

How to Download the Firmware image over the USB

5/28/2015

Overview of Kiosk2 tools and firmware

- HidApp.exe – the tool that is used for firmware download (Provide this tool to customer as reference only.)
- Two components of the Firmware
 - File Loader – is a main image that can overwrite the Bootloader.
 - Application Image – this is an image of the firmware that is downloaded over the USB interface. This image makes calls to the USB drivers that are contained in the boot-loader.
- Load file order:
 1. File Loader file. (EC8_FL_1_0_1_w_EC9_BL_x_x_x.hex)
 2. Main Image. (EC8_GR2_x_x_Cxx_-rxxxx.hex)

Connect the reader using the USB interface..
Click on “Detect HID Device”

Vivotech Hid USBTool

Kiosk2 USB Tool
V2.0 Copyright (C) 2010 Vivotech

Device Identifier
Vendor ID: 1D5F
Product ID: 0100

Report Options
 Exchange Input/Output Reports
 Control Transfer Only
 Exchange Feature Reports

Vivotech Cnds
Ping command

Write Command Params
RAM Addr: 40002000
Flash Addr: 00010000
Data Size: 00000004
Data: DEADBEEF
Quiet: 0 Debug

Test HID Device
1 Report No.
Once
Continuous
1000 ms Interval

Download File
CANDIDATE.hex

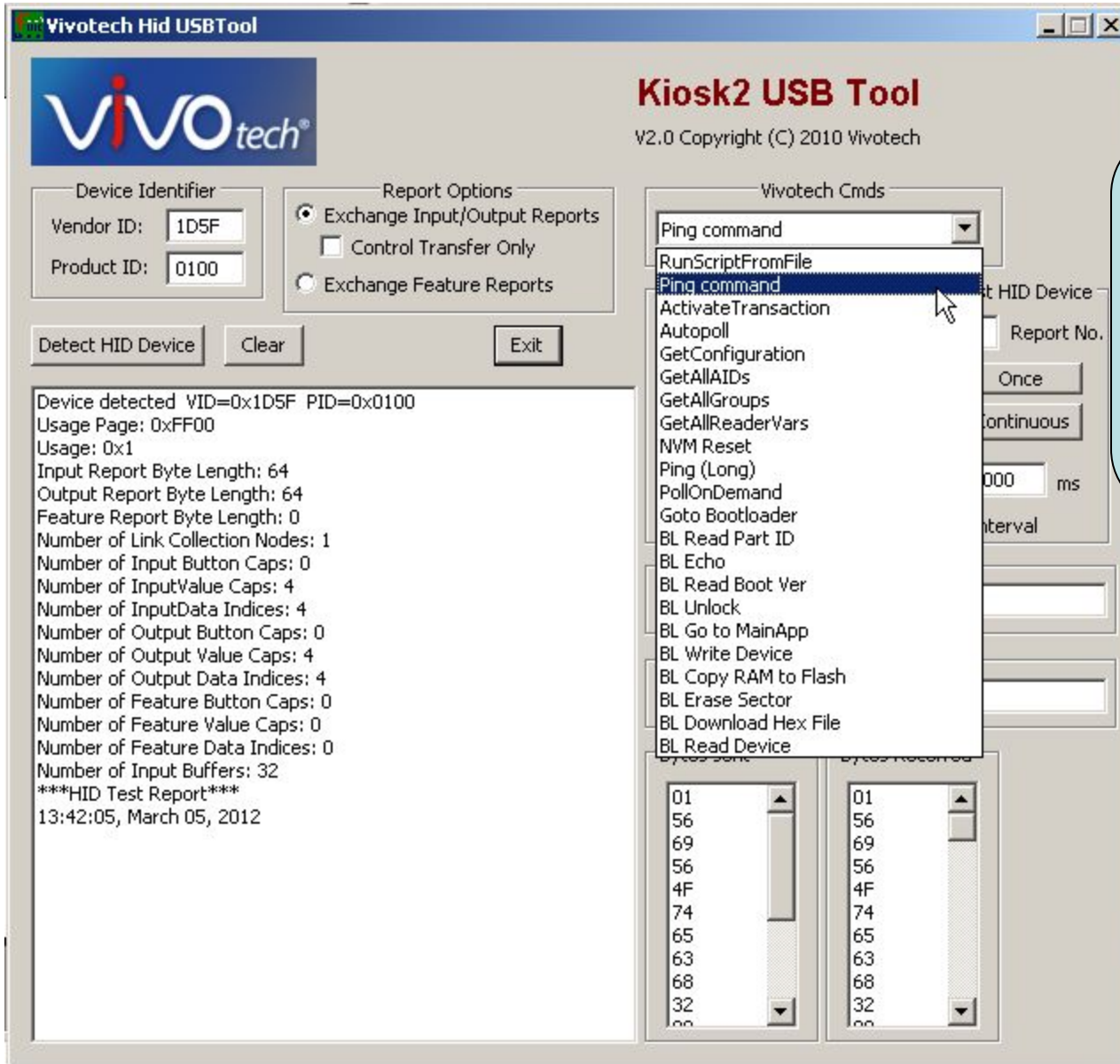
Upoad File
memory_dump.txt

Bytes sent
01
56
69
56
4F
74
65
63
68
32
00

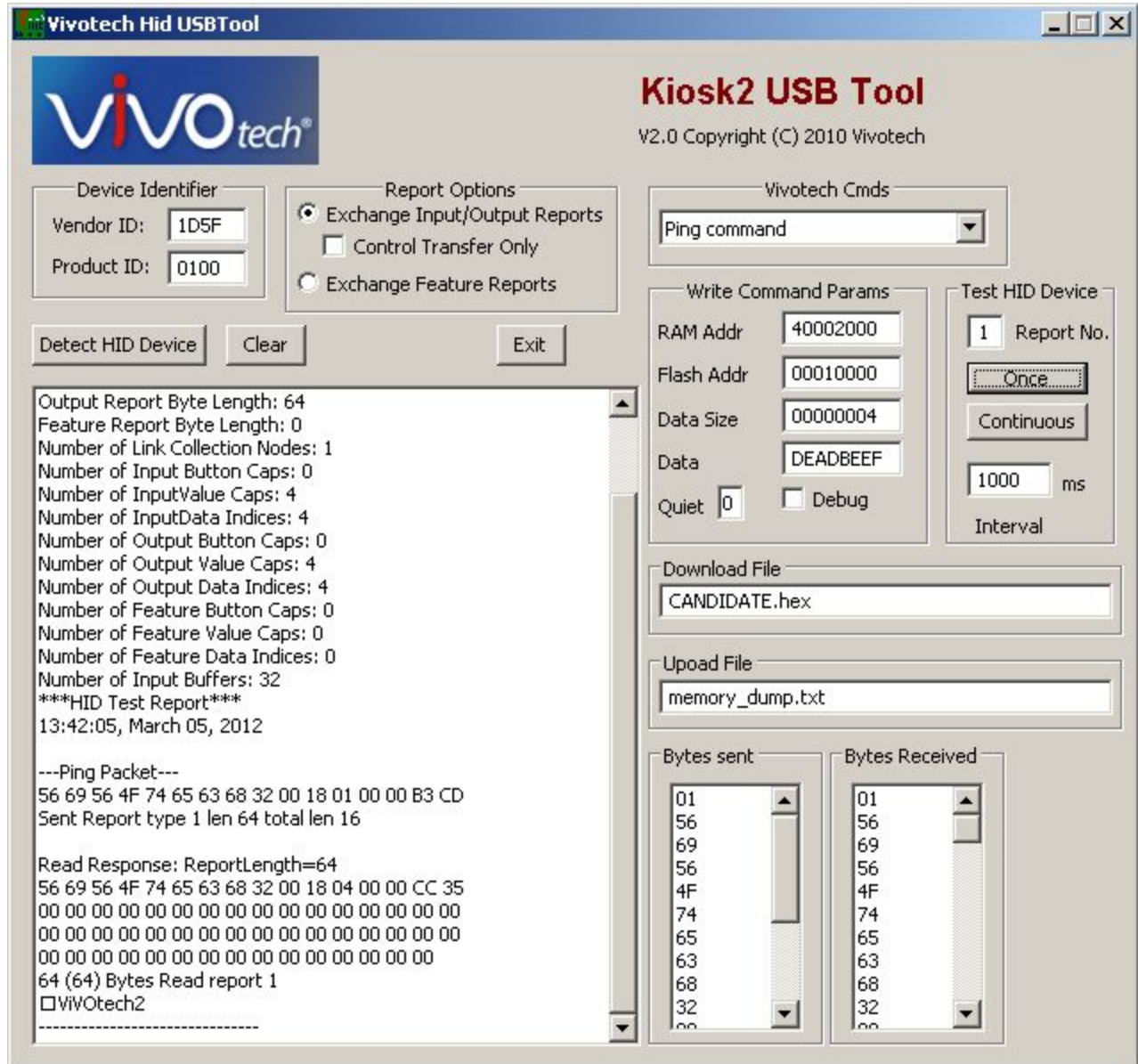
Bytes Received
01
56
69
56
4F
74
65
63
68
32
00

