

N4903B-07

S E R V I C E N O T E

Supersedes:
NONE

N4903B-C07 - Pattern Generator and Error Detector 150 Mb/s to 7 Gb/s. Includes built-in clock data recovery

Serial Numbers:

DE49100130, DE49100147, DE49100162, DE49100163, DE49100172, DE49100189, DE49100192, DE49100201, DE49100204, DE49100206, DE49100210, DE49100217, DE49100223, MY49100314, MY49100319, MY49100327, MY49100330, MY49100336, MY49100347, MY49100363, MY49100365, MY49100367, MY49100370, MY49100371, MY49100386, MY49100388, MY49100391, MY49100393, MY49100400, MY49100402, MY49100418, MY49100432, MY49100447, MY49100468, MY49100475, MY49100493, MY49100521, MY49100523, MY49101011, MY49101017, MY49101023, MY49101036, MY49101039, MY49101055, MY49101056, MY49101059, MY49101060, MY49101062, MY49101064, MY49101097

Due to a configuration problem the “External PLL” clock mode selection may be hidden in the product GUI.

Parts Required:

P/N	Description	Qty.
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NONE

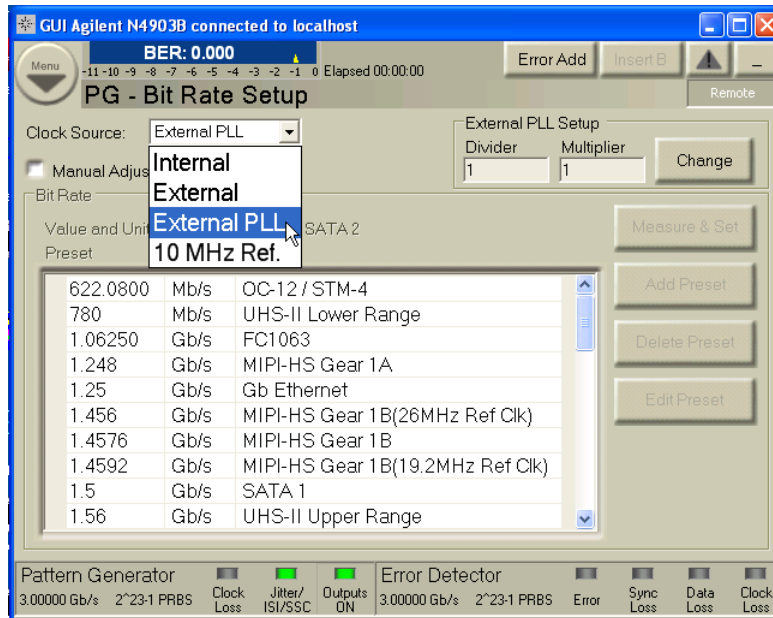
ADMINISTRATIVE INFORMATION

SERVICE NOTE CLASSIFICATION:			
MODIFICATION RECOMMENDED			
ACTION CATEGORY:	XX ON SPECIFIED FAILURE <input type="checkbox"/> AGREEABLE TIME	STANDARDS	LABOR: 0.5 Hours
LOCATION CATEGORY:	<input type="checkbox"/> CUSTOMER INSTALLABLE XX ON-SITE XX SERVICE CENTER <input type="checkbox"/> CHANNEL PARTNER	SERVICE INVENTORY: <input type="checkbox"/> RETURN <input type="checkbox"/> SCRAP <input type="checkbox"/> SEE TEXT	USED PARTS: <input type="checkbox"/> RETURN <input type="checkbox"/> SCRAP <input type="checkbox"/> SEE TEXT
AVAILABILITY:	PRODUCT'S SUPPORT LIFE	NO CHARGE AVAILABLE UNTIL: 31-Dec-2016	
<input type="checkbox"/> Calibration Required XX Calibration NOT Required		PRODUCT LINE: PL24 AUTHOR: HK	
ADDITIONAL INFORMATION:			

Situation:

Due to a configuration problem the N4903B with Option C07 (Data rate: 150 Mb/s to 7 Gb/s) may offer only 3 instead of 4 Pattern Generator (PG) clocking modes. The “External PLL” mode may be missing.

