

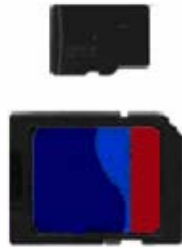
VP-25A1 Quick Start

Version 1.0, 2012/03/14

➔ What's In the Box?



VP-25A1 & Touch Pen



microSD card



Screw Driver



Software Utility CD



RJ-45 Waterproofing Kit



Panel Clips*4

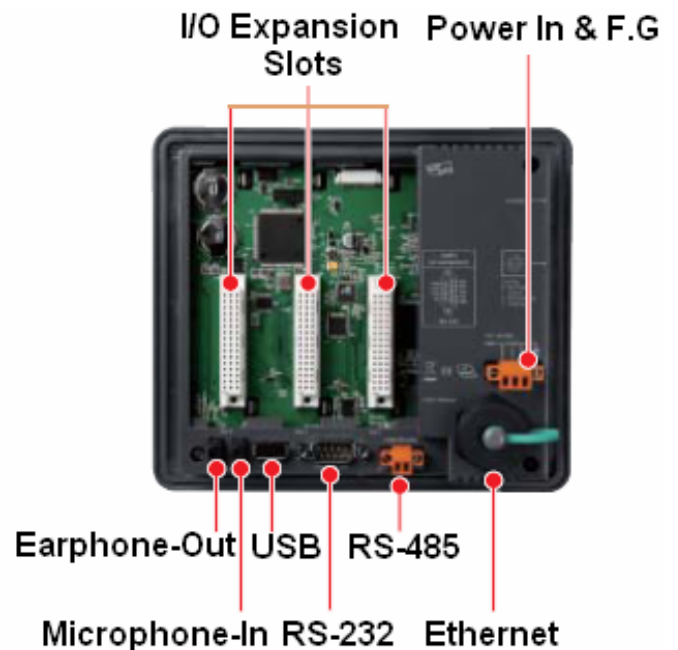
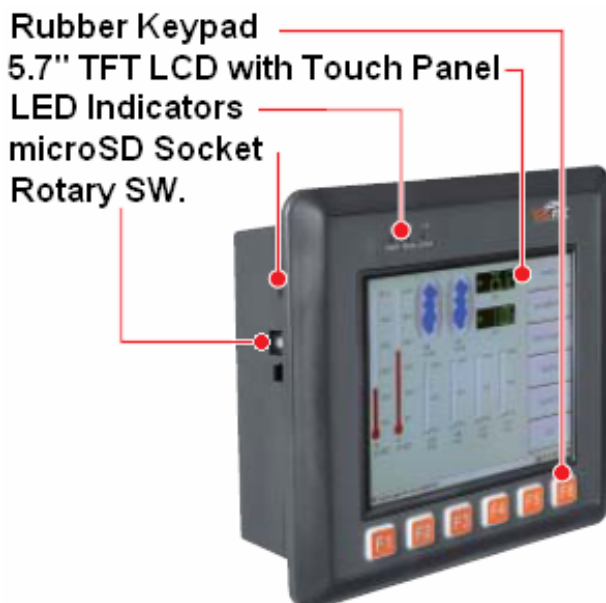