Detect HID Device: Clear Exit

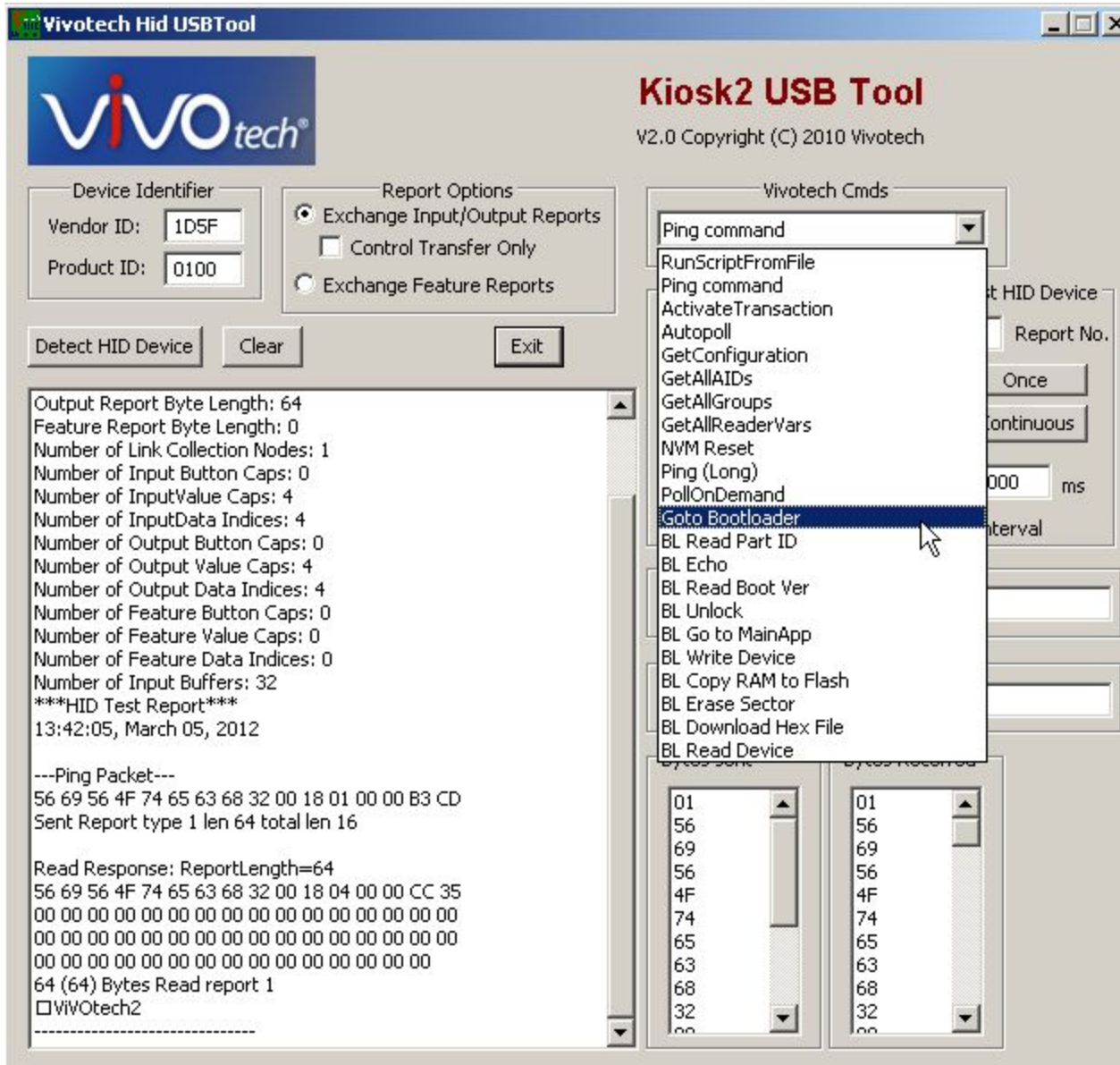
Device detected VID=0x1D5F PID=0x0100
Usage Page: 0xFF00
Usage: 0x1
Input Report Byte Length: 64
Output Report Byte Length: 64
Feature Report Byte Length: 0
Number of Link Collection Nodes: 1
Number of Input Button Caps: 0
Number of InputValue Caps: 4
Number of InputData Indices: 4
Number of Output Button Caps: 0
Number of Output Value Caps: 4
Number of Output Data Indices: 4
Number of Feature Button Caps: 0
Number of Feature Value Caps: 0
Number of Feature Data Indices: 0
Number of Input Buffers: 32
HID Test Report
13:42:05, March 05, 2012



