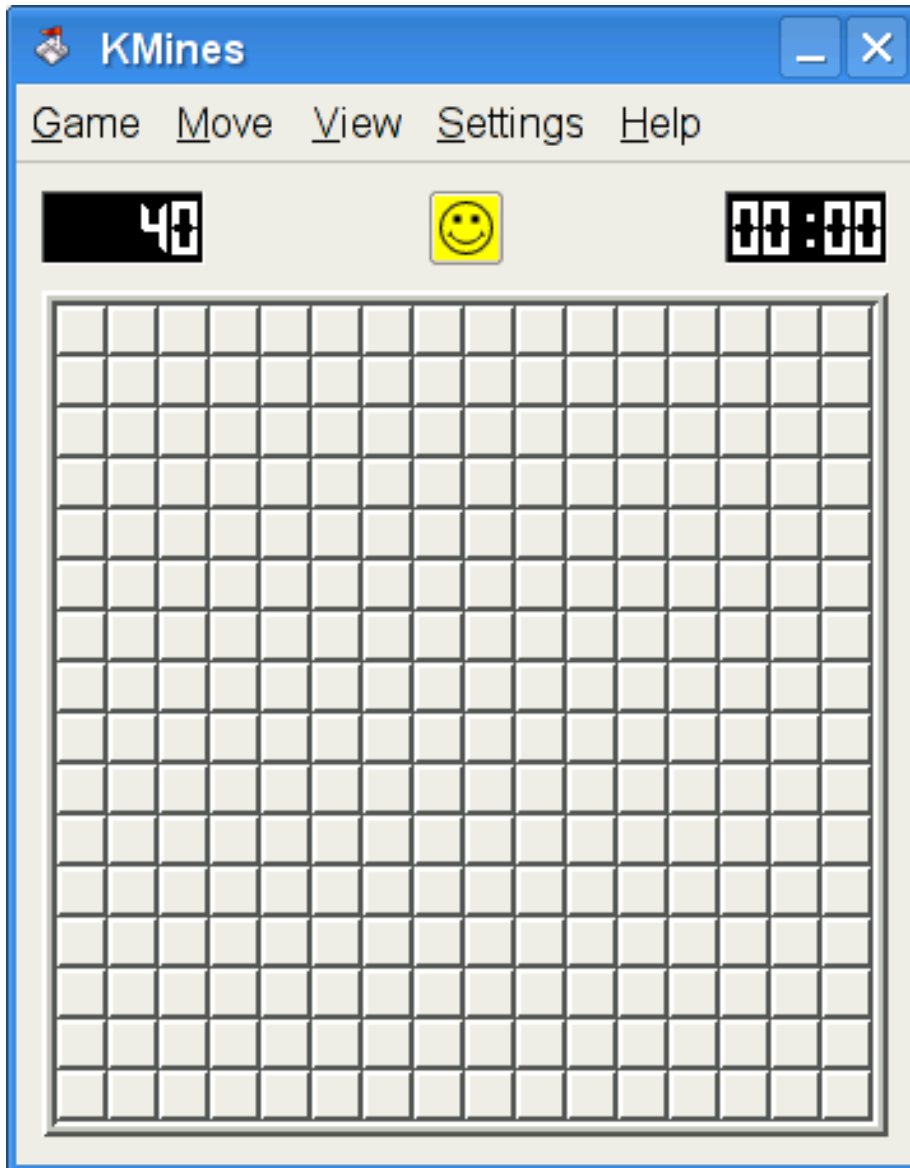
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- Pressing the yellow smiley will start a new game.

### NOTE

These are the default settings. The mouse buttons can be reprogrammed. For more information, see the section entitled [Game Options](#).

## 2.1 The KMines Screen



The KMines screen consists of:

- A Box showing you the number of mines still left to be marked. Every time you flag a bomb site, this number will decrease by one.

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### NOTE

This box does not determine if you are right or wrong, but only how many mines you need to theoretically mark before you are done with this game.

