101 N. Alloy Dr.
Fenton, MI 48430

**LMI** ™

Ph    (810) 714-5811
Fax    (810) 714-5711

CustomerService@lmicorporation.com

**L**INEAR **M**EASUREMENT **I**NSTRUMENTS, Corp.

Research, Development and Manufacturing of Precision Measuring Systems

# Mastering Instructions for the LMI 200-S or LMI 200-SB to the LMI 585 *Plus*



Required equipment:
1.    LMI 585 Plus digital transmitter
2.    LMI 200-S or 200-SB probe
3.    LMI 6009 4 pin to 4 pin cable
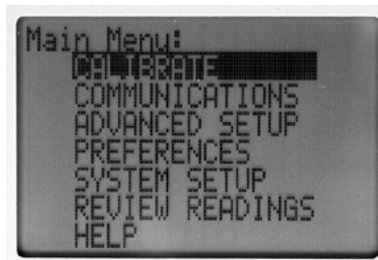4.    LMI 210 master block

## *NOTE*

These instructions are copied from the LMI 585 *Plus* User Guide and are intended to be used as a quick reference for the mastering process. Please refer to the LMI 585 *Plus* User Guide for the setup and configuration of the LMI gage.

Prior to starting calibration, make sure your 200 Probe is connected to the Gage Port #1 on the 585 Plus using a 6009 cable.
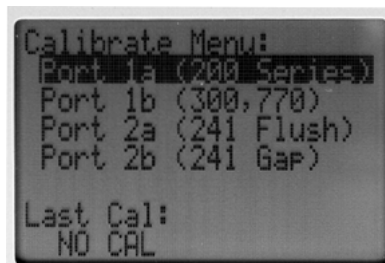


Under the ADVANCED SETUP/CONFIG PORTS menu, the CALSPAN of Port 1a should be set to 10.00mm. Reference LMI 585 Plus User Guide section 6 sub section 6.2.2
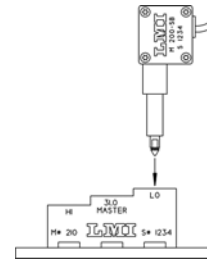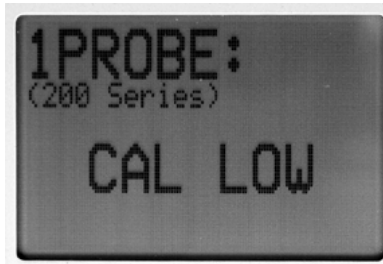
➢ Press <MENU> to enter the main menu

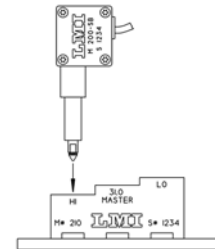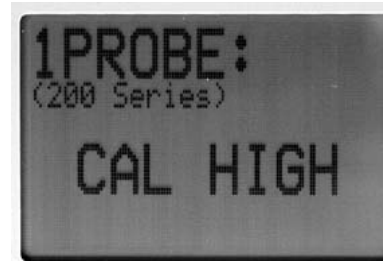➢ "Calibrate" should already be highlighted like the figure below.  Press <SELECT> or ►
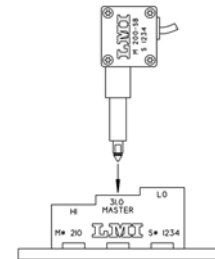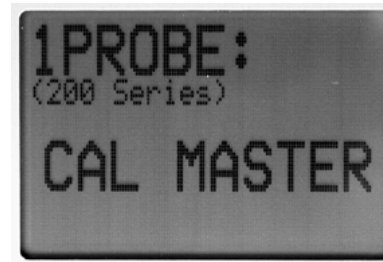


➢ Highlight Port 1a then press <SELECT>

➢ CAL LOW will be displayed on the screen. Insert the 200 probe in the "LO" step of the 210 Master block and press <SELECT>
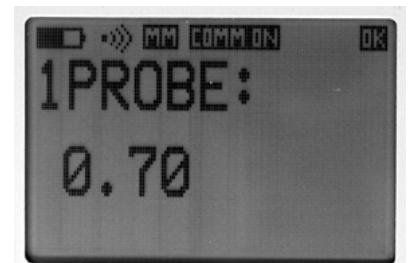
➢ The screen will then toggle to CAL HIGH. Insert the 200 probe in the "HI" step of the 210 Master block and press <SELECT>
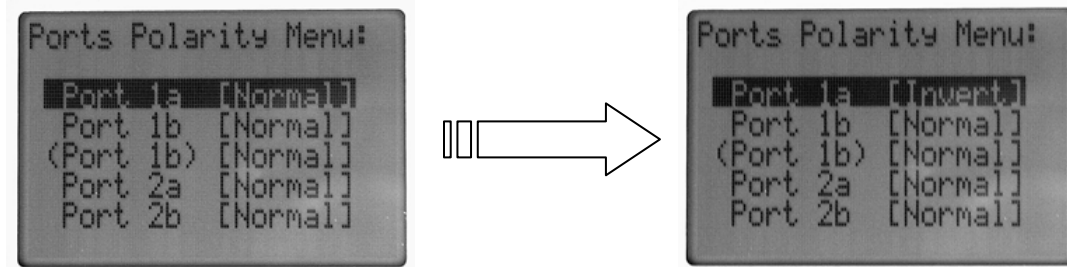
➢ The screen will then toggle to CAL MASTER. Insert the 200 probe in the "31.0 Master" step of the 210 Master block and press <SELECT>

➢ Calibration is complete and the screen takes you back to the "Calibrate Menu:" screen. To exit and view your readings, press <SEND>.

➢ You should be able to view your readings on the screen labeled 1PROBE. Use the ► or ◄ to toggle between three gage screens if 1PROBE is not shown. The screen below shows 1PROBE with a gage reading of 0.70mm. Insert the gage back into the "31.0 Master" step to verify zero or master. This calibration procedure will produce a negative reading when the Probe is extended beyond the 31.0 Master Point.

➢ To reverse the signs, go to the main menu. Go to Advanced setups and hit <SELECT>. Go to Ports Polarity. Press <SELECT>. Choose the port you are using and press <SELECT>…the port readings will change to "Inverted"



**NOTES:**
**1)** If you are using the 200-SB with the 235/236 seal gap blocks, you will want to CAL MASTER on the LO step of the Master Block and put in the proper offset in the ADVANCED SETUP>PORT CONFIG>Port1a menu. The offset should be set to the 235/236 minimum gap check (10.0mm typ.).
**2)** A 200-SF Probe has 22.0mm of travel so the CALSPAN needs to be changed from the default 10.00 to 22.00mm. Go to the ADVANCED SETUP>PORT CONFIG>Port1a menu to adjust the CALSPAN to 22.00mm. The 210 Master Block will also be replaced with the 214 Master Block with a 54.0mm Master.