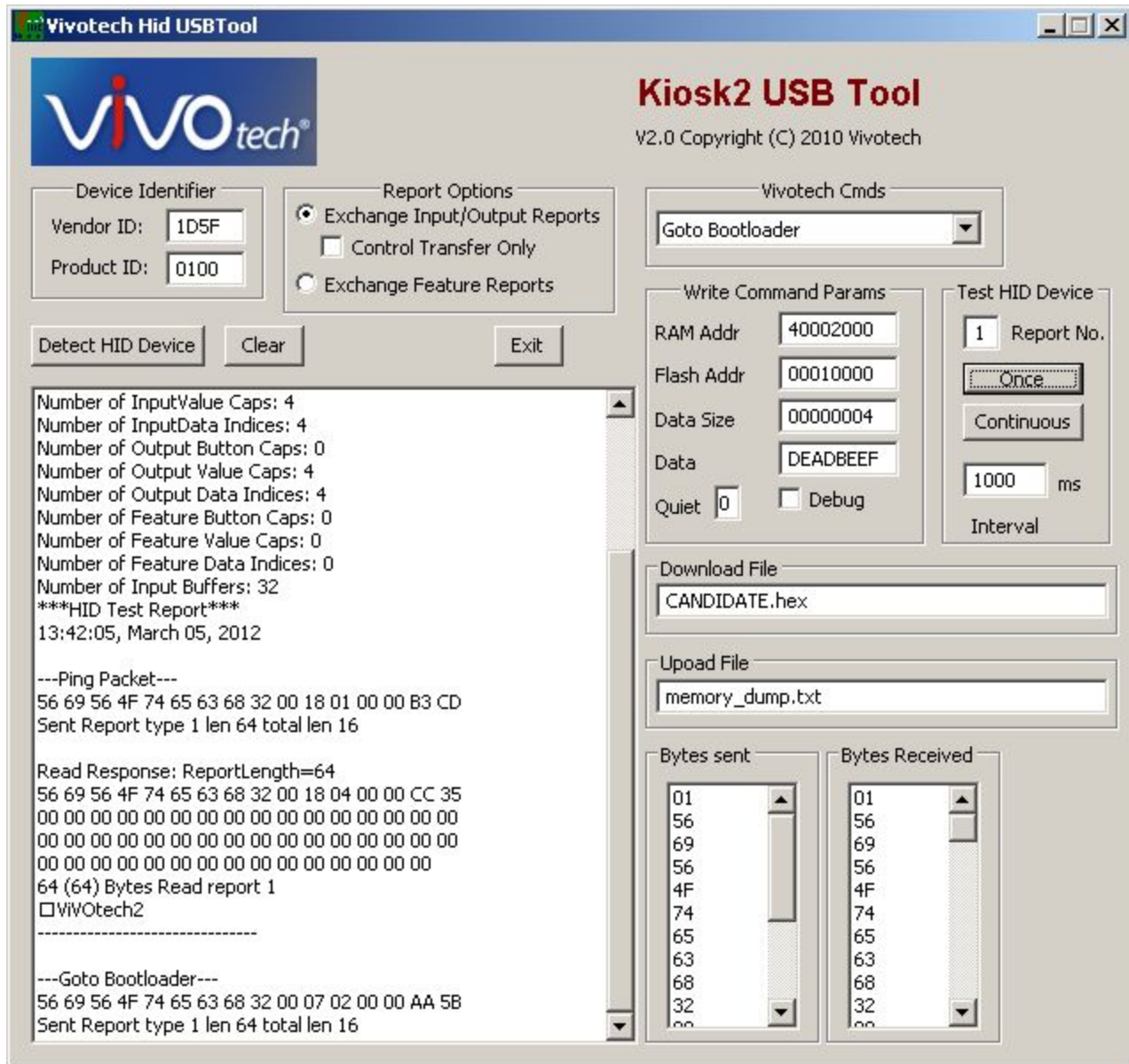
To verify that the reader is communicating, select the “Ping Command” and then click on the “Once” button.



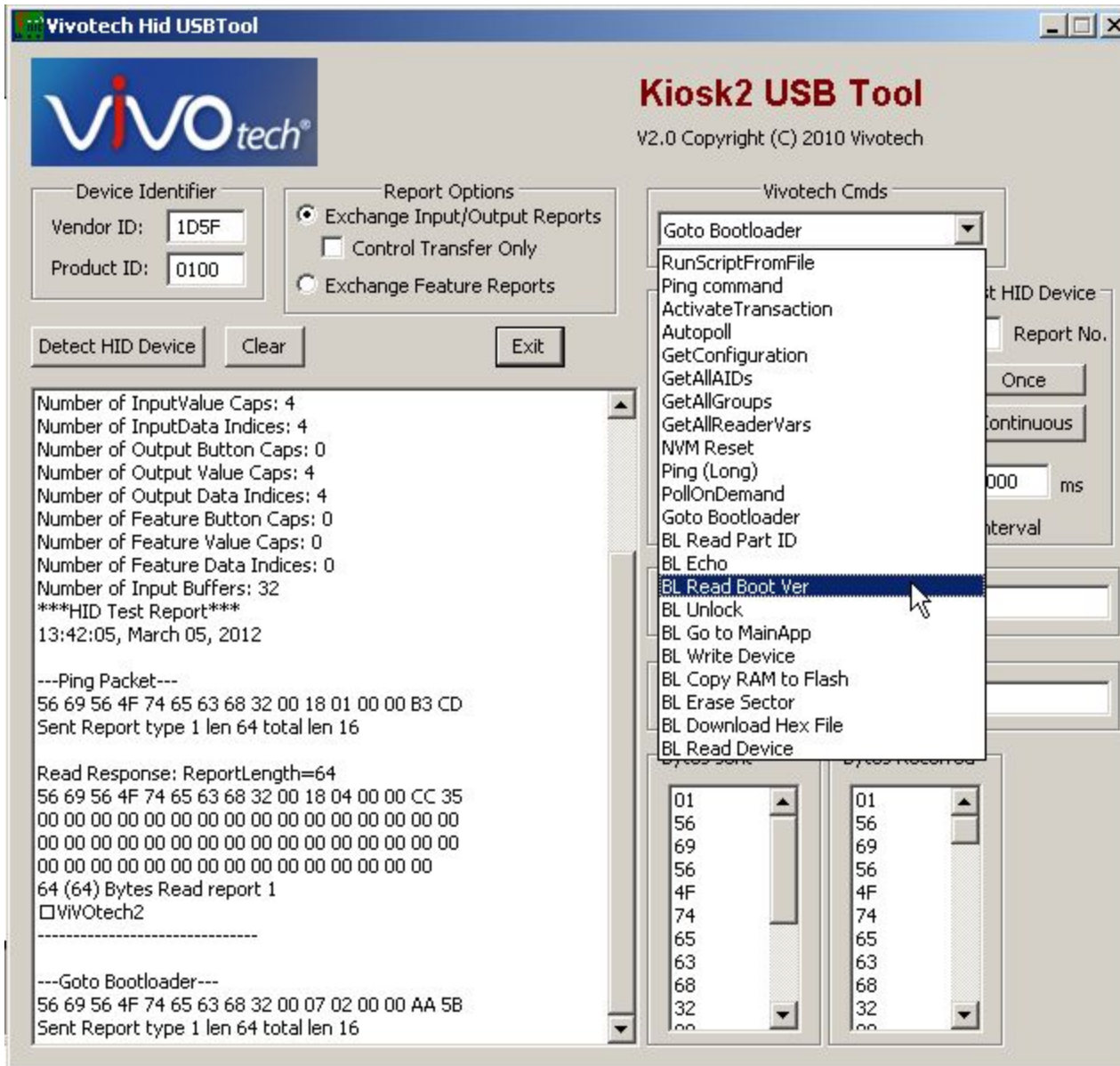
You should see the response to the Ping packet in the window