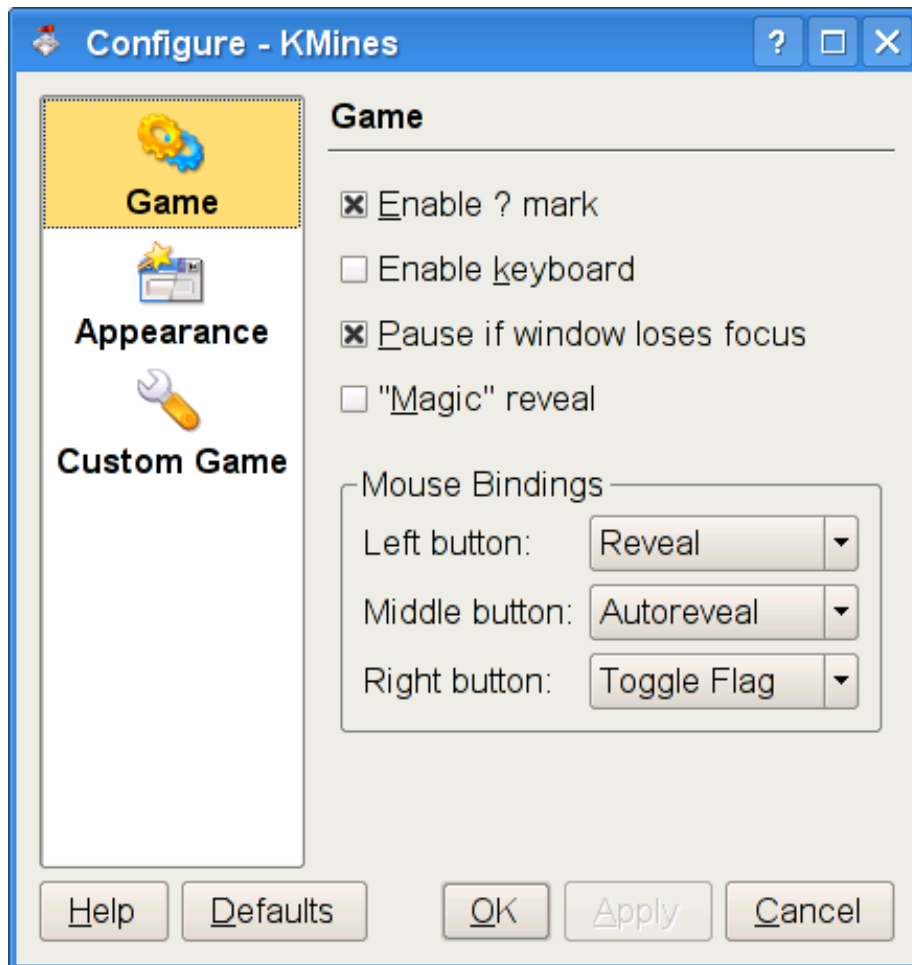
In this example, there are 40 mines to be marked.

- A Yellow Smiley Face. Clicking this will start a new game. If you lose the game, it will become a frown.
- The box on the right shows how much time this round has taken. The shortest time for each level is listed as the high score.
- The playing area. This will vary in size depending on the difficulty level of the game. In this example, it consists of 256 squares. This is where you play the game.

## Chapter 3

# Game Options

The options to KMines are set by selecting Settings → Configure KMines from the menubar. This will bring up a dialog box.



This dialog box is divided into three sections.

**Game** The first option, labeled Enable ? mark, determines whether you can mark squares as 'questionable'. If this option is checked, then right clicking the mouse will first cause a square to be flagged. If you right click again on the same square, the flag will change to a ?, to indicate you don't know if there is a bomb there or not. If you click again, the square will change back to blank.

If there is not a mark in front of this option, the first right mouse click will change the square to a red flag. The second will make it blank again, thus skipping the ? symbol.

