**MCS9865**
**Windows-7 32 / 64 bit User Manual**


**Revision 0.1**


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## 1. Introduction

This document will present the steps needed to install / Un-install the Software drivers of MosChip PCI to Serial / Parallel products or another manufacturer's product based on MosChip MCS99XX series.

**General Description:**

## 2. Obtaining Driver

Please visit Moschip website www.moschip.com to download MCS9865 driver.
You can write to support@moschip.com for obtaining drivers for MCS9865.

## 3. Driver Installation

**Attention:** If you are installing MCS9865 Drivers on **Win7 64 Bit,** Select "**Disable Driver Signature Enforcement**" option while booting into the Operating System. This option can be obtained by pressing "**F8**" while booting.
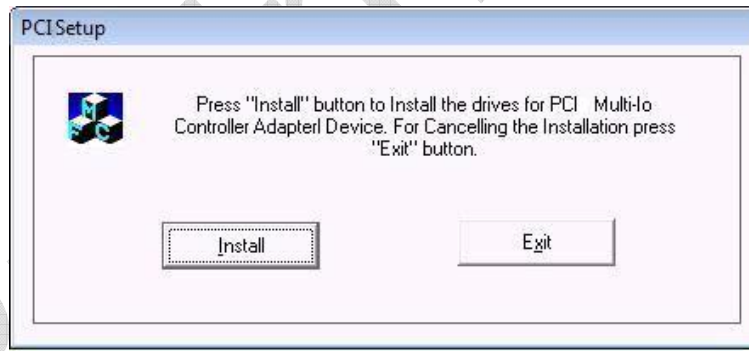
Ignore this Note if you are installing MCS9865 drivers on **Win7 32 bit.**

Installing drivers for the first time:
Make sure that you have not inserted PCI card into PCI slot.
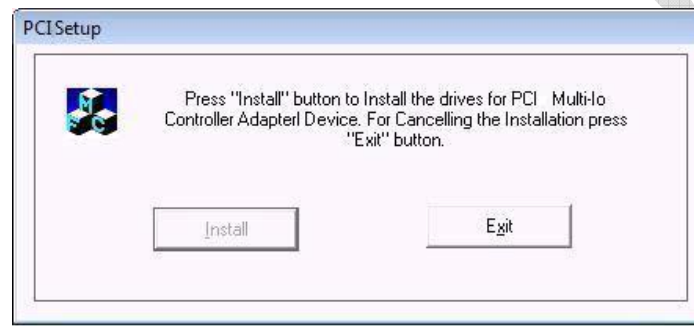Run "**PCIsetup.exe**" file from the driver disk folder.
You will see a window as shown below:



Press "Install" and driver will automatically installs. During the installation Windows security wizard will appear saying that Windows can't verify the publisher.

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Select "**Install this driver software anyway**" to install the drivers.



Click on "Exit" and shutdown the PC. Place the PCI card into PCI slot and then power on the system.
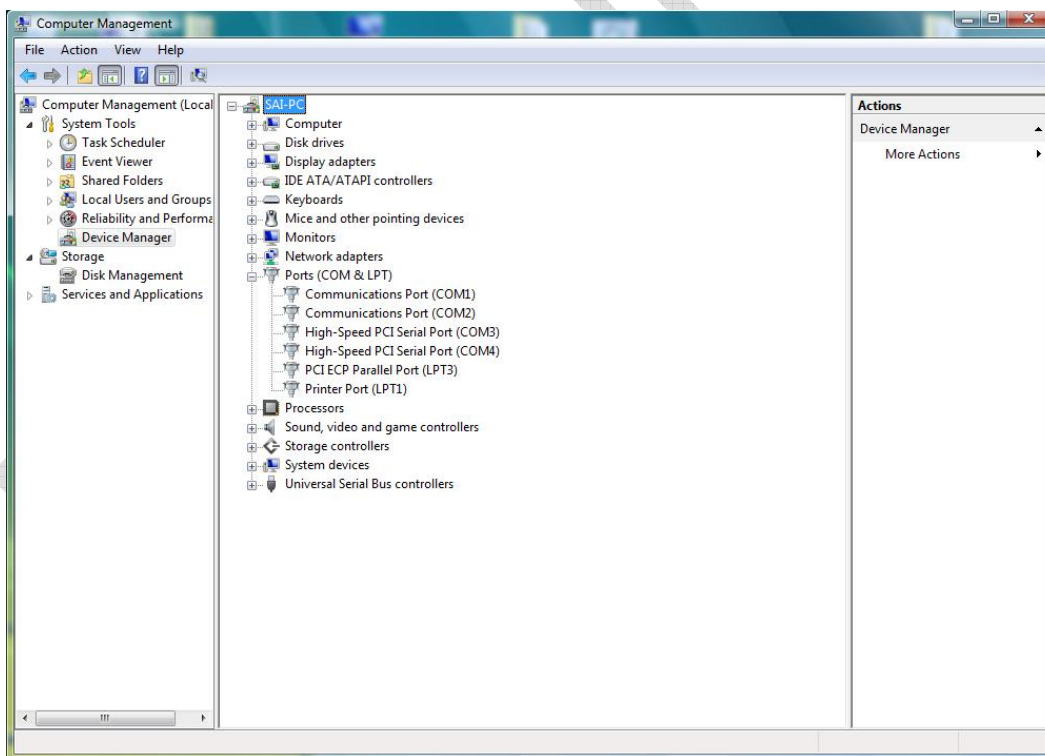Once the system gets booted we can find the installation of the driver's status.



Click on the popup to check the installed driver's status.

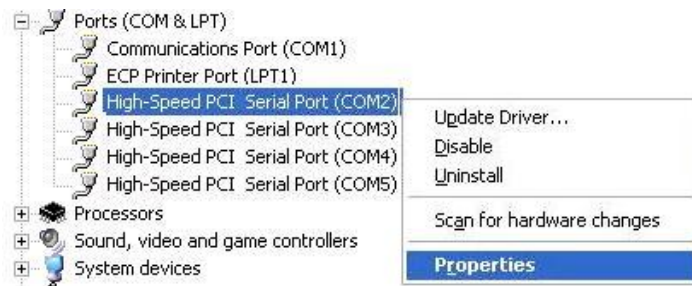## 4. Verifying Driver Installation

Please check the required configuration from Device Manager to confirm the proper installation.

For Example proper detection of the MCS9865 PCI Card (2 Serial + 1 Parallel) can be confirmed by viewing the Device manager as shown below:
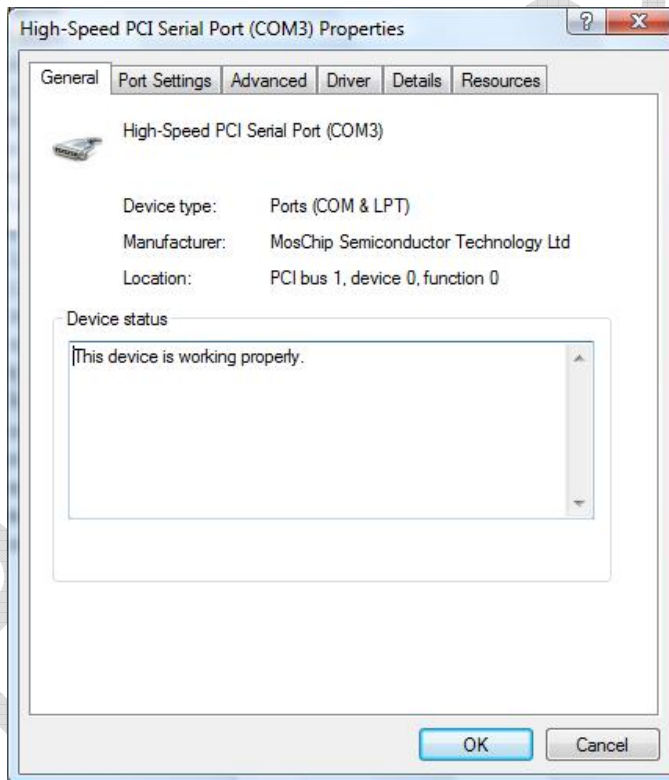
## 5. Serial Port Properties Sheet:

In the Device Manager Right Click on required Port and click on "**Properties**" Option to open the Properties page.
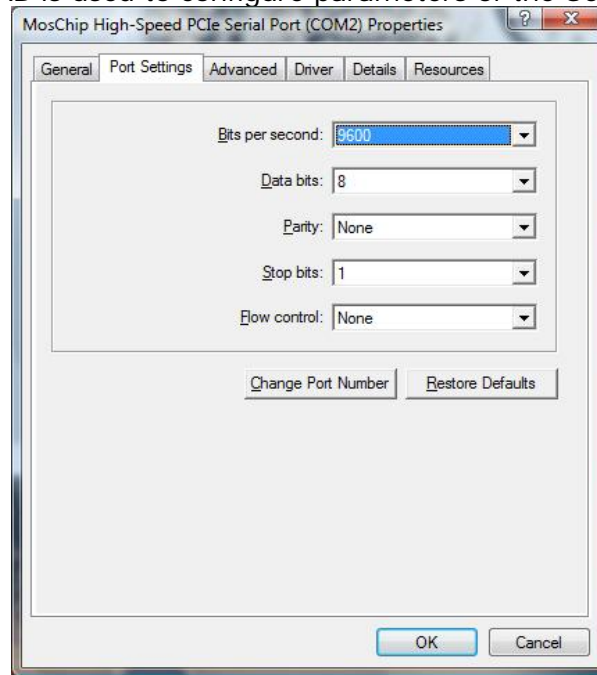
**General TAB :**

The **"General"** TAB provides you details about "Device Type", "Manufacturer" and "Device Status".

**Port Settings TAB:**
The "**Port Settings"** TAB is used to configure parameters of the Serial Port.



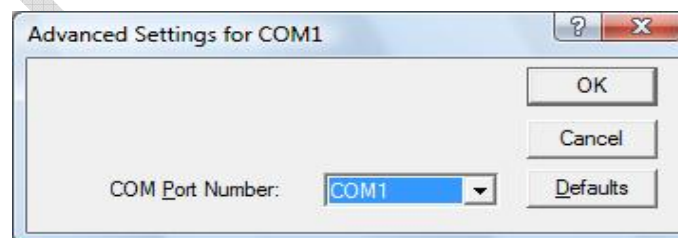**Bits per Second** selection is used to set the default Baud rate settings.
**Data bits** selection will have options 4,5,6,7 and 8 data bits.
**Parity** selection will have Even,Odd, None, Mark and Space parity settings.
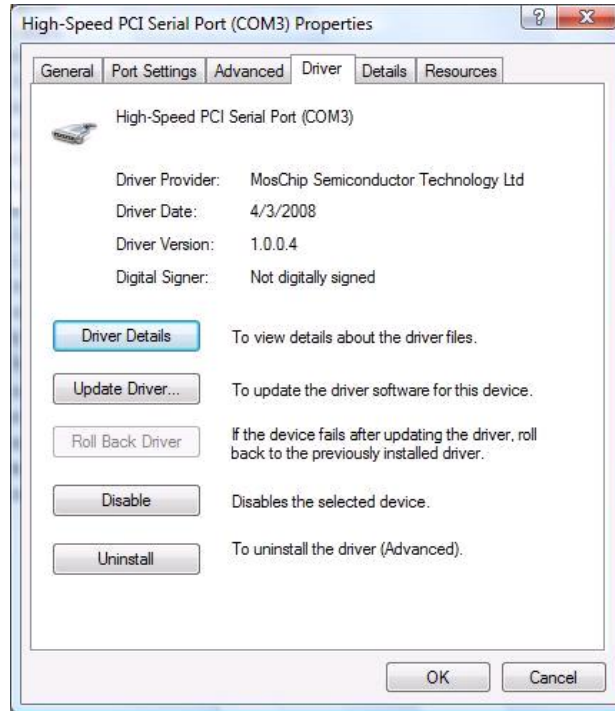**Stop bits** selection will have 1,1.5 and 2 selections.
**Flow Control** selection will have Xon_Xoff, Hardware and None settings.

If you want to change the Port Number click on "**Change Port Number"** and select the required Port Number as shown below:
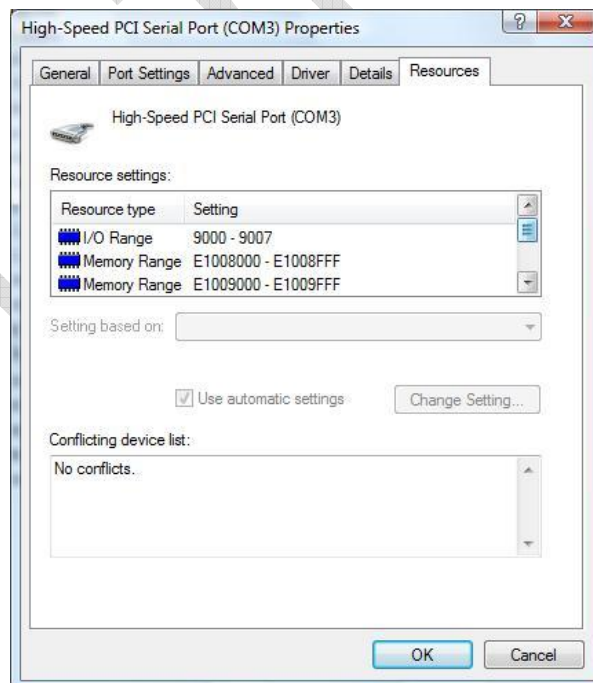
**Driver TAB:**



The **Driver TAB** shows the details of Driver Provider, Driver Release Date, Driver version is installed on your PC and Digital Signer details as shown above.
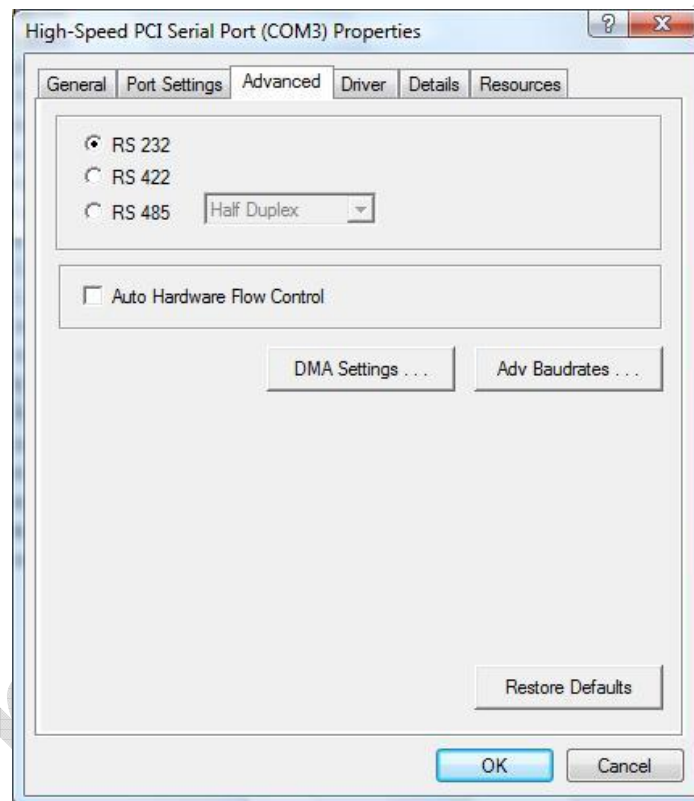
**Resource TAB**:

The **RESOURCE TAB** gives the details of IRQ, IO Ranges and Memory ranges that are assigned to a particular Serial Port.

**ADVANCED TAB** allows the user to configure Serial Port Features and Mode changes as explained below.

**6. Serial Port Features and Mode Changes:**
By default every serial Port will be in RS 232 Mode.
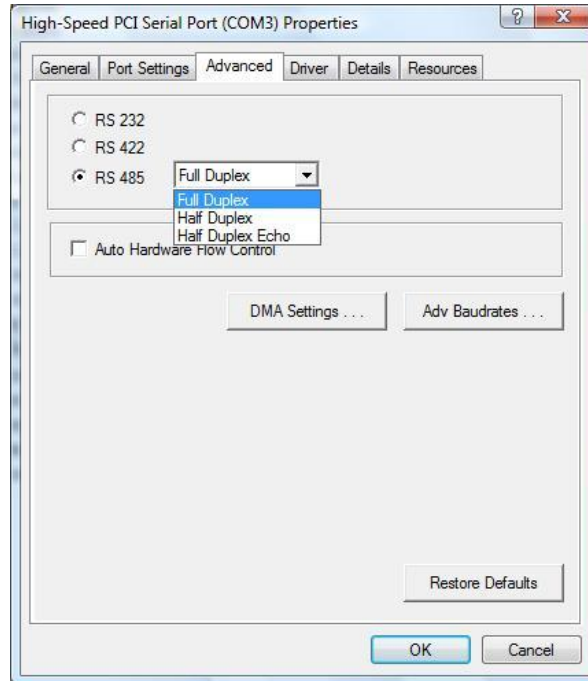If you want to change it into **RS 422** OR **RS 485** Mode select the appropriate Radio button as shown below:



**Selecting RS 422 Mode:**
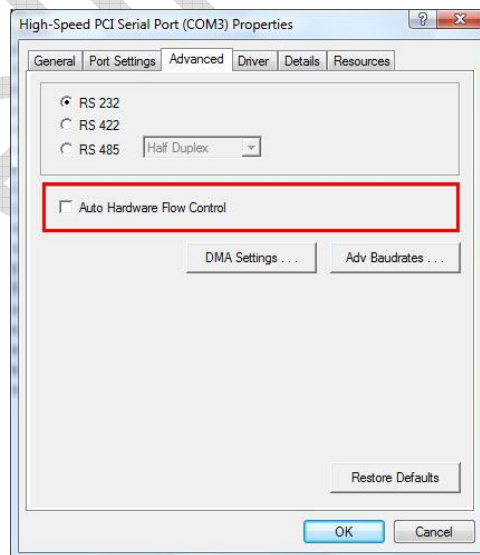Select the **RS 422** Radio button to select the **RS 422** Mode.

**Selecting RS 485 Mode:**
After selecting **RS 485** Radio button you will have different Mode settings like Full Duplex, Half Duplex and Half Duplex Echo. You can select as per your requirement.
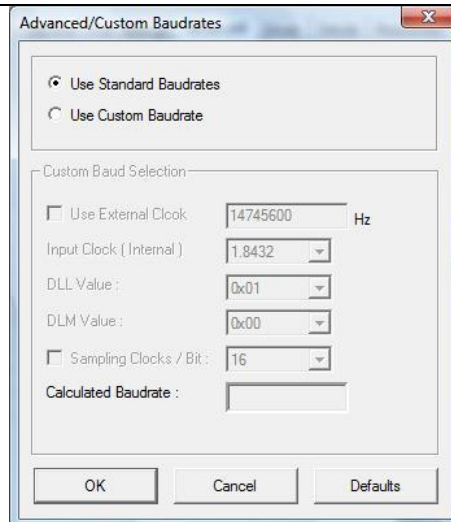
**Selecting Hardware Flow Control:**
To enable Hardware flow control, select the **"Auto Hardware Flow Control".** This enables **RTS / CTS** Hardware Flow control for the selected serial port. This setting is applicable only for **RS 232** Mode only.
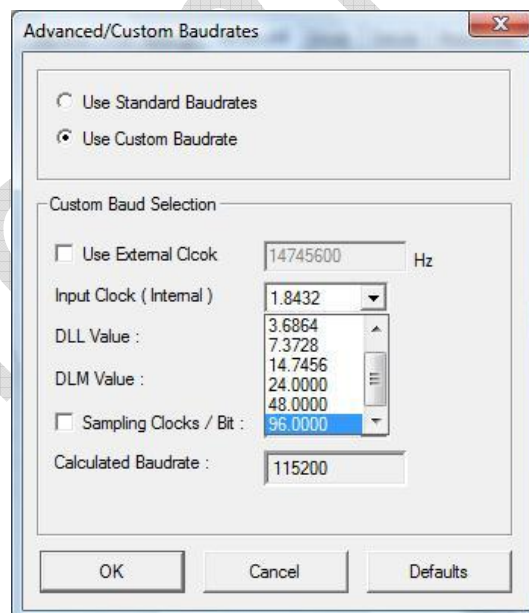


**Configuring Advanced Baud rates:**
To Configure Advanced Baud rates click on "**Adv Baudrates**" button.

By default "**Use Standard Baudrates**" option is Enabled.
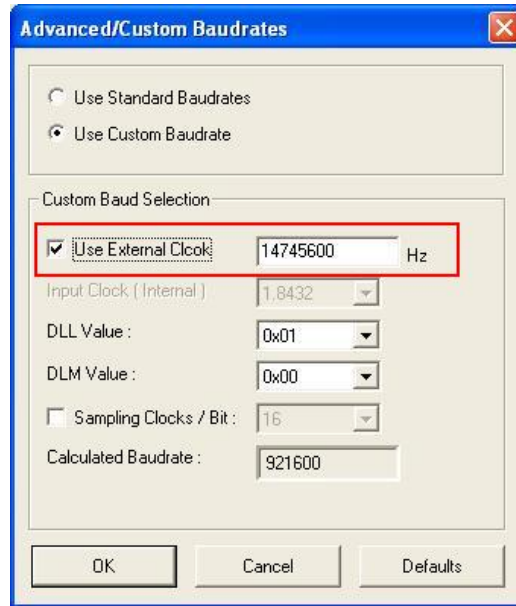To configure custom Baud rate select "**Use Custom Baudrate**".

**Note**: When "**Use Custom Baudrate"** is selected, Serial Port baudrate is independent of the value set in the Application

**Input clock:**



Custom baud rates can be obtained by selecting required **External Clock, Input clock, DLL DLM** and **sampling clock** Values. The calculated baud rate will be shown in the Text Box provided for it.

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If you are using External Clock in the MCS9865 Card, please select the External clock check box and enter the appropriate clock value as shown below.
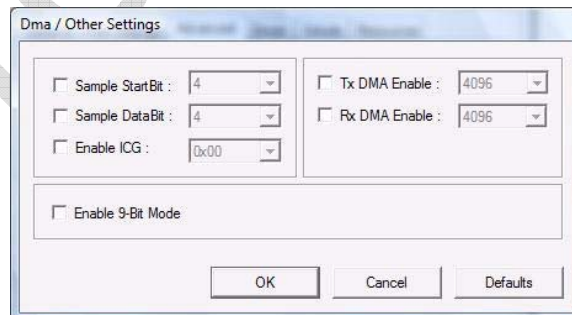


By depending on the External clock value entered "**Calculated Baud rate**" will be generated.

To calculate the custom bauds please refer **Custom Baud Application Note** OR contact **techsupport@moschip.com.**

**7. Direct Memory Access (DMA):**
**Selecting DMA mode:**
For Selecting DMA Mode click on **DMA Settings** on Advanced TAB as shown below:



→To enable DMA Mode selects "**Tx DMA Enable**" and "**Rx DMA Enable**" check box options.
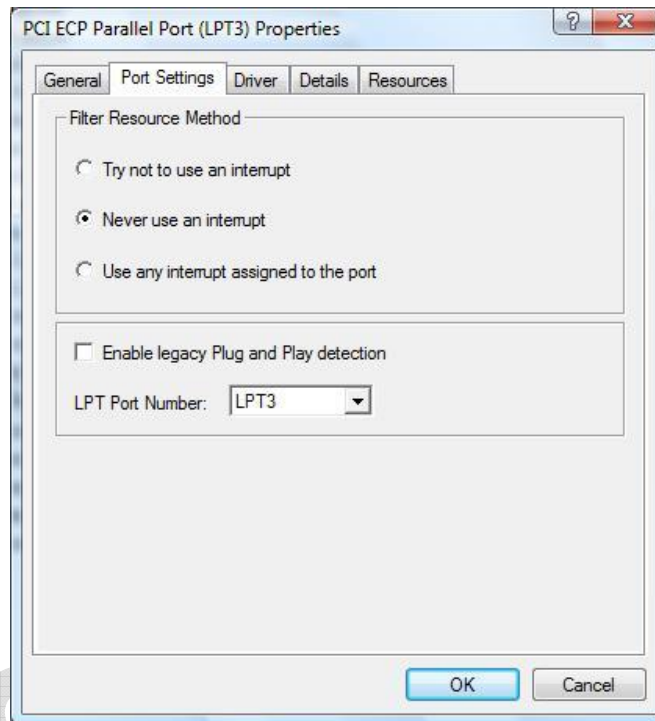
→Suitable value for **Inter Character Gap (ICG)** has to be set for special application like RAID controller devices.

→To Enable 9bit Mode support, Select "**Enable 9-Bit Mode"**.

**8. Parallel Port Features and Mode Changes:**

**Parallel Port Features:**
Parallel port will support SPP/CBFIFO/ECP/EPP modes. By default Parallel Port will be in **AUTO** mode. In this mode, Parallel port mode will be automatically configured to the required mode after handshaking with the connected device.



**9. Uninstalling Drivers:**

To Uninstall MCS9865 drivers, run "**MOSCHIP_PCIUninst.exe"** file available in the driver disk.

**Note**: Make sure that you should uninstall any previous driver before installing updated drivers.

## 10. Suggestions / Support:

If you have any suggestions OR any doubts please feel free to contact
**techsupport@moschip.com**