Using the ATA Security Feature on Mac OS 9 with the Cypress MSC Driver

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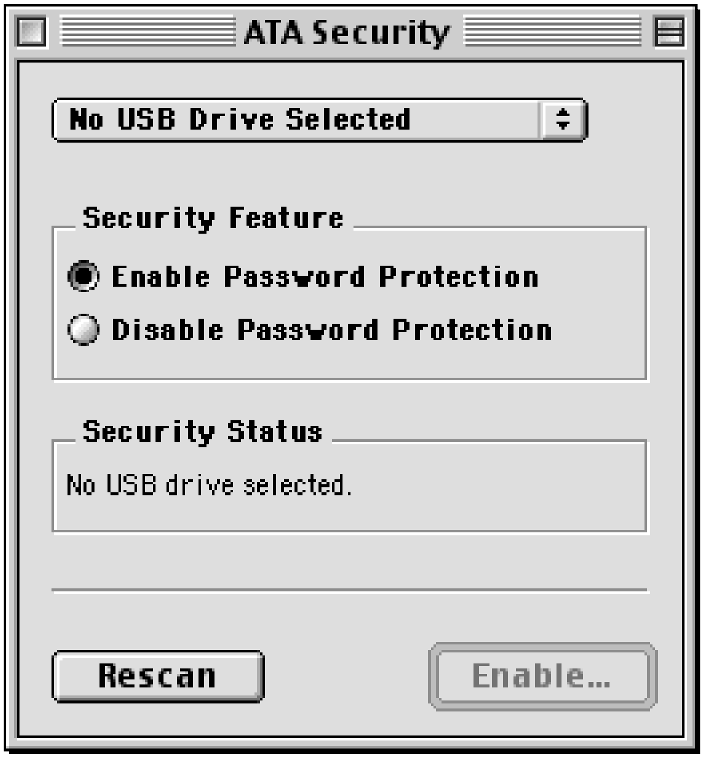
Overview

The ATA Security feature restricts access to user data stored on supported devices. Cypress' ATA Security application and MSC driver for Mac OS 9.x allows users to password protect their USB, ATA Security supported devices.

ATA Security Application

Getting Started

Launch the ATA Security application located in the Apple menu. While the application is loading it will search for attached USB devices, once the search is completed the main window shown in figure 1 will open.



No USB Drive Selected

Security Feature

● Enable Password Protection

○ Disable Password Protection

Security Status

No USB drive selected.

Figure 1 – Main Window

The pop-up menu in the main window contains a list of drives to choose from. This list will automatically be updated when devices are added or removed from a USB port.

The *Security Feature* radio buttons allows you to choose between enabling or disabling the password protection of the device currently selected in the pop-up menu.

The *Security Status* displays limited information about the device currently selected in the pop-up menu.

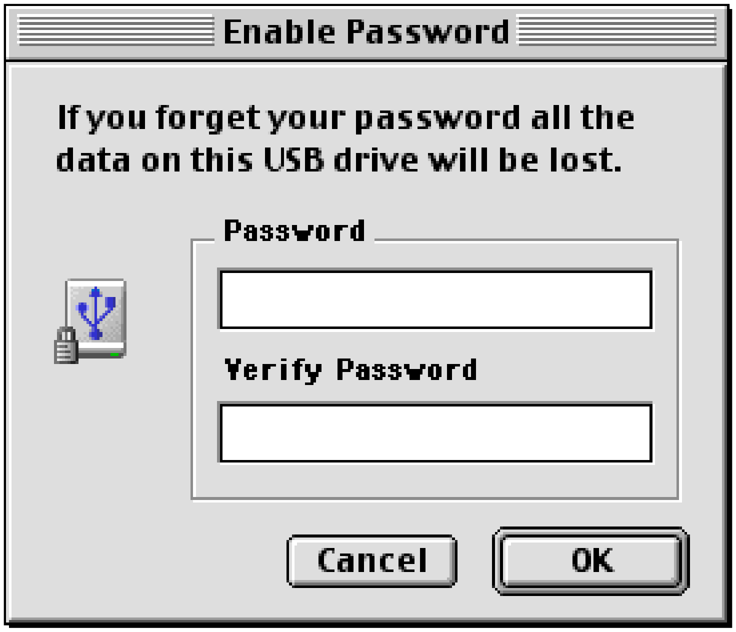
When the *Rescan* button in the main window is clicked on, it will display a dialog with an indeterminate progress bar while it searches for attached USB devices. After the search completes it will update the list of devices available in the pop-up menu.

The *Enable…* button will be activated if the *Enable Password Protection* radio button is selected and the device currently selected in the pop-up menu supports the ATA Security feature and a password has not been set. When the active *Enable…* button is clicked on it will open the *Enable Password* dialog.