The next option down, labeled Enable keyboard, determines if the keyboard shortcuts will work while playing the game. The default keyboard shortcuts are given in Section 4.6, and can be changed by selecting Settings → Configure Shortcuts....

**NOTE**

The only keyboard shortcuts affected are those responsible for playing the game. Keyboard commands such as New Game and Quit, still work, regardless of this option.

The Pause if windows loses focus option will automatically pause the game if the K Mines window loses focus. When the game is paused, the gameboard disappears, so you cannot use pausing the game as a way to cheat!

The "Magic" reveal option switches on 'Magic reveal' mode. In this mode, K Mines does most of the gameplay for you: If you have uncovered enough squares to be able to tell with certainty that a square contains a mine, K Mines will automatically mark it as a mine, and perform an autoreveal on squares for which it has marked the correct number of mines. Note that when you have this mode switched on, your scores do not count as highscores.

The last section of this tab allows you to change the action of each of the three mouse buttons. Your options are:

**Reveal** This will reveal the contents of the square. If there is no bomb, then a number will appear. If there is a bomb under that square, then the bomb will explode, and the game will be over.

**Autoreveal** Clicking on a square with this button will automatically reveal all neighboring squares that are not marked with red flags. If one of those neighboring squares has a bomb under it, the bomb will explode, and the game will be over.

**Toggle Flag** Clicking with this button on a square will cycle through blank, red flag, and question mark.

**Toggle ? Flag** Clicking with this button on a square will mark/unmark with a question mark.

**Appearance** The top three color buttons determine the Flag Color, Explosion Color and Error Color.

The rest of this page is concerned with mines colors. To adjust, simply click the color button beside each description, and select the new color.

**Custom Game** Finally, if you are not finding the existing configurations challenging enough, you can set up a custom game here. Use the sliders to change the Width, Height, and the percentage of the board covered with Mines. The default game has 15 percent of the board covered, so there is plenty of room to make the game harder.

**Saving your changes** Once your changes are complete, click OK to make them permanent.

If you want to abandon your changes, click Cancel to abort the changes.

If you click on Defaults, the default settings will be restored. Click OK to make these default changes permanent, or edit the settings some more.

## Chapter 4

# Commands/Keyboard Shortcuts

The following sections briefly describe each menubar option.

### 4.1 Game Menu

The Game menu consists of 4 options.

**Game** → **New (Ctrl+N)** Starts a new game.

**Game** → **Pause (P)** Pauses or resumes the game. This will hide the board (no cheating), and give you a button to press when you want to continue this game.

**Game** → **Show Highscores (Ctrl+H)** This shows you the high score (the shortest time) for each difficulty level.

**Game** → **Quit (Ctrl+Q)** Quits K Mines

### 4.2 Move Menu

**Move** → **Hint (H)** If you use this item, you will get a hint about where you should click next. If you do that your score will not be added to the highscores.

**Move** → **Solve** This item tries to solve the current game.

**Move** → **Solving Rate...** This item shows a dialog that calculates the solving rate for the current game type.

**Move** → **View Log** This item shows a dialog with the log of the last game.

**Move** → **Replay Log** This item replays the current log.

**Move** → **Save Log...** This item shows a dialog to save the current log.

**Move** → **Load Log...** This item shows a dialog to load a log.

### 4.3 View Menu

**View** → **Zoom In (Ctrl++)** Increase the size of the gameplay canvas.

**View** → **Zoom Out (Ctrl+-)** Decrease the size of the gameplay canvas.

### 4.4 Settings Menu

**Settings** → **Show Menubar** If there is a check in front of this option, then the menubar will be visible. Selecting this option, hides the menubar.

#### NOTE

To restore a hidden menubar, click outside the game play area, with the right mouse button. This will bring up a small sub-menu. Simply select Show Menubar from this sub-menu, and the menubar will be visible again.