This can be easily checked by starting the BERT and going to the “PG – Bit Rate Setup” page in the GUI:



All 4 clock source mode must be visible: Internal, External, External PLL and 10 MHz Ref.

If “External PLL” is missing the unit is impacted by the configuration problem and must be fixed. The user is missing a valuable piece of functionality.

Use the tool and process described in the next chapter to correct the problem.

Solution/Action:

The BERT Downgrade tool is able to correct the problem.

It is available here:

[\\wbbnps03/ftp_support/PL24-Support/BERT_Serial/N4903B/Software/Tools/DowngradeSerialNumToolSetup_v5.06.zip](http://wbbnps03/ftp_support/PL24-Support/BERT_Serial/N4903B/Software/Tools/DowngradeSerialNumToolSetup_v5.06.zip)

Please use the following steps:

1. You need to install the tool on a desktop or laptop PC (WinXP SP3 or Win7 SP1 64bit system) that has a network connection or a GPIB interface card.
2. You need to connect the BERT either to the LAN or use a GPIB connection
 - a. When using the LAN you have to find out the IP address of the unit. Start a DOS command prompt window (Start → Run → cmd) and use the command “ipconfig” to get the IP address of the BERT

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Microsoft Windows [Version 6.1.7601]
Copyright (c) 2009 Microsoft Corporation. All rights reserved.

C:\Users\holgkaun>ipconfig

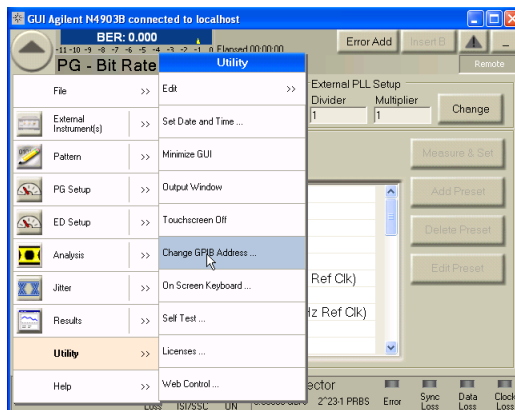
Windows IP Configuration

Ethernet adapter Local Area Connection:

    Connection-specific DNS Suffix  . : germany.agilent.com
    Link-local IPv6 Address . . . . . : fe80::6d21:ccb0:821...0030%14
    IPv4 Address. . . . . : 134.40.62.170
    Subnet Mask . . . . . : 255.255.248.0
    Default Gateway . . . . . : 134.40.56.1
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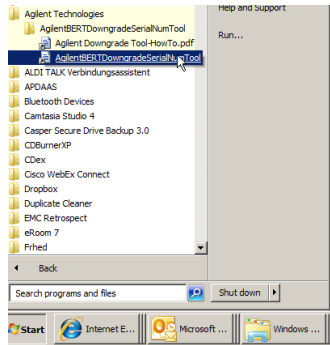
In addition you must switch off the Windows firewall (or create an exception rule) because the tool will require a socket connection using port 5025.

- b. When using a GPIB connection you can change the address here:

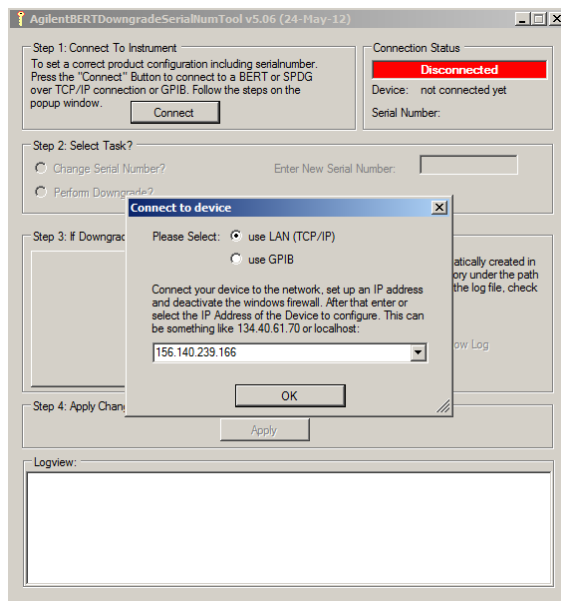


3. “Preset Instrument State” button on the front panel to reset unit to factory default settings.