Phillips Screws*4

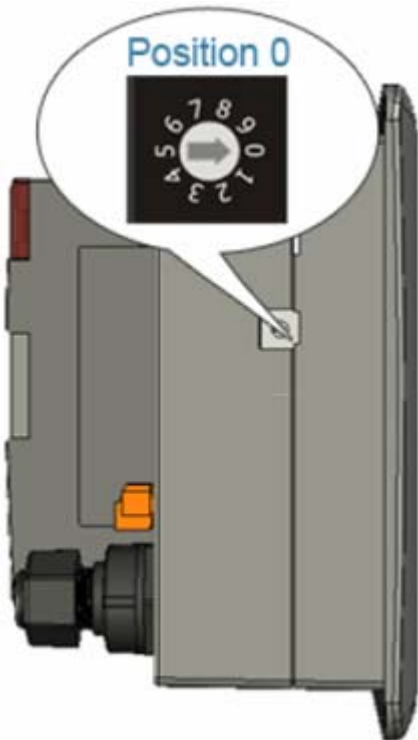


I/O Sockets*3

➔ View of the VP-25A1



➡ Configuring the operating mode



| Rotary switch | Modes of operation |
|---------------|----------------------|
| 0 | Normal mode(Default) |
| 1 | Quick mode |
| 2 | OS update mode |
| 3 | Debug mode |
| Others | Reserved |

Normal mode(Default)

The normal mode is the default mode of operation. Use this mode for more tasks and configurations. Programs also are executed in this mode.

Quick mode

The safe mode is used to skip the VP-25A1 boot screen form microSD or microSDHC card, so as to speed up the booting process.

OS update mode

The mode is a way used to update OS, and the Linux OS image was just suitable for the VP-25A1 by ICP DAS. If the VP-25A1 cannot be boot or run the normal mode, please update OS image again. Please pay attention to backup important files first before updating OS image. For more detail information, please refer to “VP-25A1 OS image update manual”.

Debug mode

The purpose of this mode is to development by ICP DAS.

Reserved

Rotary switch position 4~9 are reserved by ICP DAS.

➔ Preparation Steps for Android SDK

① Prepare your development computer

Install any additional software needed before downloading the Android SDK. In particular, you may need to install the JDK (version 5 or 6 required) and Eclipse (needed only if you want develop using the ADT Plugin).

JDK➔ <http://www.oracle.com/technetwork/java/javase/downloads/index.html>

Eclipse➔ <http://www.eclipse.org/downloads/>

② Download and install the SDK starter package

To install the SDK, simply unpack the starter package to a safe location and then add the location to your PATH.