**Settings** → **Choose Game Type** Lets you set the difficulty level from a sub-menu.

There are three default levels of difficulty: Easy (64 squares, 10 mines), Normal (256 squares, 40 mines), and Expert (480 squares, 99 mines). There is also a Custom... level settings.

If you select Custom..., then the settings you have configured in the Configure K Mines dialog will be used.

**Settings** → **Configure Shortcuts...** This item lets you change the keyboard shortcuts used by K Mines.

**Settings** → **Configure Notifications...** This item displays a standard KDE notifications configuration dialog, where you can change the notifications (sounds, visible messages, etc.) used by K Mines.

**Settings** → **Configure Highscores...** On the Main tab you can change your Nickname and add a cute Comment about yourself, to show in the high score table. You can also activate the World-wide highscores enabled checkbox, and share your skill at K Mines across the world with an online high-score server. If you are connected to the Internet, K Mines will send your

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score automatically at the end of the game to the highscore web server (kmines.sf.net).

The Advanced tab displays your Registration Data on kmines.sf.net: Your Nickname: from the Main tab and the Key:. This key was generated when you registered on kmines.sf.net by selecting World-wide highscores enabled the first time. The registration key is used in conjunction with the nickname to identify uniquely users, but users cannot have the same nickname. Click on the Remove button to delete you from the world highscores list.

**Settings** → **Configure K Mines...** Allows you to adjust game options. For more detailed information, see the section entitled [Game Options](#).

### 4.5 Help Menu

**Help** → **K Mines Handbook (F1)** Invokes the KDE Help system starting at the K Mines help pages. (this document).

**Help** → **What's This? (Shift+F1)** Changes the mouse cursor to a combination arrow and question mark. Clicking on items within K Mines will open a help window (if one exists for the particular item) explaining the item's function.

**Help** → **Report Bug...** Opens the Bug report dialog where you can report a bug or request a 'wishlist' feature.

**Help** → **About K Mines** This will display version and author information.

**Help** → **About KDE** This displays the KDE version and other basic information.

### 4.6 Default Keyboard Shortcuts

The following table shows you the default keyboard shortcuts.

These shortcuts can be changed by selecting **Settings** → **Configure Shortcuts...** from the menubar.

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<b>Key Combo</b>	<b>Action</b>
<b>Arrows</b>	Move cursor in playing area.
<b>PageDown</b>	Move to bottom edge
<b>PageUp</b>	Move to top edge
<b>Home</b>	Move to left edge
<b>End</b>	Move to right edge
<b>Space</b>	Reveal square.
<b>W</b>	Mark square as mine
<b>Return</b>	Automatically reveal all surrounding squares not marked by a flag.
<b>Ctrl+N</b>	New Game
<b>P</b>	Pause Game
<b>Ctrl+Q</b>	Quit KMines
<b>F1</b>	KMines Handbook
<b>Shift+F1</b>	What's This Help
<b>Ctrl+H</b>	Show Highscores
<b>Ctrl+M</b>	Show Menubar
<b>Ctrl++</b>	Zoom In
<b>Ctrl+-</b>	Zoom Out

Table 4.2: Keyboard Shortcuts

## Chapter 5

# Credits and License

K Mines

Program copyright 1996-2000 Nicolas Hadacek [hadacek@kde.org](mailto:hadacek@kde.org)

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Some changes for KDE 3.2 by Philip Rodrigues [phil@kde.org](mailto:phil@kde.org)

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# Appendix A

## Installation

### A.1 How to obtain K Mines

K Mines is part of the KDE project <http://www.kde.org/> .

K Mines can be found in the kdegames package on <ftp://ftp.kde.org/pub/kde/> , the main FTP site of the KDE project.

### A.2 Compilation and Installation

In order to compile and install K Mines on your system, type the following in the base directory of the K Mines distribution:

```
% ./configure
% make
% make install
```

Since K Mines uses **autoconf** and **automake** you should have no trouble compiling it. Should you run into problems please report them to the KDE mailing lists.