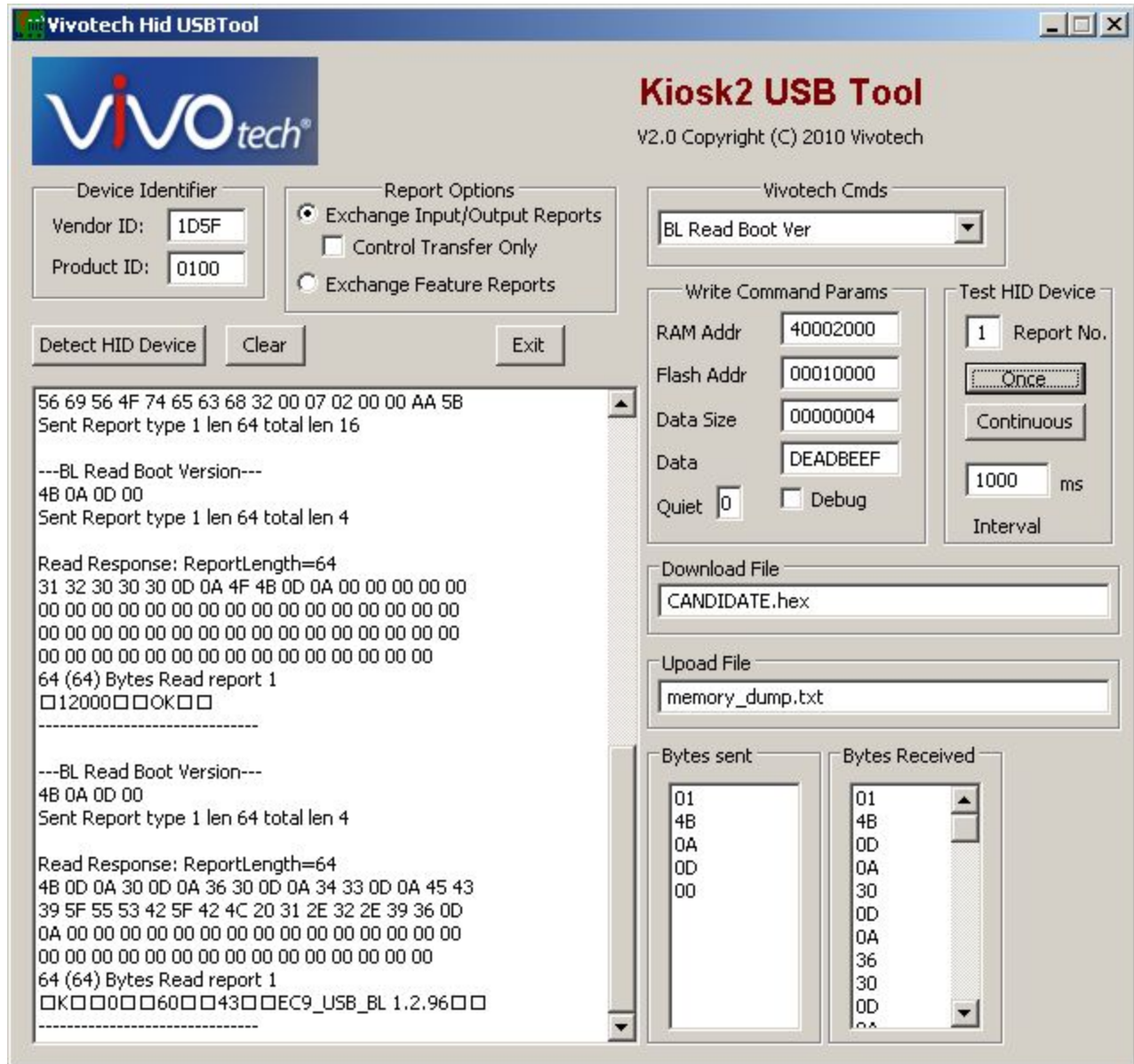
Select the “Goto Bootloader” command and then click on the “Once” button.



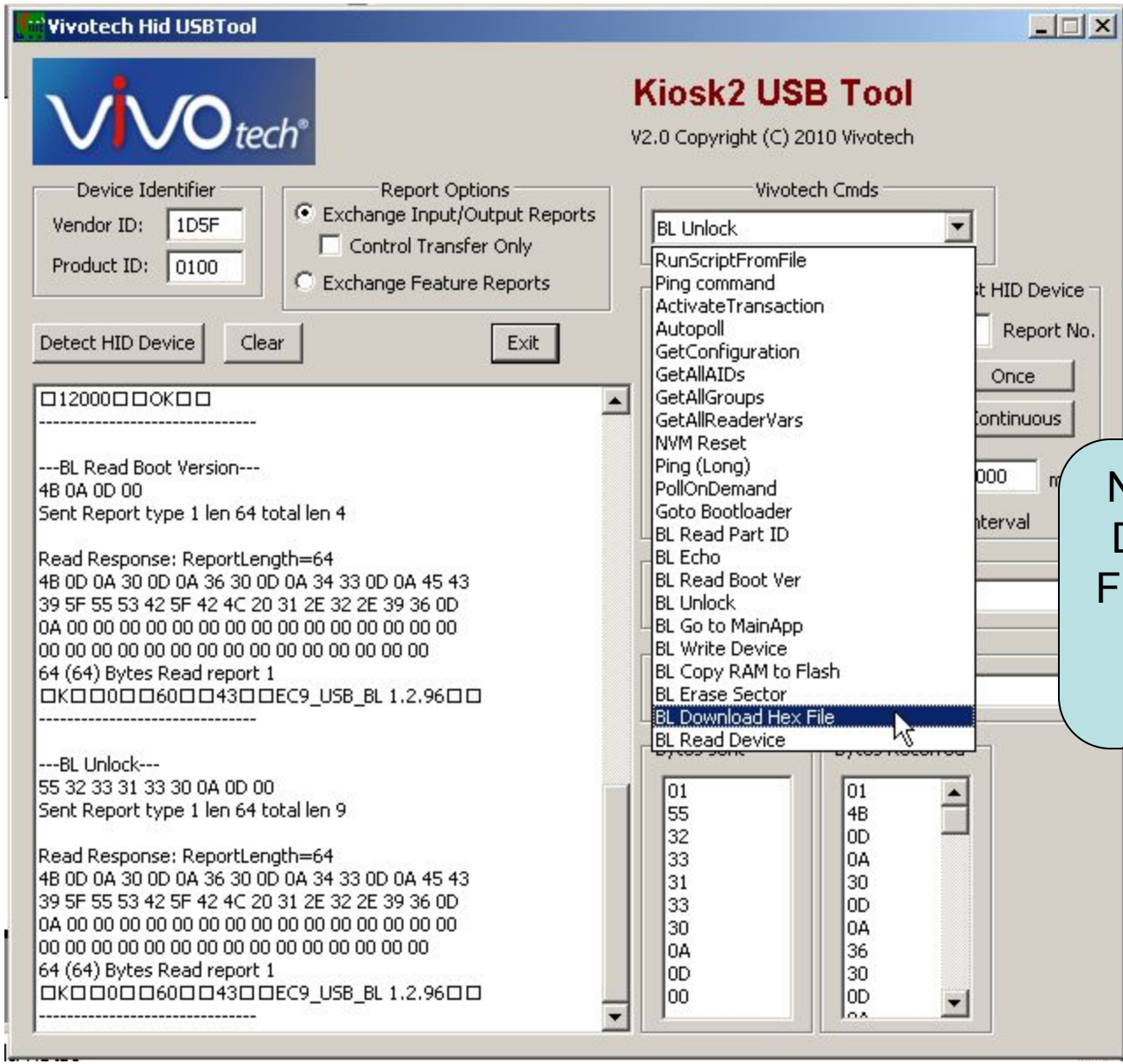
This is what you should see in the window.