Android SDK➔ <http://developer.android.com/sdk/index.html>

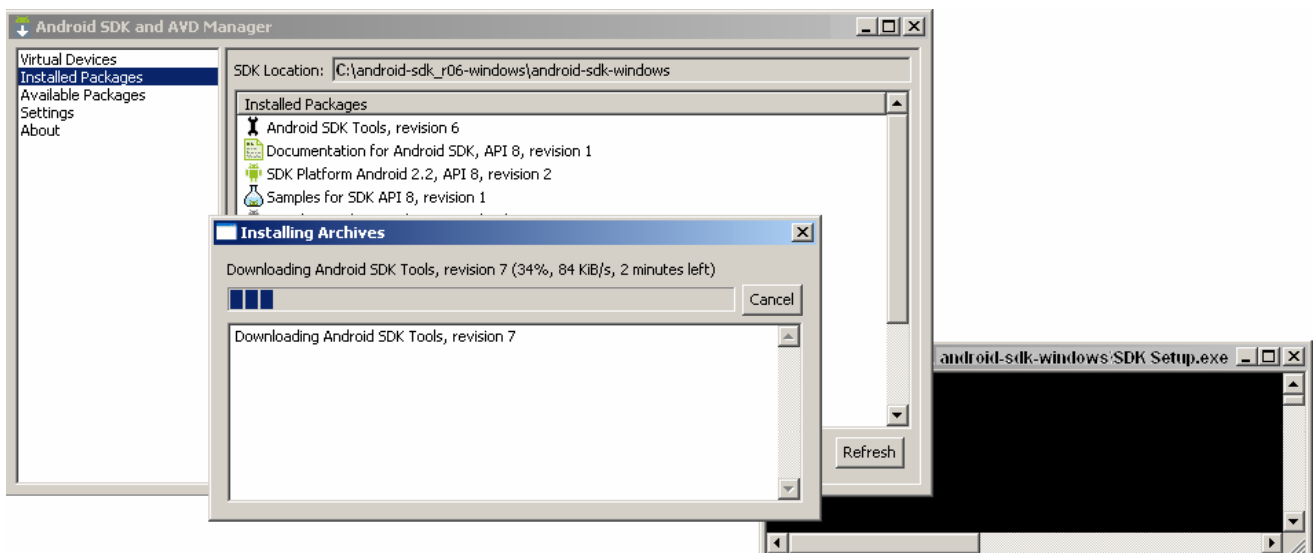


③ Install the ADT Plug-in for Eclipse

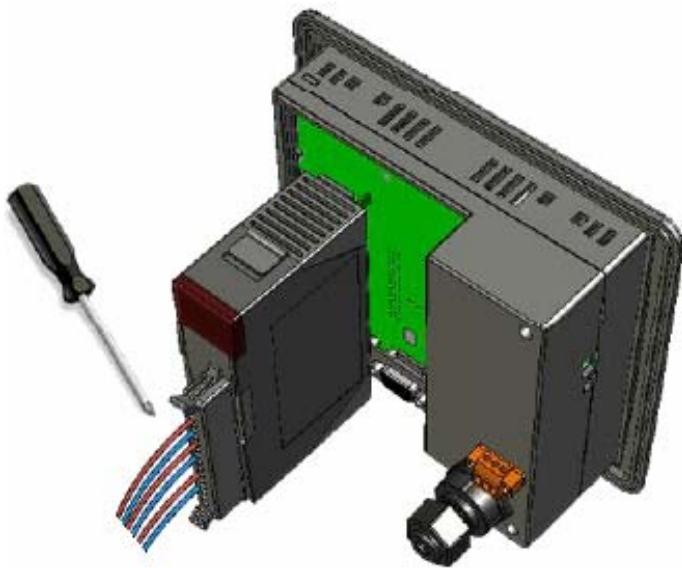
Install the Android Development Tools (ADT) Plug-in, restart Eclipse, and set the "Android" preferences in Eclipse to point to the SDK install location.

④ Add Android platforms and other components to your SDK

To launch the Android SDK and AVD Manager on Windows, execute **SDK Setup.exe**, at the root of the SDK directory. On Mac OS X or Linux, execute the android tool in the `<sdk>/tools/` folder.



