

WinSMART™ LY36

Smart Pressure Transmitter Programming Manual



Factory Reset With WinSMART™ Powered ON

1. Press and hold the '**S**' button for 5 sec
2. Once the display reads 'Recovery', release the '**S**' button and press the '**Z**' button for 2 sec
3. Once you see 'OK', release the '**Z**' button
4. 'Loading - - - -'
5. WinSMART™ will continue setting until it returns to the measuring interface



Note: Figures on the image matches the step number.

Configuring For Zero "0" Pressure

1. This can only be performed when no pressure is being applied to the unit
2. Hold the '**S**' and '**Z**' buttons simultaneously for 5 sec
3. When the display reads PV=0, this indicates that the '0' pressure setting has been set and the buttons can be released
4. 0.00 pressure will appear on the display



Configuring For mA Reading (4mA & 20mA)

1. Apply a pressure to the sensor that corresponds to a 4mA output signal e.g. 20psi
2. Press the '**M**' & '**Z**' buttons simultaneously for 5 sec
3. The display will read 4mA OK
4. Release both buttons
5. For the 20mA setting, repeat the above by applying 100psi and pressing '**S**' & '**M**'



Accessing The Display Mode

1. Press **'M'** to scroll through the various option settings
2. Press **'Z'** once to enter the parameter display mode
3. Pressing the **'S'** button cycles through the different options
4. Determine what you would like to see as the standard measurement
 - PV (pressure)
 - mA (current)
 - %
5. Press **'M'** to confirm



Selecting Your Unit Of Measurement

1. Press **'M'** to scroll through the various option settings
2. **'Z'** to enter
3. **'S'** to scroll thru all options
4. **'M'** to select



Menu Label	Setting Values		
U	kPa	inH2O	kg/cm2
	MPa	ftH2O	Pa
	bar	inHg	ATM
	psi	mHg	mm*
	mmHg	TORR	m*
	mmH2O	mbar	
	mH2O	g/cm2	

LRV & URV Allows For A More Precise Set-up

1. Press **'M'** to scroll through the various option settings
2. For LRV, press **'Z'** once to enter this setting
3. The **'S'** button cycles through the digits
4. **'Z'** button moves the digits from right to left, ending with the decimal point
5. Press **'M'** to accept
6. For URV, repeat the above

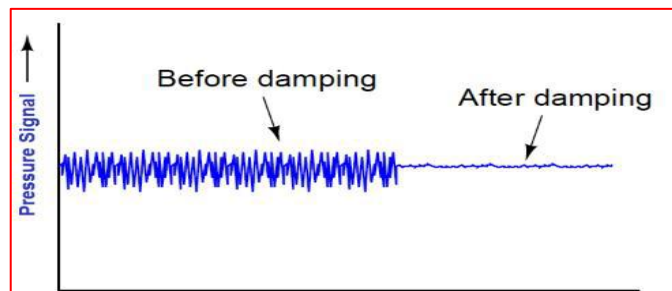
*LRV = Lower Range Value

*URV = Upper Range Value



Dampening Time

1. Press **'M'** to scroll through the various option settings
2. **'Z'** to enter
3. **'S'** to move between columns
4. **'M'** to select
5. Remember: **'Z'** button moves the digits between columns



Output Signal Type

1. Press **'M'** to scroll through the various option settings
2. Press **'Z'** to enter output signal setting mode
3. The **'S'** button to cycle through the various options
4. There are 2 options:
5. Linear or Square Root
6. Press **'M'** to accept



Establishing An Alarm Setting

1. Press **'M'** to scroll through the various option settings
2. Press **'Z'** to enter alarm setting mode
3. The **'S'** button to cycle through the various options
4. There are 3 options: NO, L or H
5. Press **'M'** to accept

* NO – No Alarm

* L – Alarm at lower range level

* H – Alarm at upper range level



Temperature Setting

1. Press **'M'** to scroll through the various option settings
2. Press **'Z'** to enter the temperature setting
3. The **'S'** button to cycle through the various options
4. There are 4 options: C, F, K or OFF
5. Press **'M'** to accept



Addressing The Unit

1. Press **'M'** to scroll through the various options
2. Press **'Z'** to enter the address setting
3. The **'S'** button cycles up through the digits, starting at zero '0'
4. Press **'Z'** for the next column
5. Press **'M'** to accept



Number Of Decimal Points

1. Press **'M'** to scroll through the various options
2. Press **'Z'** to enter the address setting
3. The **'S'** button cycles up through the digits, starting at one '1' thru three '3'
4. Press **'Z'** for the next column
5. Press **'M'** to accept



Flow Measurement Settings

1. For flow measurement enter the **Expert Menu** by using following steps.
 - a. Power off the Unit.
 - b. Press & hold '**M**' and power it on. You will enter the Expert Menu and see "Expert Menu" displayed for a few seconds which confirms this.
2. Press '**M**' to enter the display mode. You will get 4 options in Display Mode
 - a. PV
 - b. mA
 - c. %
 - d. TBL(Please chose TBL to enable flow measurements)
3. After choosing TBL in Display Mode, set the unit of flow using one of 7 units available (CMM, CMH, CFM, CCM, LPM, m3/h, min/h).
4. Next, set the **LRV** and **URV** to the correct flow value. Example, if differential pressure range is **0 - 500mbar** and corresponding flow range is **0 - 200m3/h**, then
 - a. Set the flow unit as m3/h (in step 3)
 - b. Set LRV = 0
 - c. Set URV = 200
5. Configure the output signal as **Square root**.
6. Next step is to provide the flow coefficient. You will get the following fields. Fill in the mandatory fields for the transmitter to calculate the flow coefficient. Others can be filled if customer has the data.
 - a. Area(m2) → (Mandatory)
 - b. Density → (Mandatory)
 - c. Height (in meters; only needed if Gallon is selected as unit of flow)
 - d. Pitot tube coefficient
 - e. Cut-off %
 - f. Gauge or Absolute Differential → (Mandatory)
 - g. PV set sqrt (set as $\sqrt{}$) → (Mandatory)
 - h. Density FO (Density Compensation)
 - i. Density TC (Temperature compensation)
7. Press '**M**' to save and exit.

The transmitter is now ready for flow measurement.