The *Enable…* button text will change to *Disable…* when the *Disable Password Protection* radio button is selected. The *Disable…* button will be activated if the *Disable Password Protection* radio button is selected and the device currently selected in the pop-up menu supports the ATA Security feature and the password has been previously enabled. When the active *Disable…* button is clicked on it will open the *Disable Password* dialog.

Setting a Password

Open the *Enable Password* dialog shown in figure 2 by clicking on the active *Enable…* button in figure 1.



If you forget your password all the data on this USB drive will be lost.

Figure 2 – Enable Password dialog

Enter a password you can remember. As the dialog in figure 2 states, if you forget your password your data will be lost. Your only option will be to perform a secure erase, see *Removing the Password.* Your password will be required each time the device is connected to the USB port.

Removing the Password

Open the *Disable Password* dialog shown in figure 3 by clicking on the active *Disable…* button in figure 1.

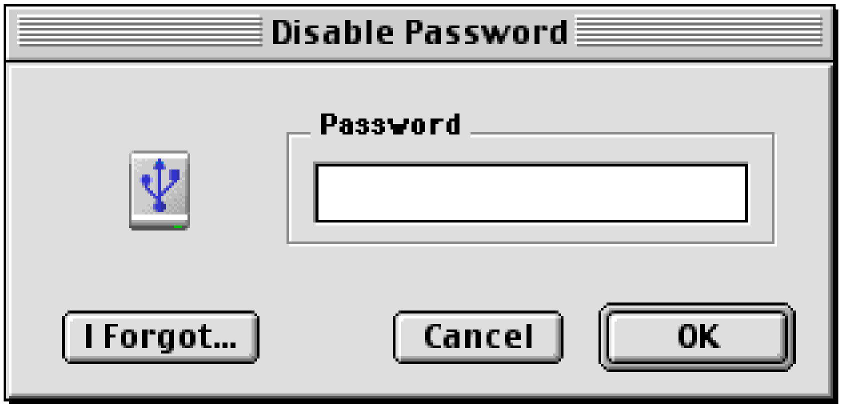
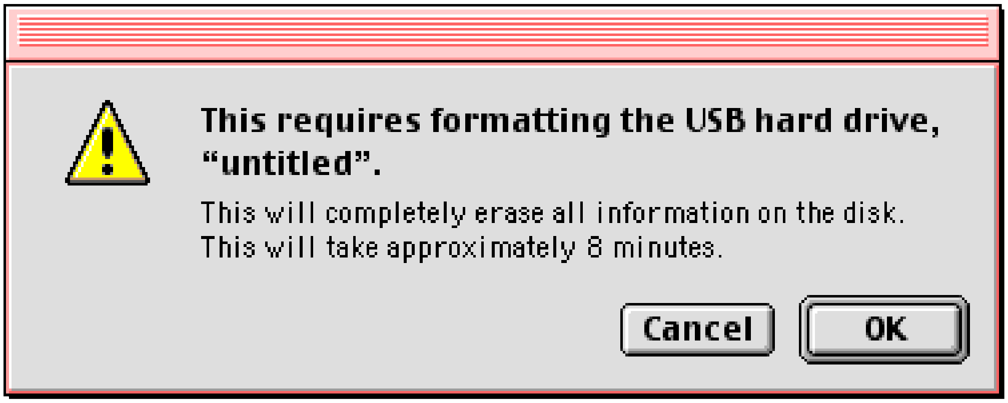


Figure 3 – Disable Password dialog

Enter the password you previously entered in the *Enable Password* dialog and click the *OK* button. If the password you entered is incorrect, it will allow you to try again.
If you forgot your password your only option is to perform a secure erase. The secure erase will write zeros to the user data on the media. To perform a secure erase click the *I Forgot…* button. The dialog shown in figure 4 will appear warning that you are about to erase all your data.



This requires formatting the USB hard drive, “untitled”.

This will completely erase all information on the disk.
This will take approximately 8 minutes.

Figure 4 – Secure Erase Warning dialog

The approximate time it will take to erase your hard drive will vary. The approximate time will be displayed in the dialog shown in figure 4. Once you click the *OK* button the erase cannot be cancelled, a dialog will appear displaying the progress of the erase. After the secure erase completes you will be required to format the drive.