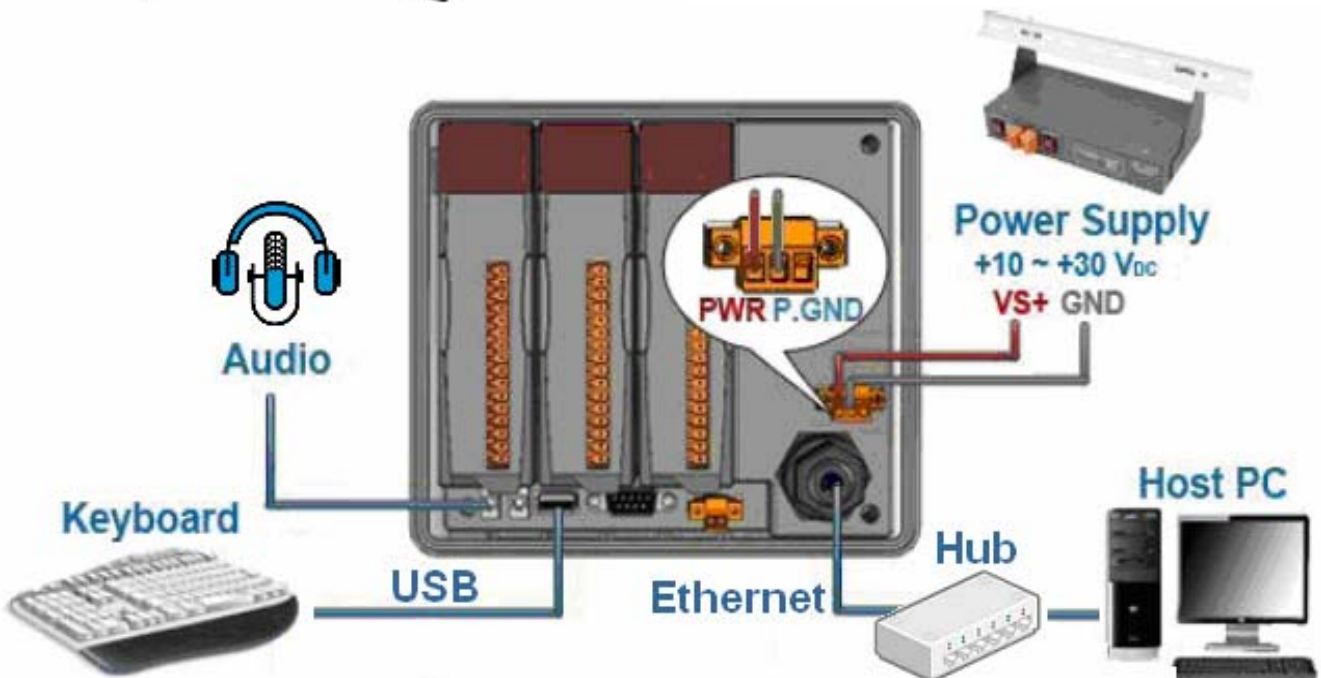
➔ Get Started



1 Inserting I/O modules
(Only high profile I-8K and I-87K modules can be plugged)

2 Connect to serial port device (COM2/3 port) if necessary

3 Connect to Ethernet cable

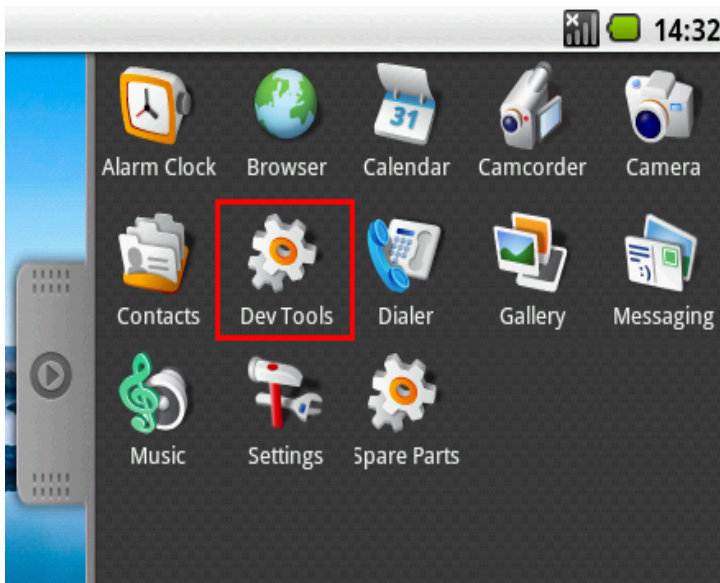


4 Make sure the rotary switch is placed in the “0” position

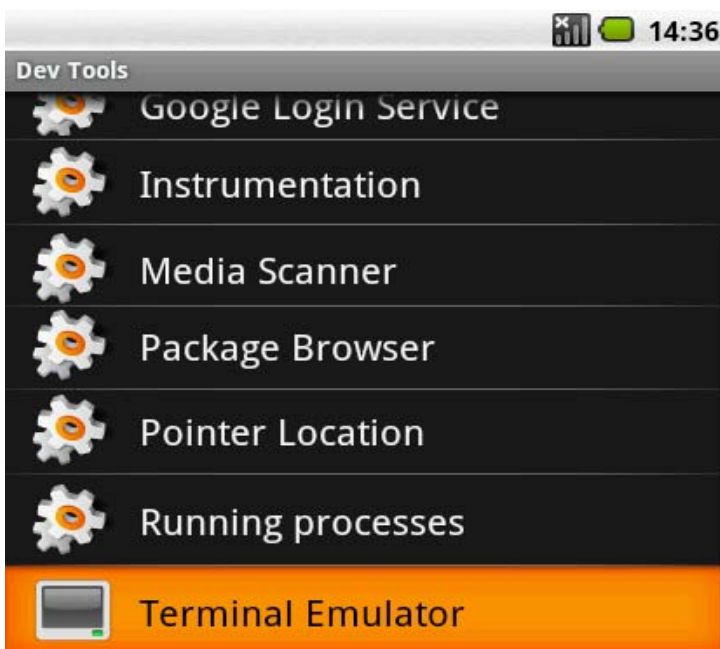
5 Setting up the power supply

6 Powering the VP-25A1

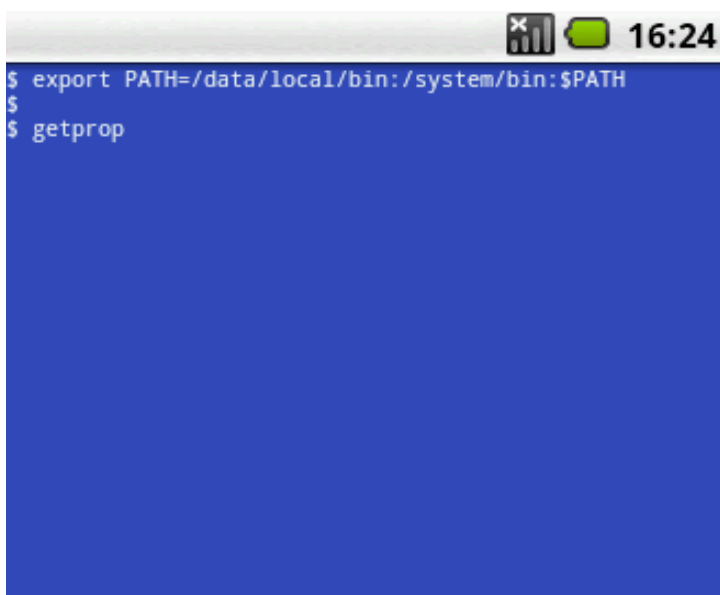
➔ Connect to VP-25A1 using ADB tools



1 Go to Applications Menu ➔ Dev Tools



2 Press Terminal Emulator



3 Enter the command 'getprop' to get properties

④ Find the IP address of eth0 of VP-25A1

```
EXTERNAL_STORAGE_STATE]: [mounted]
dhcp.eth0.pid]: [2082]
dhcp.eth0.reason]: [BOUND]
dhcp.eth0.dns1]: [10.0.0.3]
dhcp.eth0.dns2]: [10.0.0.9]
dhcp.eth0.dns3]: []
dhcp.eth0.dns4]: []
dhcp.eth0.ipaddress]: [10.1.0.54]