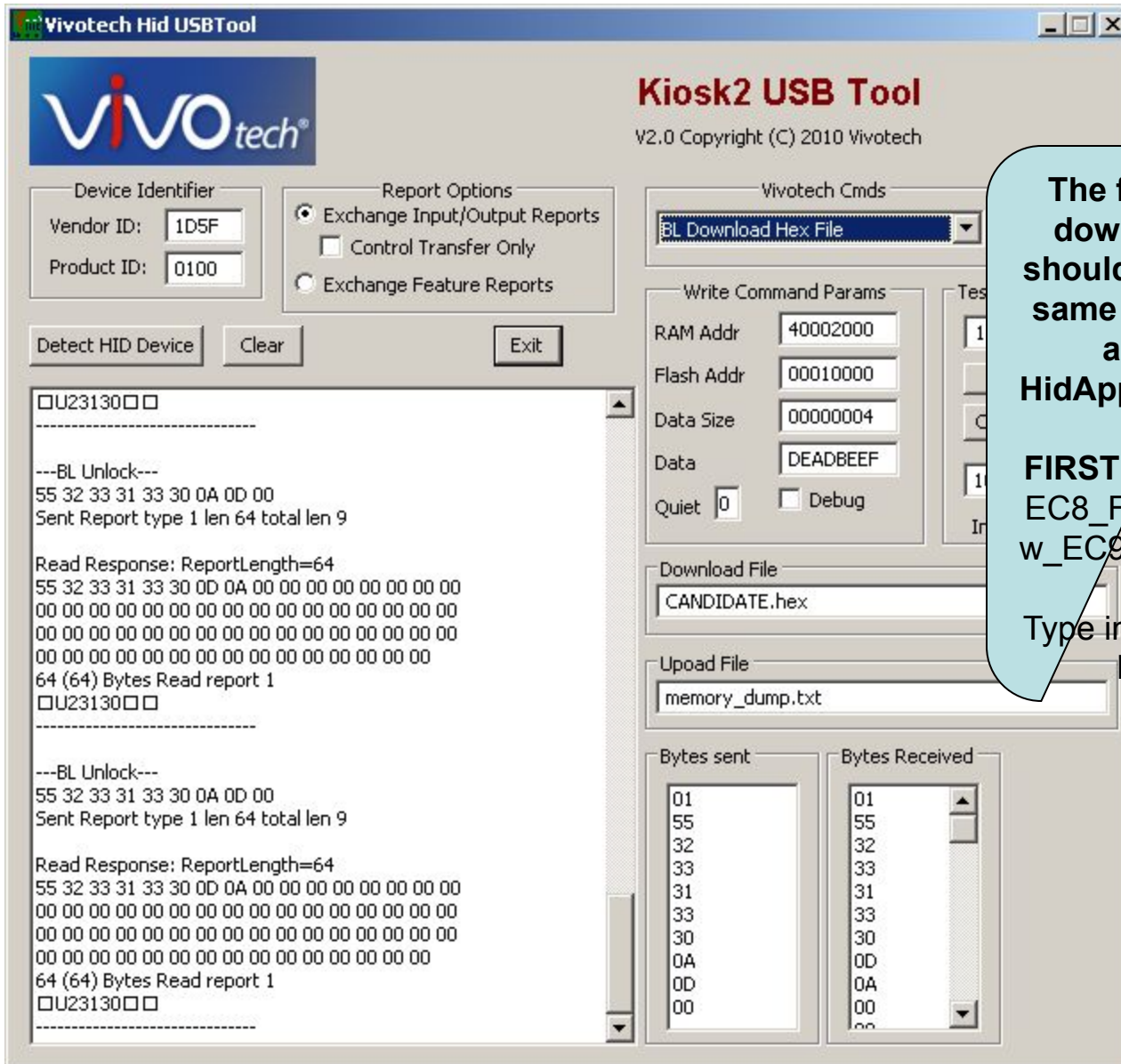
2.) To verify that you are communicating with the Bootloader, click on "BL Read Boot Ver." Then click "Once"



The bootloader version displays in the window.

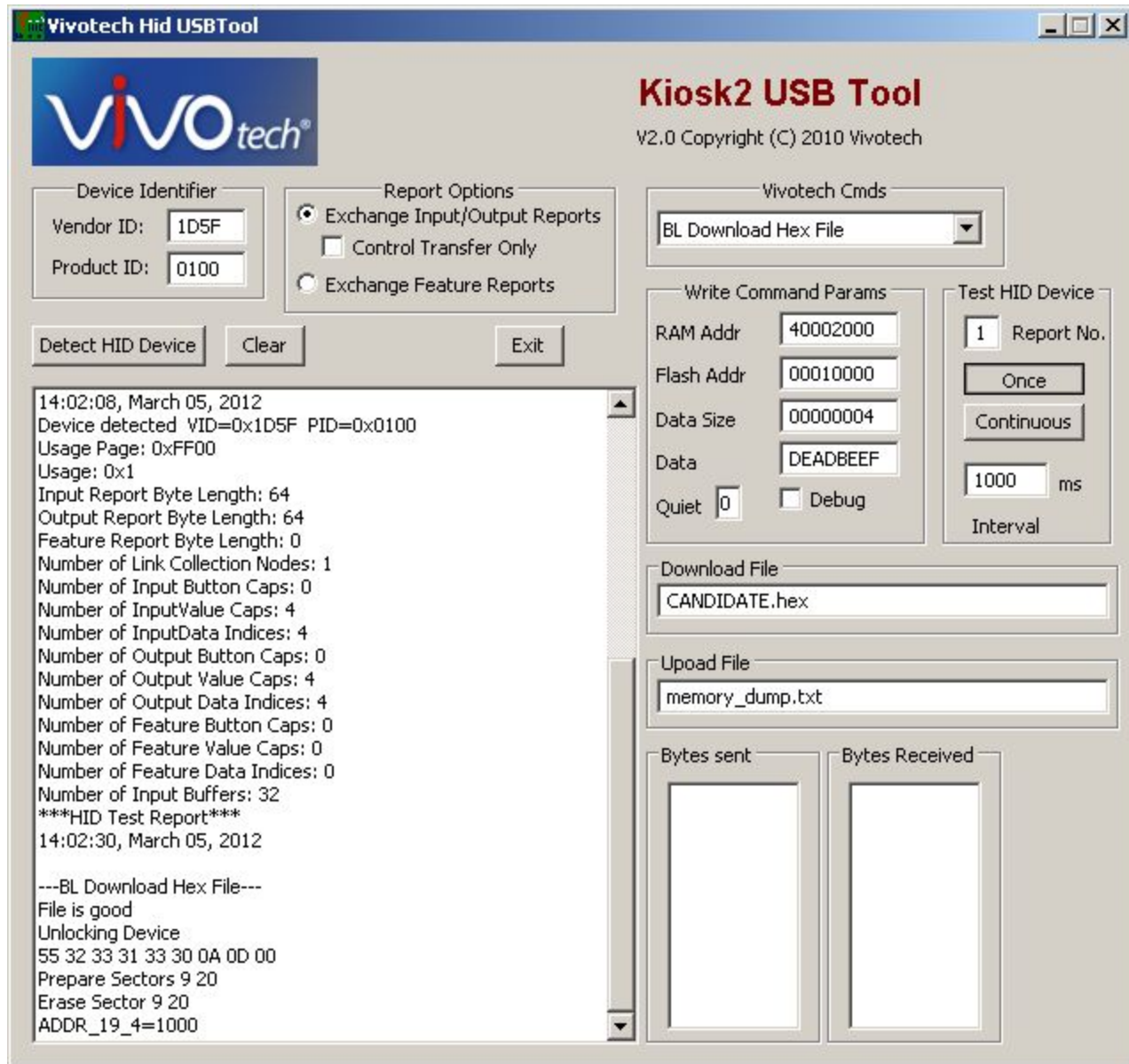


Now select "BL Download Hex File". Then click on the "Once Button".

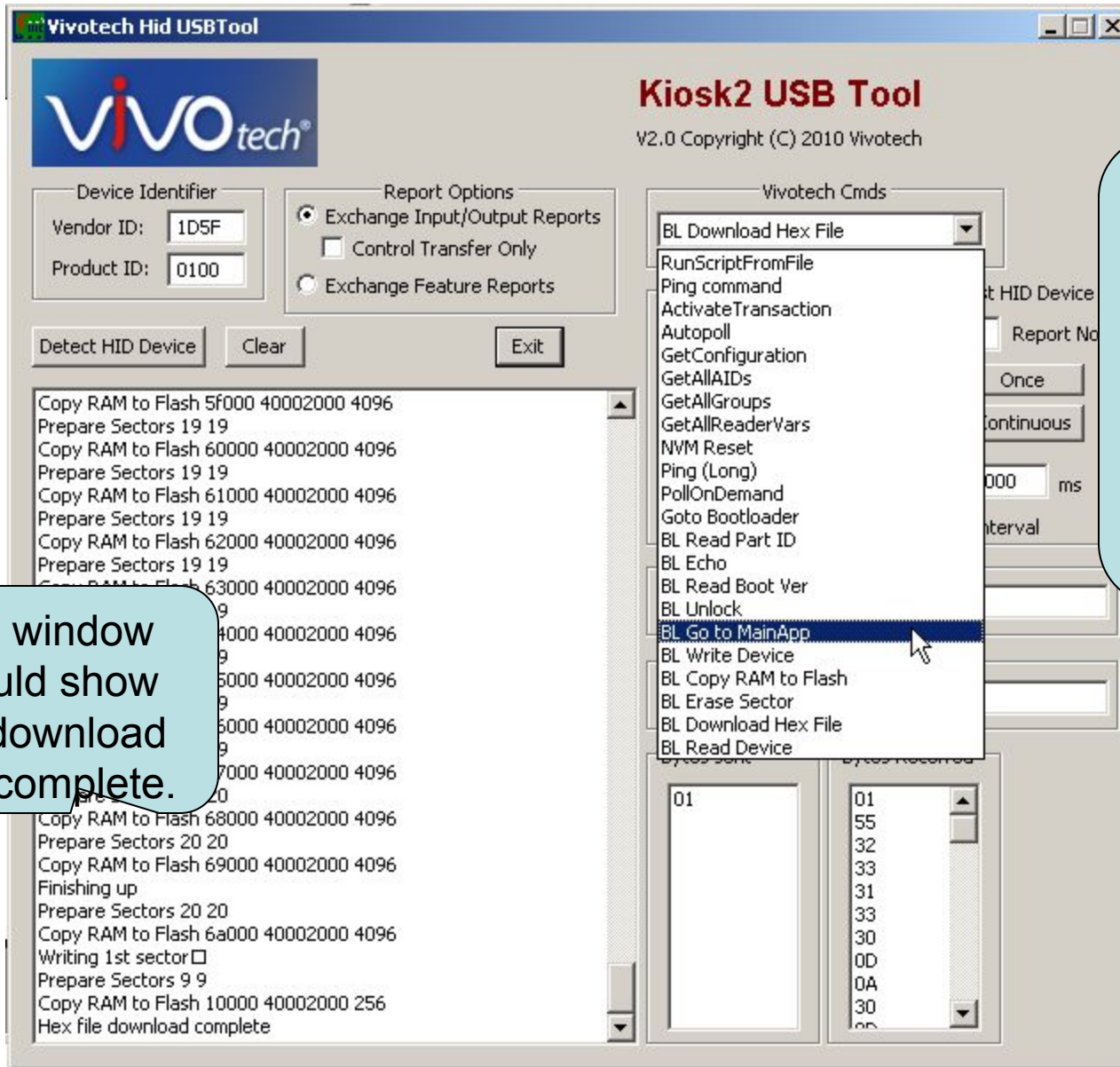


The file to be downloaded should be in the same directory as the HidApp.exe tool.

FIRST select file:
EC8_FL_1_0_1_w_EC9_BLx.x.x.h
ex
Type in the name here

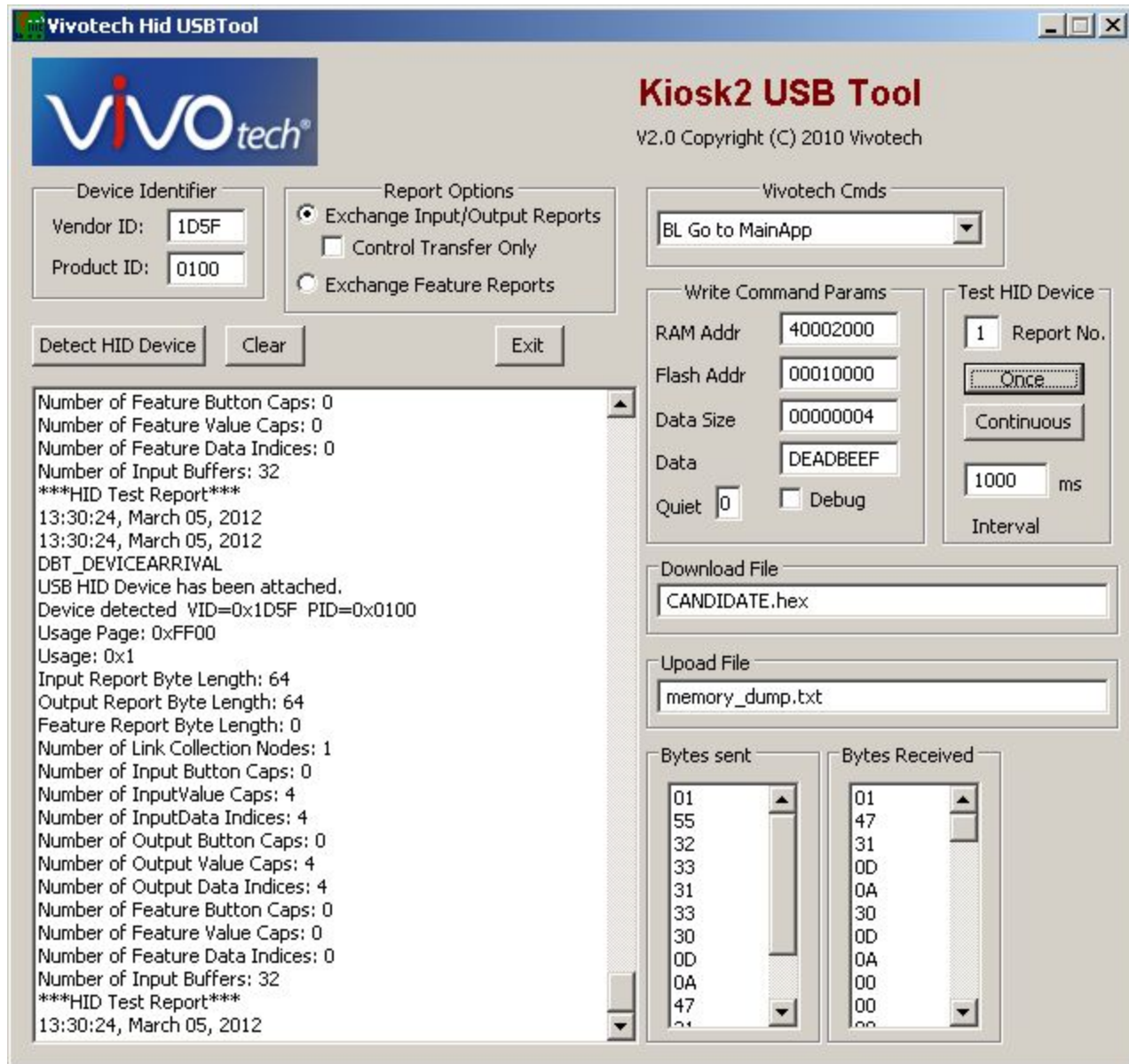


The download should begin as shown in the window. This will take several minutes.

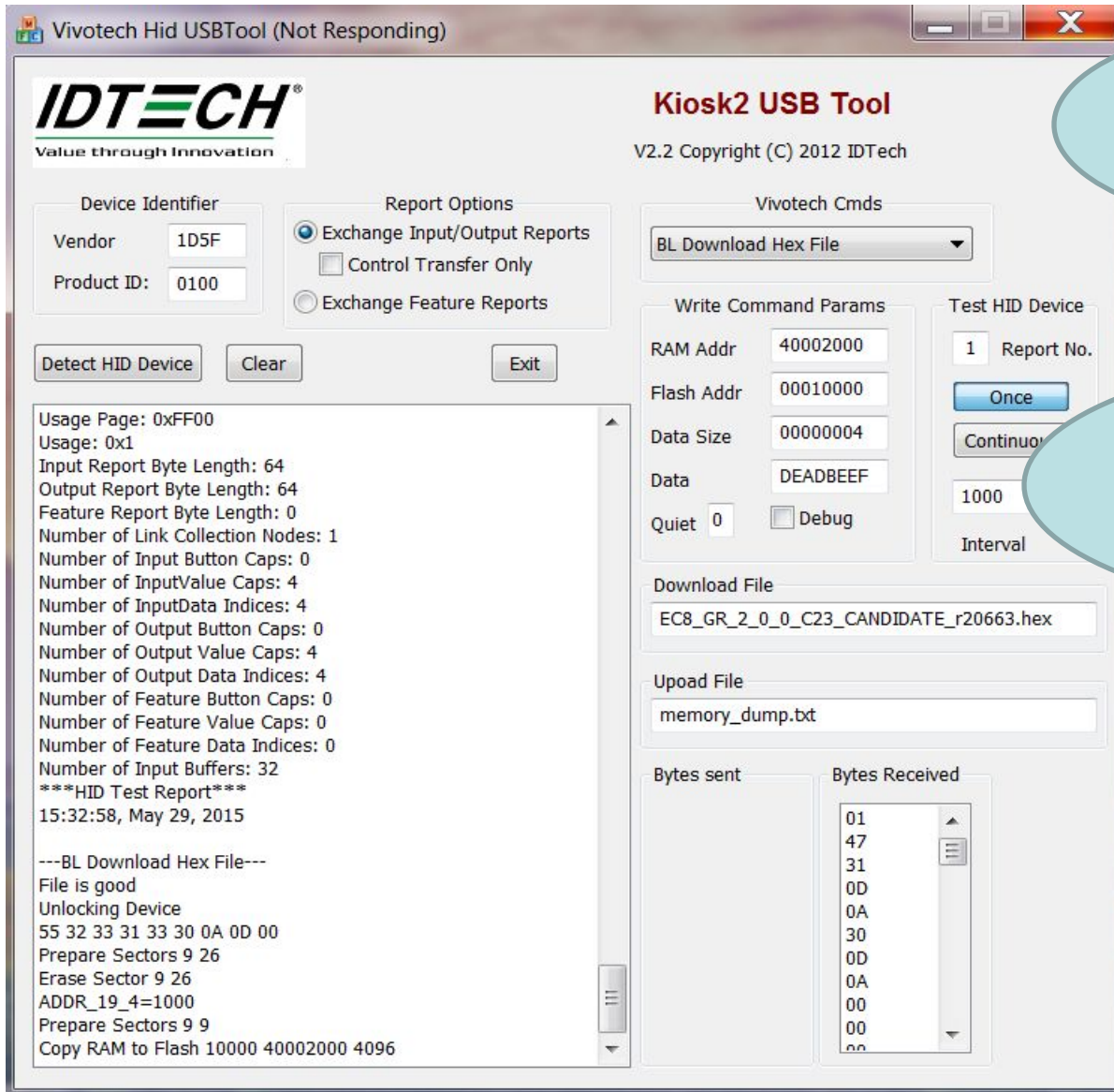


The window should show the download was complete.

Then select "BL_Go to Main App". Click Once.

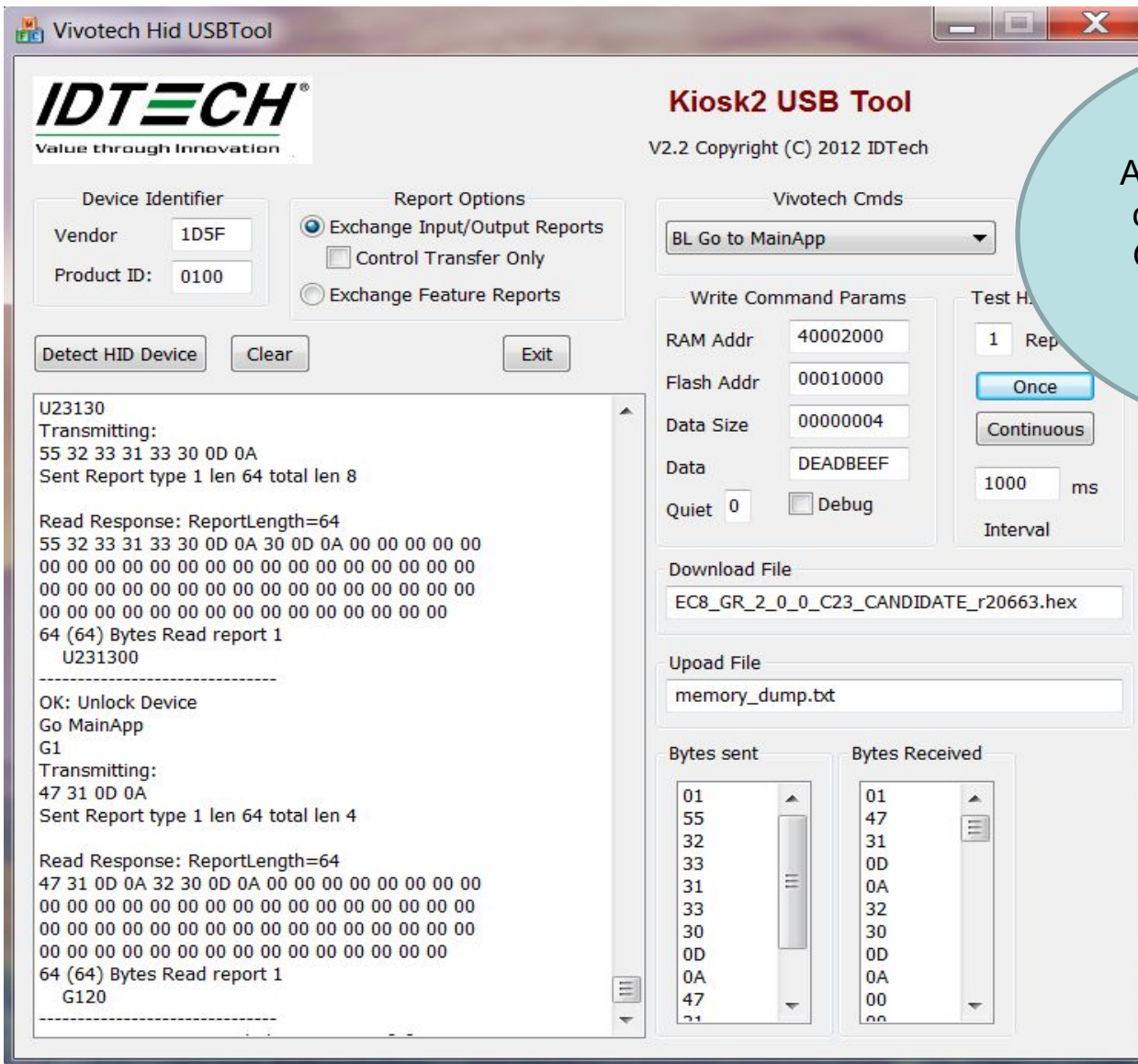


You should hear a **long beep**.and **wait** then the reader device should enumerate, as shown here **or** select "Detect HID Device"

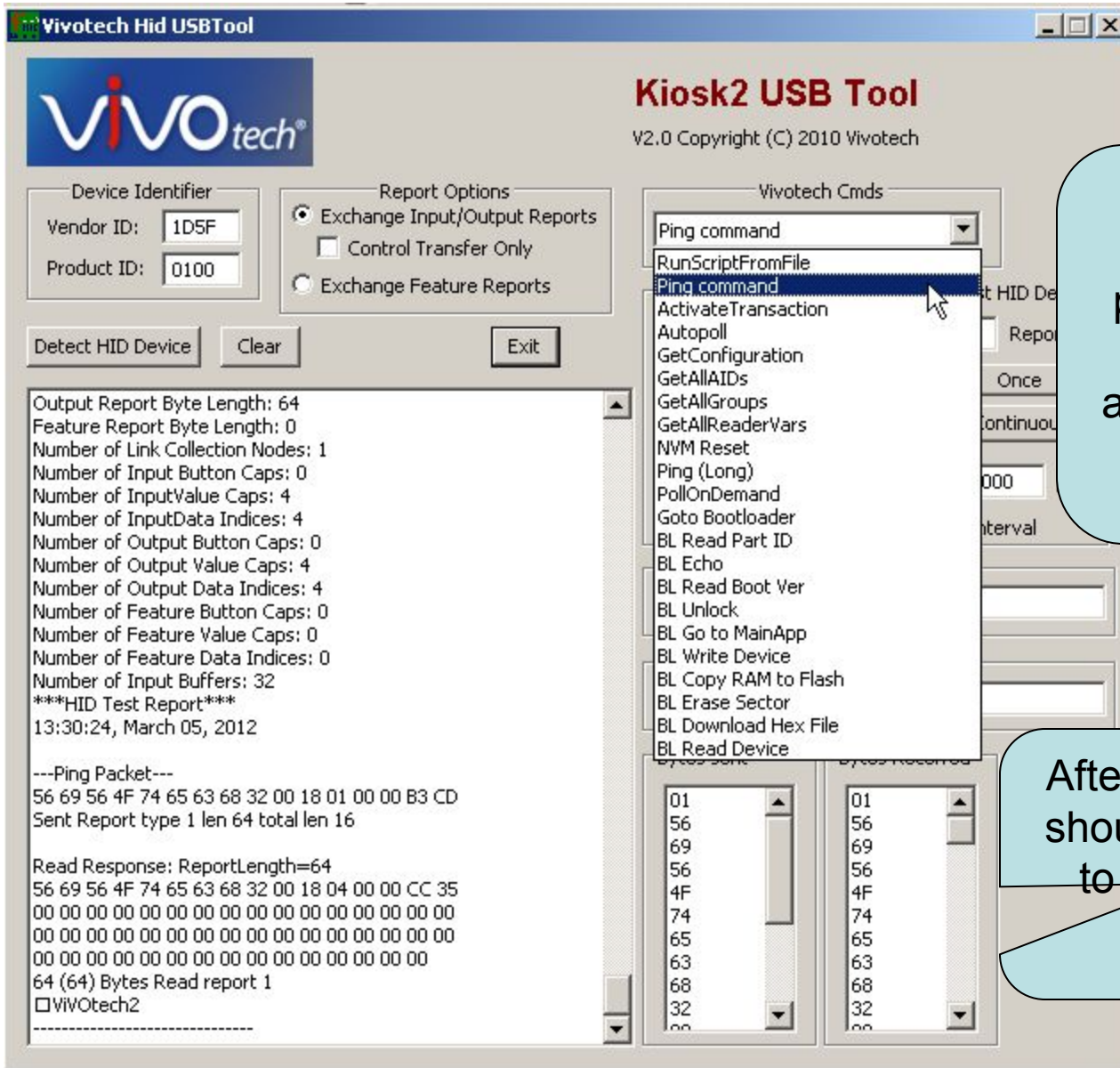


select BL Download Hex File Then Select Once

SECOND: en EC8_GR2.0.0_Cxx_ -rxxxx.hex h



After the file download complete. Select BL GoTo MainApp Then Select Once



To make sure the reader is running properly, select the "Ping Command" and click the "Once" button.

After you click once, you should see the response to the Ping as shown here.