

ICS LinkTag Programming Software

Operation Instructions

Overview:

The ICS LinkTag programming module is a device which connects to a PC through a standard USB port. It works in conjunction with the ICS LinkTag Programming software to allow the reading and programming of the LinkTags for operation with either a Phoenix 8000 or Phoenix AFC fuel management system.

USB Driver Installation:

- Please note, the LinkTag Programmer driver and application have been designed to operate with Windows XP, or Windows Vista only.

Before connecting the LinkTag Programmer to the PC, the USB driver must be installed. If the LinkTag Programmer is connected to the USB port, disconnect it.

Insert the LinkTag software CD included with the LinkTag kit. Browse to the files of the CD and open the folder named "LinkTag USB Driver". Double-Click the application named "LinkTag USB Driver" and follow the instructions. Depending on your operating system, your computer may ask you for confirmation to run this program. Click "yes" or "run" on any such windows.

Another window will then appear with the name "Silicon Laboratories". Click the "Install" button to install the USB driver software. Once the driver has installed correctly, you may connect the USB cable of the LinkTag Programmer to the computer.

Note that the driver may take several minutes to install as it will search for installed components. It may appear that the installer has stopped working. Let it continue and the installation will complete.

Software Installation:

- Please note, the LinkTag Programmer driver and application have been designed to operate with Windows XP, or Windows Vista only.

Insert the LinkTag Software CD into the CD or DVD drive of the PC. Browse to the files of the CD and open the folder named “LinkTag Programmer”. Double-click the application named “setup”. The LinkTag Programmer Setup wizard should open. Click “next” to continue.

Note: If the computer is using windows XP and do not have the .net framework 3.5 installed, setup will prompt to install the .net framework and windows installer 3.1. Follow the directions to install these. LinkTag Programmer setup will continue afterward.

The next window will allow you to select the installation folder for the application. Keep the default installation folder so that ICS support personnel will know the location in case you need technical support. The bottom of this window has a selection for who will be able to use the LinkTag Programmer application. If any user should have access to it, click the button beside “Everyone”. If the current user should have exclusive access, click the button beside “Just me”. Now click “next” to continue.

The next window will simply ask you to confirm the installation. Click “next” to continue. The software will be installed into the folder specified in the previous screen: “C:\Program Files\ICS\LinkTag Programmer”. Depending on your operating system, a window may appear asking you to confirm installation of the application. Click “allow” to continue.

Once the application has been installed, the “Installation Complete” window should appear stating that LinkTag Programmer has been successfully installed. Click “close” to continue.

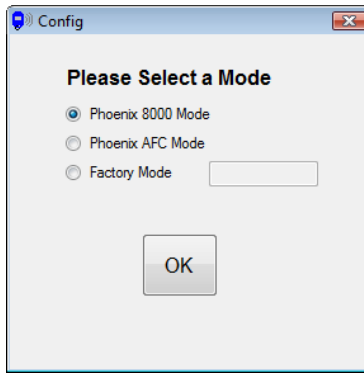
The installation will create a shortcut to the LinkTag programmer application in the start menu, as well as the desktop. You can click on either of these icons to start the LinkTag Programmer application.

Software Uninstall:

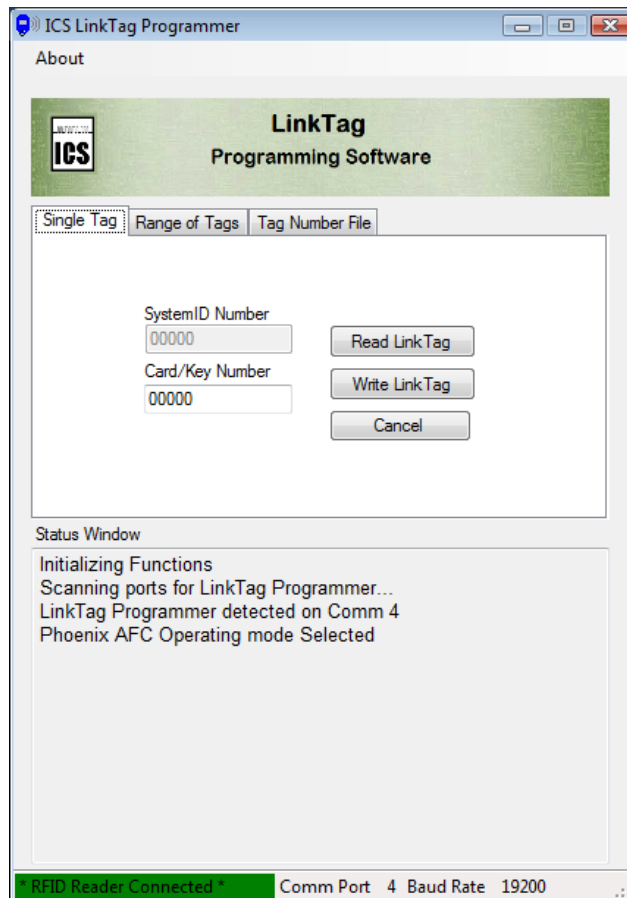
To uninstall the application, go to Start-Settings-Control Panel-Programs and Features. When the list of installed programs populates, double-click on LinkTag Programmer and follow the instructions to uninstall.