dhcp.eth0.gateway]: [10.1.0.254]
dhcp.eth0.mask]: [255.255.0.0]
dhcp.eth0.leasetime]: [172800]
dhcp.eth0.server]: [10.0.0.1]
dhcp.eth0.result]: [ok]
net.dns1]: [168.95.1.1]
net.dns2]: [168.95.92.1]
wifi.interface]: [eth1]
wlan.interface]: [eth1]
wlan.driver.status]: [ok]
init.svc.bootanim]: [stopped]
hw.keyboards.65538.devname]: [gpio-keys]
hw.keyboards.65539.devname]: [pxa27x-keypad]
hw.keyboards.65540.devname]: [BTC USB Multimedia Keyboard]
hw.keyboards.65541.devname]: [BTC USB Multimedia Keyboard]
sys.settings_secure_version]: [2]
dev.bootcomplete]: [1]
sys.settings_system_version]: [6]
gsm.sim.operator.numeric]: []
gsm.sim.operator.alpha]: []
gsm.sim.operator.iso-country]: []
gsm.sim.state]: [UNKNOWN]
gsm.current.phone-type]: [1]
gsm.operator.alpha]: []
gsm.operator.numeric]: []
gsm.operator.iso-country]: []
gsm.operator.iso-roaming]: [false]
adb.connected]: [1]
# getprop
```

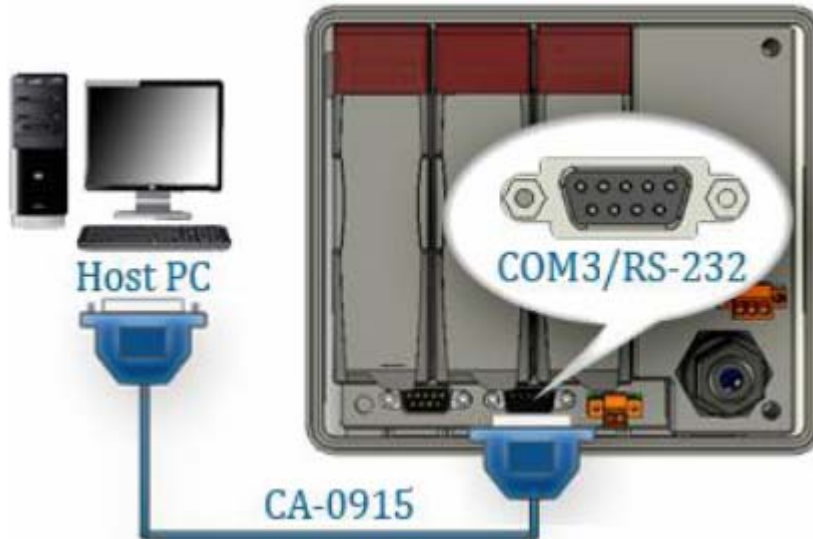
```
[dhcp.eth0.dns1]: [10.0.0.3]
[dhcp.eth0.dns2]: [10.0.0.9]
[dhcp.eth0.dns3]: []
[dhcp.eth0.dns4]: []
[dhcp.eth0.ipaddress]: [10.1.0.54]
[dhcp.eth0.gateway]: [10.1.0.254]
[dhcp.eth0.mask]: [255.255.0.0]
[dhcp.eth0.leasetime]: [172800]
[dhcp.eth0.server]: [10.0.0.1]
```

⑤ Trying adb shell

```
C:\> ViewPAC-2000 Working Environment
D:\android-sdk-windows\tools> adb connect 10.1.0.54:5555
* daemon not running. starting it now *
* daemon started successfully *
connected to 10.1.0.54:5555
D:\android-sdk-windows\tools> adb shell
# ls
ls
<[1;34mcache<[0m          <[0;0minit.goldfish.rc<[0m  <[1;34mproc<[0m
<[1;34mdata<[0m                <[0;0minit.pac.rc<[0m        <[1;34msbin<[0m
<[0;0mdefault.prop<[0m      <[1;32minit.pac.sh<[0m       <[1;34msdcard<[0m
<[1;34mdev<[0m                 <[0;0minit.rc<[0m           <[1;34msqlite_stmt_journals<[0m
<[1;36metc<[0m              <[0;0minitlogo.rle<[0m     <[1;34msys<[0m
<[1;32minit<[0m            <[1;36mllib<[0m             <[1;34msystem<[0m
#
# pwd
pwd
/
#
```