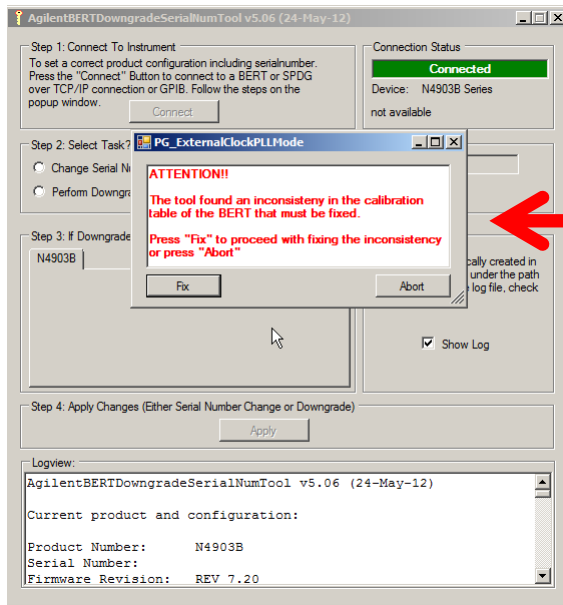
4. Then start the tool via the windows start menu:



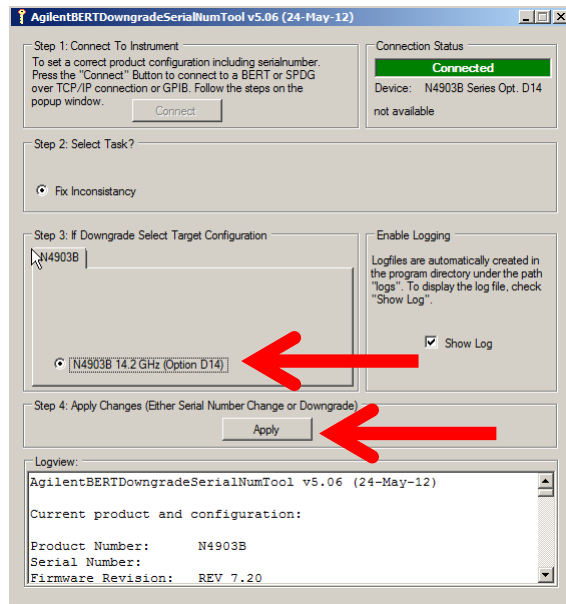
5. Press the “Connect” button and enter either the IP address or the GPIB address of the BERT.



6. The tool will show the following window in case the inconsistency in the internal data tables is detected:

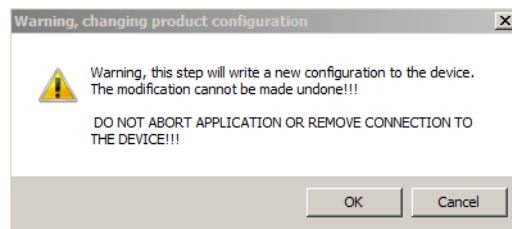


7. Press “Fix” in the window above. The tool then will show the following window.

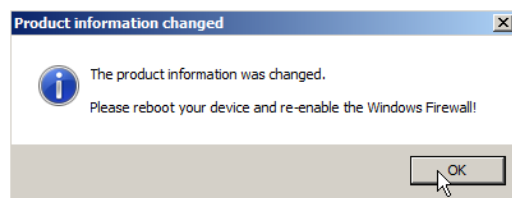


Check the checkbox next to your BERT type and press “Apply” to start the correction process.

The tool will show the following window as “last exit”. Please confirm with “OK”.



8. The following window confirms that everything is ok.



9. Now re-enable the Windows firewall and reboot the BERT and check whether you get all 4 selection in the following window:

