

TELEMedia

Watchdog lite 2.0 Documentation

Index:

- 1.0 - Welcome !!
- 2.0 - Requirements.
- 3.0 - Getting started.
- 4.0 - The software side.
- 5.0 - The Hardware side.
- 6.0 - Putting it all together.
- 7.0 - Watchdog Pro features.

2.0 Welcome.

Welcome to the wonderful world of home security software!

Watchdog lite 2.0 is the shareware version of the powerful Watchdog Pro Home Security Software. Use it to monitor and log sensors for doors, windows, file cabinets or anything else you can attach a simple open/close sensor switch to, or any other kind of switch including thermal, mercury, hydro, pressure, etc.

Watchdog also monitors and logs up to 4 phone lines simultaneously including caller ID capabilities. Keeping track of number of calls, number of rings, date, time, name and number of callers.

Watchdog lite 2.0 with it's two enabled sensor monitors, Compared to Watchdog Pro's simultaneous 8 to 16 sensor monitoring capability, is useful for monitoring and logging door and window and phone activity for your desk or whole office. After discovering how useful Watchdog lite's logging of activity is for two inputs, you may desire the power of Watchdog Pro's 8 to 16 sensor array monitoring and ability to log into, access, view and change Watchdog Pro's monitoring functions while hundreds of miles away via call-in using a modem.

This documentation will help you understand, setup and use the features of Watchdog lite to help you get started on protecting and monitoring all the equipment activity that goes on around your computer 24 hours a day while your away.

2.0 Watchdog lite/Watchdog Pro hardware requirements.

Watchdog lite/PRO software only requires the minimum standard equipment included with virtual all IBM compatible PC's since the 8088 XT.

Monitoring phone activity requires a modem for each line you wish to monitor. Caller ID logging require a modem with caller ID capabilities built in.

Watchdog software will operate on all IBM compatible XT 8088, AT 286, 386, 486 and Pentium computers with at least 512k RAM, MS-DOS 6.0 compatible operating System and a input/output card with a standard "15 pin" female DB-15 connector. Just about every IBM compatible computer on the planet comes with one on the serial card.

Watchdog also runs equal well under Windows 3.1 and Windows95 in a DOS window, it was especially designed for this purpose so it can run in the background, monitoring all sensor input activity.

3.0 Getting started.

Installation is very simple and straight forward. No complicated and time consuming custom install and setup routines are required, simply copy all the files from the Watchdog 3.5in. disk to a directory of your choice, or you can even run it from the 3.5in. disk itself!

From a DOS command line in the directory you have Watchdog installed, Simply type WATCHDOG to launch the software.

From the Windows 95/3.1 environment click on the program ICON.

The software can be moved to any directory at any time without any modification or setup changes to the software, as long as all the files are kept together in the same directory.

Watchdog Pro and Watchdog lite 2.0 does not make any changes to any Windows or DOS initialization files like the Windows95 registry or any .sys, .ini, .bat or .sys support files.

This makes uninstalling the Watchdog software as simple as deleting it.

4.0 The Software side.

After you have the software installed and running it's time to setup and customize it to your liking.

All program functions are accessible through the Function keys F1-F10. Function keys are labeled at the bottom of the screen. You can press the function keys by hand or even click on the function key label number if you have a mouse, a mouse driver is required in DOS operation.

The F1 function key:

You can bring up a quick on-line help menu by pressing the F1 key for a brief description of each function.

The F2 function key:

The setup menu is reached by pressing or clicking F2 or by clicking the left mouse button anywhere on the screen. This is where all meat of the setup is done.

From the setup menu you can click or select the item number of the setup option of your choice.

Option 1...Make or change the password security features.

Password security is a important feature in Watchdog. A password can be set to access Watchdog lite 2.0 from the console or from remote dial in.

When you first start Watchdog lite 2.0 a password is not set by default. A password of your choosing can be set using this option. The password you select will be used for all Watchdog lite 2.0 security functions. When and if you select a password, it is stored in encrypted format.

Option 2...Changing the log output device.

All sensor activity is recorded in a permanent log on disk or printer. This option lets you select your logging setup, choosing whether to record sensor logs to disk, printer, both or neither.

Logging to the printer is useful for a hard copy record that is safe from disk failure while away from the computer for extended periods of time, plus it also ensures against log erasure from unauthorized remote sources.

Option 3...Changing the awareness timers.

You can use this option for selective monitoring. For periods of time during the day you may or may not wish a sensor to be monitored and alarm functions for that sensor turned off or on.

Option 4...Remote modem access.

This option accesses the controls necessary for remote modem call in features.

It is pretty straight forward it includes com port selection, remote modem accessibility, remote modem control options and remote modem feature selections.

You can also select and setup your phone monitoring and phone Caller ID options from this menu item.

Option 5...Erase current log.

This option is used to erase your log from disk if you want to start over with a new one.

It's a good idea to copy your disk log to another filename if you intend to keep a archive of sensor activity for the long term. You can copy a weekly log to a filename representing the logs date so you can have a history of sensor activity for a site for years is desired.

Option 6...Customize sensors.

This is the most used option. This option lets you activate or deactivate particular sensor monitoring and lets you change the names or descriptions of any sensor.

The F3 function key:

Function key F3 brings up the real time sensor window where you can visually monitor the status of all of Watchdogs inputs (although only two are useable with Watchdog lite 2.0)

The sensor results are color coded for maximum visual recognition and instant determination of a sensors condition and status.

A sensor that is off line is listed in black and will not show any activity. Sensors that are online and closed are listed in green. A sensor that is actively open is listen in red while it is open.

Besides the color information about a sensors current state of being, if and when it was last active is shown with time and date of activity.

The F4 function key:

This key brings up the log window where you can review the current log of sensor and program activity. After bringing up the log window you can page through it buy pressing keys or clicking the left mouse button. The right mouse button and ESC key quits the log viewer.

The F5 function key:

The F5 key simply toggles the programs sound, if you do not wish to hear the programs audio cue's for all sensor activity and menu selections simply press F5 to toggle them off, a low tone will confirm program sound is off. Pressing F5 again will toggle program sounds on again, with a high tone report.

The F6 function key:

Instantly arm or disarm all alarm functions. This is useful if you are testing or setting up sensors at the same time there is traffic through the area or the sensors being monitored are in use while setting up.

The F7 function key:

The F7 key resets the sensors to a "all clear" state in the sensor window. It does not effect any setup or logging, it simply gives a fresh start to the monitoring process.

The F8 function key:

The F8 key locks or unlocks the console if a password has been set in the setup menu. If the password is set and the console is unlocked, it will lock the console to further operation until the proper password is entered when requested.

If the console is locked Watchdog will request the password, upon successful completion of the valid password, the console will unlock for normal program operation.

The F9 function key:

The F9 key allows the user to shell to the command line Operating System. Useful for file manipulation and system maintenance. This option is not available as a remote modem feature to ensure system security.

The F10 function key:

The F10 key is used to quit Watchdog and exit the program altogether . Exiting Watchdog lite 2.0 and quitting is also possible by clicking the right mouse button and selecting "Y" to exit when prompted.

5.0 The Hardware side.

Sensor input

Now that your familiar with the software it's time to start thinking about interfacing things that you would like to monitor to your computer.

I've found the best way to go about it is to make a interface "box" and use common RJ11 connectors (Telephone wire plugs) to standardize everything.

I use a small plastic housing with 8 RJ11 input plugs on one side and about 3 feet of 15 wire ribbon cable coming out the other side with a male 15 pin DB-15 connector soldered to the appropriate leads of the ribbon cable.

Inside the box I solder the RJ11 (telephone) connectors to the corresponding ribbon leads for the appropriate sensor contacts. I use only 2 of the 4 leads from the RJ11 sockets since that is all that is necessary but it's good to plan for expansion and you may want to run two sensors to 1 sensor and 1 cable since RJ11 cable contains 4 wires, 1 red, 1 green, 1 yellow and 1 black.

Always keep the same colors for all your sensors to keep things simple. I always use the 1 red and 1 green wires to carry the signal from 1 input sensor, leaving the 1 yellow and 1 black wires left in a run of RJ11 cable in reserve to carry the input from a second sensor for instance. But remember if you do this, 2 sensors would be carried on 1 cable and plug into 1 RJ11 socket in the interface box, but you could do with it what you wish as far as make internal connections, inputting each set of 2 wires to a separate sensor input, or running both together to 1 sensor input and both sensors could trigger the same input monitor.

It's good to have all this flexibility for all of our technical friends out there, but it's better to keep things simple. I like to use 1 cable and input connector for each sensor.

Complete diagrams and digitized photo's are included on the software disk for building your own interface box, or if you want the bare minimum you could just even run bare wire leads into the appropriate holes of DB-15 connector on the back of the computer. But this tends to get messy and looks rather unprofessional to say the least, but it can be done, especially if your only going to be using 1 sensor.

For those that are all thumbs I have packages of everything you need for a 8 sensor input system available including:

- 8 - Normally open contact switches.
- 8 - 50 foot lengths of RJ11 4 wire cable with connectors on 1 end of each.
- 1 - plastic interface box with 8 RJ11 input connectors for input and
- 1 - 15wire ribbon cable ending in a 15pin male DB15 connector ready to be plugged in to the computer. With all internal connections soldered and ready to go. (Plug-N-Play you might say.)

Everything you need to get 8 sensors interfaced to your computer cleanly and professionally. A order form is included in with the software disk.

Phone monitoring.

Watchdog PRO 2.0 fully enables phone monitoring include Caller ID functions keeping track of calls and callers, time and date of calls, and caller identification.

Watchdog PRO 2.0 will monitor up to 4 phone lines at the same time while monitoring all sensor inputs.

User paging via beeper is planned for the next release of Watchdog Pro, so Watchdog Pro owners can have their personal pagers warn them to check in with the software for sensor and phone activity while the user is away. Police and security features are also in the works.

6.0 Putting It All Together.

After all the pieces are in place, sensors in place, every connected to the computer and the software is running you can monitor the daily comings and goings of traffic around your home and computer.

Now you can say you have finally found a truly useful job to put your home computer to. I recommend running Watchdog under WIN95 or Win 3.x so it can run in the background, while you are doing other things, but having it run on a older IBM compatible that you thought would no longer could be of any use as a stand alone DOS program will give new life to older machines. Go ahead drag them out of the closet and put them to good use!

If you wish to try testing the sensor inputs without hooking in a sensor, a good why to test the inputs is to try plugging in a game pad into the DB15 port, game pad buttons and movement sticks are nothing but switches, so they will trigger activity for testing.

7.0 Watchdog PRO 2.0 Features.

Here is a list of some of the features you will get when you purchase Watchdog PRO 2.0:

Eight full sensor monitoring (corporate versions up to 255 inputs!)
Full phone monitoring of up to 4 phone lines per machine. Include caller ID.
Smart monitoring to allow for predetermined comings and goings.
Complete remote reporting and operation from dial in phone modems.
Increased encryption security measures.
Plus many more!

Also some features being developed right this minute are:

Windows95, Windows 3.x, 16 and 32 bit versions of the software.
User notification via beeper and police and fire notification systems
Alarm output triggering.
Plus many more!