Software Operation:

Before executing the LinkTag Programmer application, make sure that the USB driver has been installed, and that the LinkTag Programmer is connected to a USB port.



When the LinkTag Programmer application is first executed, the mode selection window will be displayed. Select the operation mode which corresponds to the fuel management system being used and click OK. The “Factory Mode” option is used only for ICS LinkTag programming at the factory. To change the mode, exit the application and restart.



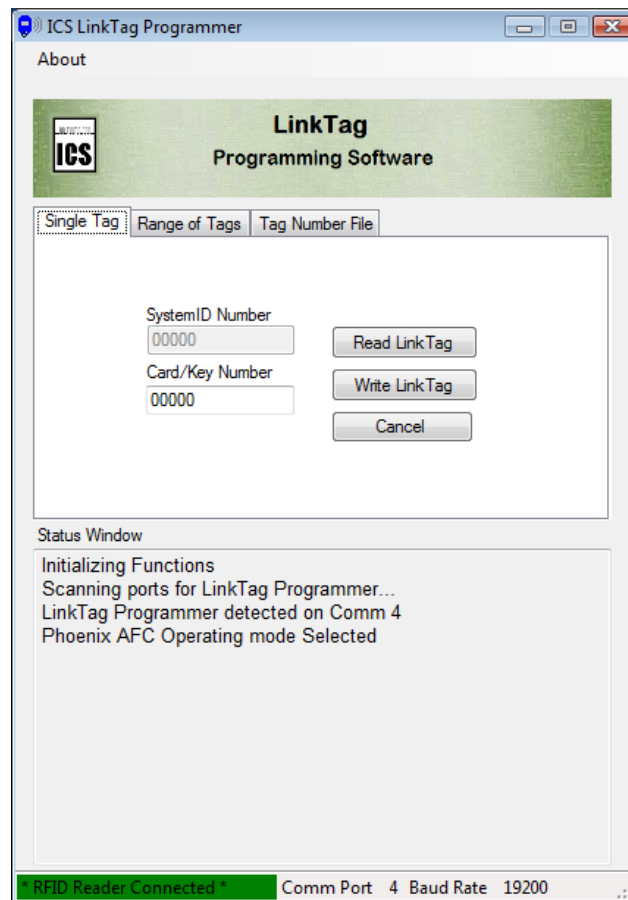
Once the operating mode is selected, check the lower left corner of the application window. If this area is green, then the application has detected your LinkTag Programmer and is ready for operation. If it is red, then the application could not detect

the LinkTag Programmer. Close the application and make sure the USB driver is installed. Make sure the LinkTag Programmer is connected, and re-execute the LinkTag Programmer application.

The main window of the LinkTag Programming software contains a tab control for selecting one of 3 basic functions and a status window which will display the current status of the program operation. The status bar at the bottom of the window indicates the connection status of the LinkTag Programmer, as well as the comm port in use and the baud rate.

The three tabs in the application allow the operator to select from three modes of programming operations. These are: Single Tag, Range of Tags, and Tag Number File.

Single Tag:



The single tag operation simply allows the operator to read or program one LinkTag at a time.

