

# “ELH Series” (Extended Life) Pressure Gauge

## Introduction

Homogenizer service is a torture test for any dairy gauge. Modern homogenizers utilize multi-piston, high pressure pumps that result in a pounding that soon sends lesser gauges to the scrap pile. The ELH solves this senseless waste.

With the ELH Gauge, Anderson-Negele has combined our understanding of homogenizers and the dairy environment along with the design principles of our class leading EL gauge. The ELH is designed from the ground up to be the toughest, most reliable gauge for homogenizer applications. With over 30 years of experience building and repairing hundreds of thousands of gauges from a dozen different suppliers, we've identified and addressed all the key causes of premature failure. While the ELH is undoubtedly the most durable 3-1/2" homogenizer gauge available today, it is also quite innovative. It comes available with a fully potted and sealed integral transmitter that can be field calibrated for both zero and span. Configured with a broad range of sanitary homogenizer fittings, direct or panel mounting, and the optional integral transmitter, the ELH is likely to be the perfect replacement gauge for your homogenizer. And because it's an Anderson-Negele gauge you can rest assured it meets every current sanitary standard and is being used by the tens of thousands in food, dairy, beverage, and brewing applications worldwide.

Complete specifications and ordering information are available on the reverse. For additional information please visit us on the web at [www.anderson-negele.com](http://www.anderson-negele.com), or contact your local Authorized Anderson-Negele Distributor.

## Authorizations



## Features

- Permanently filled and sealed sensing system provides class leading pulsation dampening and long life.
- Heavy duty stainless case and all welded design provide shock and vibration resistance
- Transmitter option is ideal to upgrade single port machines for data logging or remote reading
- Available with all common homogenizer fittings for either direct and panel mounting
- 3-A compliant; Third Party verified



Specifications

PERFORMANCE MECHANICAL & ELECTRICAL

Gauge Accuracy: Factory calibrated to +/- 1.5% of full scale, from 10 to 90% of pressure range

Transmitter Accuracy: +/- 0.5% of full span

Over-range capability: 25% for ranges up to 100 BAR (1.5k PSI)  
15% for ranges up to 600 BAR (8.7k PSI)  
10% for ranges up to 16K BAR (23k PSI)

Temperature Effect: .16% per 10°F process temperature change  
.25% per 10°F ambient temperature change

Process Temperature Limits: 25 to 300°F (-4 to 149°C)

Ambient Temperature Limits: 32 to 140°F (0 to 60°C)

CIP Temperature Limit: 300°F (149°C)

SIP Temperature Limit: 300°F (149°C)

Stability: Within specified accuracy for 6 months

Decay Rate: 1- 2 seconds

CONSTRUCTION / FINISH

Diaphragm: C276 Hastelloy

Fitting: 316L stainless steel

Diaphragm and Fitting: Welded & polished. Max. Ra=25µ

Spiral Coil: Stainless steel

Socket: Stainless steel with integral fill port

Case/Stem: Welded 304 stainless steel (polished)

Dial: Adhesive-backed printed Mylar in various scales, 90mm diameter minimum

Lens/Dial Plate: Chemical resistant polysulfone, able to withstand 325°F

Bezel: 304 stainless steel, polished, compression formed to case (non-removable)

Viewing Angle: 100 degrees minimum

Pointer: Aluminum, black anodized

OPERATIONAL

Spiral Coil, Tip, and Socket Construction: Welded connections

Internal Fill: Standard, ETR (extended Temperature range) mineral oil

Case Fill: Standard, glycerin 100% USP Food Grade

Mechanical Dampening: Standard

Output: Optional 4-20 mA DC, 2 wire (4 mA at zero pressure & 20 mA at upper range value).  
0-700 ohms at 24 VDC

Loop Resistance: 0-700 ohms at 24 VDC

Electrical Connection: M12 5Pin quick disconnect receptacle (field wireable connector and cable available).

Recommended Cable: 22-24 AWG, foil shielded, 0.17 - 0.26" Cable Sheath OD for use with field wiring connector

Electrical Protection: Voltage spike and reverse polarity

Operating voltage: 10-40 VDC (Absolute), 24 VDC Nominal regulated or unregulated.

Transmitter Zero Adjustment: +/- 10% of span (With back removed)

Pointer Re-zero Adjustment: Tamper resistant adjustment, +/- 5% of span. Non interactive with span. External adjustment located on back of case.

Order Information



RANGE

- 084 0-1,000 psig
- 085 0-1,500 psig
- 087 0-2,500 psig
- 090 0-5,000 psig
- 221 0-6,000 psig
- 093 0-10,000 psig
- 094 0-15,000 psig
- 971 0/100 BAR
- 974 0/160 BAR
- 976 0/250 BAR
- 979 0/400 BAR
- 982 0/600 BAR
- 984 0/1000 BAR

BAR ranges are provided with dual range BAR & PSI markings

DIAL NAME/LOGO

- 01 Anderson

FITTING (see doc. 1163 for fitting dim. details)

- 056 Homogenizer (less flange) <sup>1</sup>
- 057 Homogenizer (7/8" flange) <sup>1</sup>
- 058 Homogenizer (1-1/8" flange) <sup>1</sup>
- 117 APV/Rannie <sup>2</sup>
- 118 Tetra Pak & Bran & Luebbe
- 157 Niro <sup>2</sup>

MOUNT

- 1 Bottom
- 2 Panel/Remote

111A FIXED CHARACTERS

<sup>1</sup> Common high pressure fitting for APV and others.  
<sup>2</sup> Not 3-A compliant  
<sup>3</sup> Not available with range codes 084, 094 and 984

ACCESSORIES

- Molded cordset w/25' cable 42117K0025
- Molded cordset w/50' cable 42117K0050
- Molded cordset w/100' cable 42117K0100

CABLE LENGTH

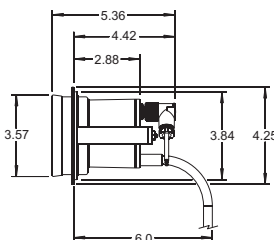
- 00 No Cable or QDR only
- R0 Quick Disconnect Receptacle(QDR) & 90°FWC QDR & Field Wireable Connector(FWC) w/25 ft Cable
- R1 QDR & FWC w/50 ft Cable
- R2 QDR & FWC w/100 ft Cable
- R4 QDR & FWC w/100 ft Cable
- R8 QDR & FWC w/200 ft Cable

OUTPUT

- 0 No Output
- 1 4-20mA Output - Factory calibrated to selected range<sup>3</sup>

ARMOR/LENGTH

- 00 None (bottom mount)
- 01 5' PVC
- 02 10' PVC
- 03 15' PVC
- 21 5' S.S.
- 22 10' S.S.
- 23 15' S.S.



All dimensions in inches