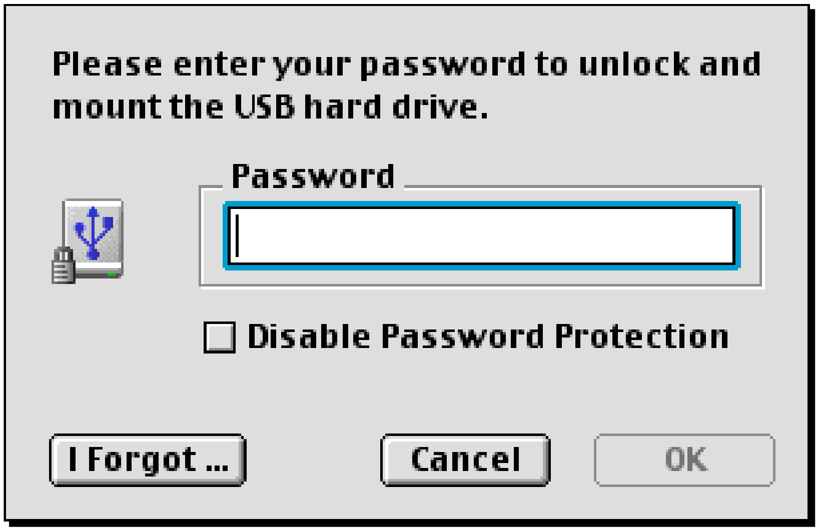
During the secure erase you will still be able to use your computer for other tasks.

Note: After enabling or disabling password protection on DOS formatted drives there is a delay in redrawing the screen while the DOS volume mounts. This is a limitation with the process of mounting DOS volumes.

Cypress MSC Driver

Mounting a Password Protected Volume

Each time the USB password protected drive is attached to the USB port for mounting the dialog shown in figure 5 will appear.



Please enter your password to unlock and mount the USB hard drive.

Password

☐ Disable Password Protection

Figure 5 – Mount Password Protected Drive dialog

Once the dialog shown in figure 5 is displayed the user has four options:

Mount the Drive – Password Protection Enabled

Enter the previously set password for this device and click the *OK* button. If the password you entered is incorrect, it will allow you to try again. Once the correct password is entered a volume will mount on the Desktop with the icon shown in figure 6a. This device is unlocked and the data can be accessed. Once the device is removed from the USB port or power cycled the password will be required to gain access to the data.

Mount the Drive – Password Protection Disabled

Check the *Disable Password Protection* checkbox. Enter the previously set password for this device and click the *OK* button. If the password you entered is incorrect, it will allow you to try again. Once the correct password is entered a volume will mount on the Desktop with the icon shown in figure 6b. Password protection for this device is now disabled. A password will no longer be required to access the data.

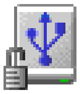


Figure 6a

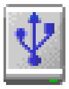
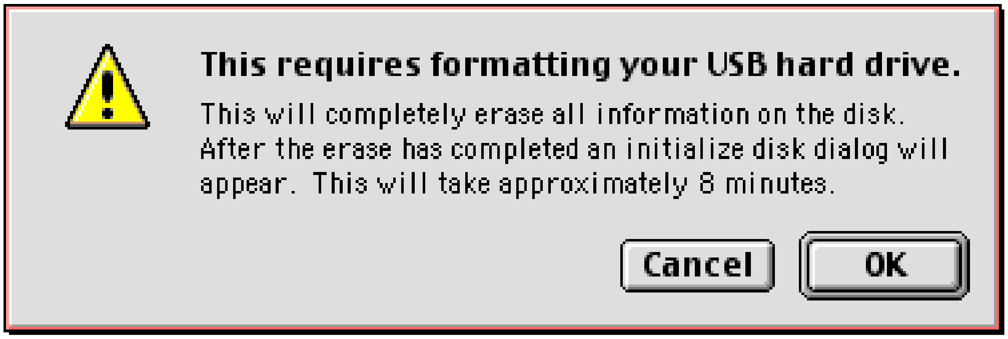


Figure 6b

Erase the Drive – Password Protection Disabled

If you forget your password, your only option is to perform a secure erase. The secure erase will write zeros to the user data on the media. To perform a secure erase click the *I Forgot…* button shown in figure 5. The dialog shown in figure 7 will appear warning that you are about to erase all your data.



This requires formatting your USB hard drive.

This will completely erase all information on the disk. After the erase has completed an initialize disk dialog will appear. This will take approximately 8 minutes.

Figure 7 – Secure Erase Warning dialog

The approximate time it will take to erase your hard drive will vary. The approximate time will be displayed in the dialog shown in figure 7. Once you click the *OK* button the erase cannot be cancelled. There will be no dialog displaying the progress of the erase, but once the secure erase completes you will be required to format the drive when the initialize disk dialog appears.
During the secure erase you will still be able to use your computer for other tasks.

Cancel – Password Protection Enabled

Clicking the *Cancel* button in figure 5 will close the dialog shown in figure 5 and the volume will not mount. The drive is still password protected. Using the ATA Security application you can still communicate with the device, but you will only be allowed to disable the password protection or perform a secure erase.