Read Link Tag:

To read a single tag, click the “Read Link Tag” button. The status window will prompt for a tag to be presented. Hold a LinkTag flat against the top of the programmer. The program will automatically detect the presence of the tag and display the tag data in the windows to the left of the buttons. Note that blank tags will display 0.

Write Link Tag:

To write a single tag, enter the vehicle number (for Phoenix 8000 users) or Card/Key number (for Phoenix AFC users) into the appropriate box. Click the “Write Link Tag” button.

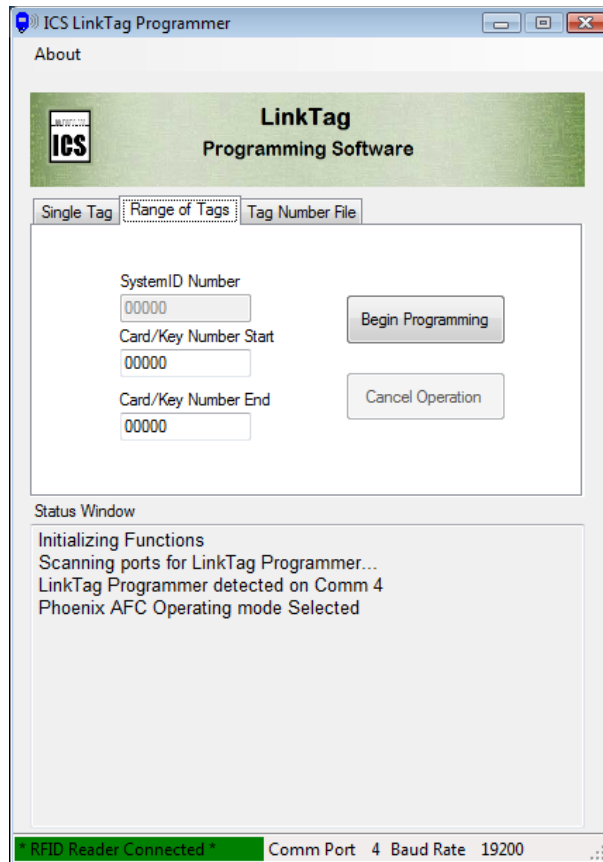
If this is the first write operation being done since the application was run, it will prompt for a system tag to be presented. Present any of the system tags that came with your LinkTag kit. The application will use the system tag to read your unique serial number or system ID number. This unique number will then be written to all LinkTags for your system so that others will not be able to program tags for use with your system.

Once the system tag has been read, the status window will prompt for the tag to be written. Hold the LinkTag to be written flat against the top of the programmer. The program will detect the presence of the tag and write the data to the LinkTag. Note that previously programmed LinkTags may be overwritten, but system tags may not. ICS recommends that you mark each LinkTag with its Vehicle Number or Card/Key number as they are written to prevent confusion.

Cancel:

During a read or write operation, the cancel button may be pressed to cancel the operation without presenting a LinkTag. Note that if a read or write operation is in progress, another tab cannot be selected until the cancel button is pressed.

Range of Tags:



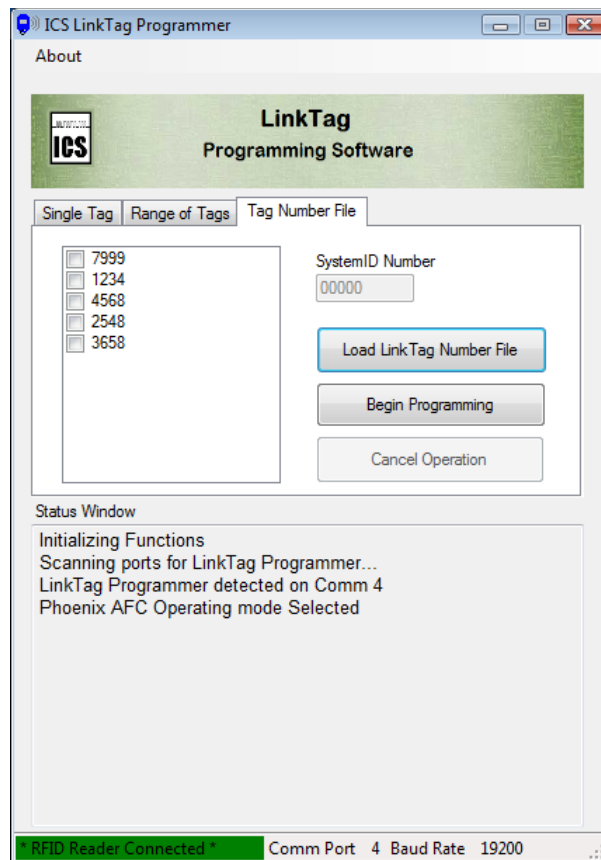
If a large number of sequentially numbered LinkTags need to be programmed, click the “Range of Tags” tab. Enter the starting and ending number of the LinkTags to be programmed. (Vehicle number for Phoenix 8000 or Card/Key number for Phoenix AFC) Press the “Begin Programming” button.

If this is the first write operation being done since the application was run, it will prompt for a system tag to be presented. Present any of the system tags that came with your LinkTag kit. The application will use the system tag to read your unique serial number or system ID number. This unique number will then be written to all LinkTags for your system so that others will not be able to program tags for use with your system.

The application will now prompt for a LinkTag to be programmed. Hold the LinkTag to be programmed flat against the top of the programmer until the status window prompts for the tag to be removed. Remember to mark each LinkTag as they are programmed to avoid confusion.

The application will continue prompting for LinkTags until the range of values entered have all been programmed. Remember that LinkTags may be reprogrammed but system tags may not. Cancel may be pressed at any time to cancel the operation.

Tag Number File:



If the LinkTag numbers that need to be programmed are not in sequential order, then the Tag Number File tab should be selected. To use this function, first create a text file containing all of the values to be programmed onto the LinkTags. (These will be vehicle numbers on a Phoenix 8000 system or Card/Key numbers on a Phoenix AFC system.)

Creating a Phoenix 8000 Vehicle number file:

The Phoenix 8000 system has no capabilities to transfer the vehicle data to a computer, so the data must be entered manually. If the Phoenix 8000 system has firmware version 4.0 or higher, the "Print valid Vehicles" card can be used in the system to print a list of valid vehicles to the printer. This list should then be entered manually using the windows notepad application and saved to a ".txt" file. Before saving, make sure that the list contains only 4 digit numbers from 0001 to 7999. This file can now be used for LinkTag programming.

Creating a Phoenix AFC Card/Key number file:

The Phoenix AFC system comes with the “AFC Administrator” application. To extract a list of Card/Key numbers, execute this application and select a site. Click the “Reports” function and select the “Card/Durakey” tab. Select the topmost report “Card\Durakeys listed sequentially” and press the Export button. A dialog box will appear allowing the report to be saved. Select the folder location to save and enter a filename for the file. Make sure that the file type is “.txt” and press OK. AFC Administrator will save the report file to the location specified. Now open the file just saved using windows notepad and edit out all information except the leftmost column of Card/Durakey numbers. Make sure there are no other characters other than a list of 5 digit numbers ranging from 00001 to 65499. Save the changes to the file and close notepad. This file can now be used to program LinkTags for the AFC system.

Now that the file has been created, load the file into the LinkTag Programmer application by pressing “Load LinkTag Number File”. A dialog box will appear allowing the file to be selected. Browse to the file location and select the file created in the steps above. Press “Open”. If there were no errors in the file data, the numbers will be loaded and listed in the box to the left of the buttons. If errors were encountered during the file load operation, use notepad to edit the file again and check for errors.

Now that the LinkTag number file has been loaded, press “Begin Programming”.

If this is the first write operation being done since the application was run, it will prompt for a system tag to be presented. Present any of the system tags that came with your LinkTag kit. The application will use the system tag to read your unique serial number or system ID number. This unique number will then be written to all LinkTags for your system so that others will not be able to program tags for use with your system.

The status window will now prompt for the LinkTag to be programmed. Present the LinkTag to be programmed by holding it flat against the top of the programmer until the status window prompts to remove it. Remember to label the tags as they are programmed to avoid confusion. As each number in the LinkTag number window is programmed it will be checked. The status window will now prompt for the next LinkTag until the entire list has been programmed. Press “Cancel” if necessary to cancel the operation.

Technical Support:

For problems with the LinkTag system, or for questions about compatibility, please call ICS Technical support at 972-642-6800.