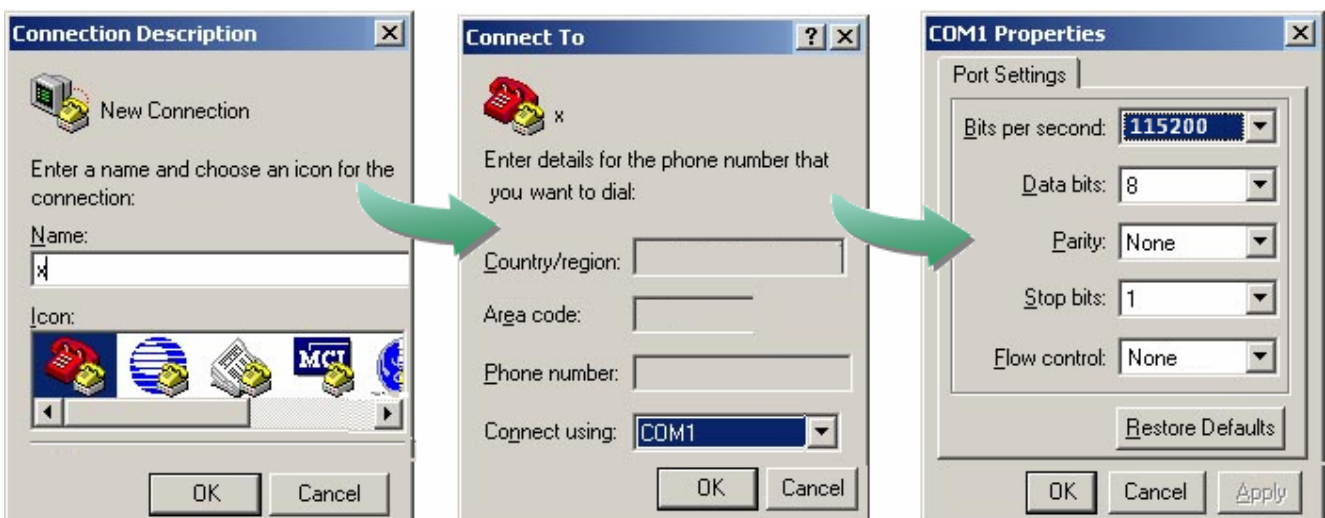
➔ Testing COM3 with Hyperterminal and ADB

- 1 The port is located on the right-upper corner on the VP-25A1. It is a standard RS-232 serial port, and it provides TxD, RxD, GND, non-isolated.



- 2 Start HyperTerminal by clicking on 'Start → Programs → Accessories → Communications → Hyper Terminal'

- 3 In the 'COM properties' dialog box, please set for **115200 bits per second, 8 data bits, no parity, 1 stop bit and no flow control** to set up the communication parameters for the COM1 port, and press 'OK' when done.



④ Open adb shell

```
ViewPAC-2000 Working Environment
# stty -F /dev/ttyS1
stty -F /dev/ttyS1
speed 115200 baud;
intr = ^C; quit = ^\; erase = ^?; kill = ^U; eof = ^D; eol = <undef>;
eol2 = <undef>; start = ^Q; stop = ^S; susp = ^Z; rprnt = ^R; werase = ^W;
lnext = ^V; flush = ^O; min = 1; time = 0;
-brkint -imaxbel
-isig -icanon -ixexten -echo -echoe -echok -echoctl -echoke
#
```

⑤ Type “echo” command in adb shell, and user must be see the output in “Hyper Terminal” of PC

```
ViewPAC-2000 Working En...
# echo com3 > /dev/ttyS1
echo com3 > /dev/ttyS1
# echo com3 > /dev/ttyS1
echo com3 > /dev/ttyS1
# echo RS-232 > /dev/ttyS1
echo RS-232 > /dev/ttyS1
# echo RS-232 > /dev/ttyS1
echo RS-232 > /dev/ttyS1
#
#
```

```
COM1,115200,None,8,1...
DTR com3
RTS com3
RS-232
RS-232
RS-232
```

➔ Technical Support

If any of these items are missing or damaged, contact the local distributors for more information. Save the shipping materials and cartons in case you want to ship in the future.



ICP DAS Website: <http://www.icpdas.com.tw>

ICP DAS Service: service@icpdas.com

service.icpdas@gmail.com