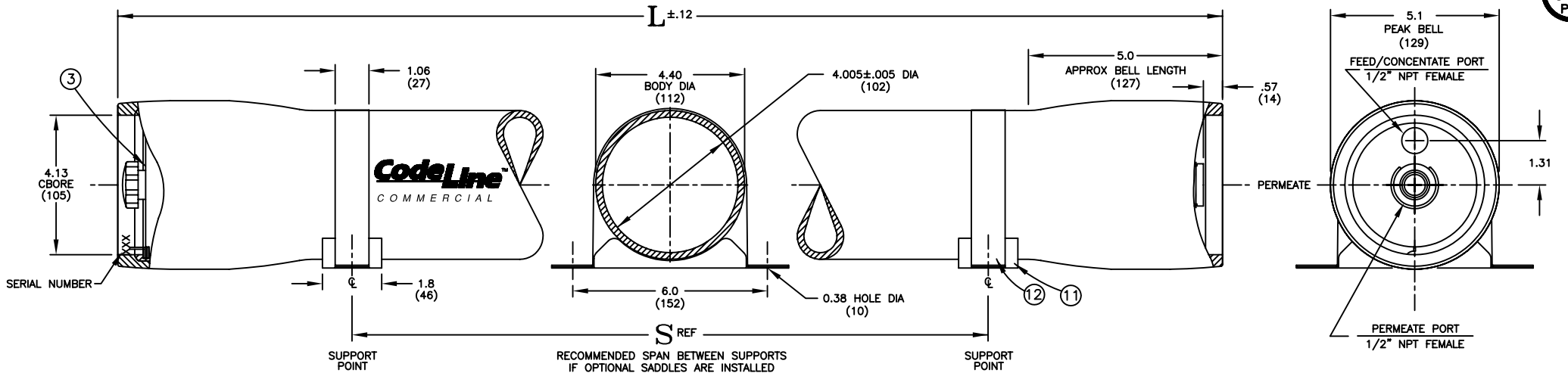
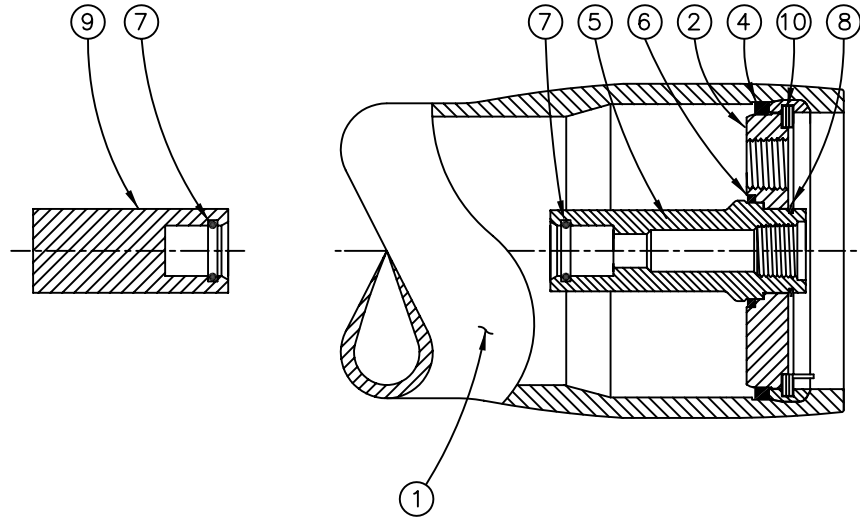


300
PSI



Dwg. Ref.	Qty. Per	Item Number	Description	Materials/Remarks
SHELL				
①	1	-	Shell	Filament wound epoxy/glass composite. S.S. head locking grooves integrally wound in place. Shell exterior coated with blue high gloss polyurethane paint.
HEAD				
②	1	45150	Bearing/Sealing Plate	Fiber Reinforced Epoxy Laminate (CONC. END)
③	1	50239	Brg/Sealing Plate Assy	Fiber Reinforced Epoxy Laminate (FEED END)
④	2	45352	Plate Seal	Ethylene Propylene - Square Cut
⑤	1	50891 (-1)	Permeate Port	PVC Thermoplastic (gray) - 120' F Max
		50892 (-2)	Permeate Port	PET Thermoplastic (black) - 176' F Max
⑥	1	45335	Permeate Port Seal	Ethylene Propylene - Square Cut
⑦	2	45296	PWT Seal	Ethylene Propylene - O-Ring
⑧	1	45242	Port Retainer	302 SST
⑨	1	50902 (-1)	Permeate Cap, Solid	Engineering Thermoplastic (FEED END ONLY)
HEAD INTERLOCK				
⑩	2	45260	Retaining Ring	302 SST
VESSEL SUPPORT				
⑪	2	45058	Saddle - OPTIONAL	Cast Urethane Elastomer
⑫	2	50329	Strap - OPTIONAL	Type 304 SST - PVC cushion
FOR REFERENCE ONLY				



SECTION THROUGH END CLOSURE
DOWNSTREAM END

- NOTES**
- DIMENSIONS IN INCHES (MM APPROX)
 - NOT TO BE USED FOR CONSTRUCTION UNLESS CERTIFIED
 - PATENT APPLIED FOR

Shell Length Code	L L.O.A. IN (MM)	S Span IN (MM)	APPROX. ASSEMBLY Weight LB (KG)
1	47 (1194)	28 (711)	13.25 (6.0)
2	87 (2210)	56 (1422)	19.25 (8.8)
3	127 (3226)	122 (3099)	26.75 (12.2)

CodeLine™
COMMERCIAL
PENTAIR WATER TREATMENT GROUP

ENGR	MODEL 40E30				
QLTY	LOW PRESSURE MEMBRANE HOUSING				
MRKT	ECO 89893	SHEET 1 OF 2	SIZE B	NUMBER 518008	REV B

RATING:

DESIGN PRESSURE..... 300 PSI at 120°F
 (2.1 MPa at 49°C)
 with PVC permeate port
 300 PSI at 176°F
 (2.1 MPa at 80°C)
 with PET permeate port

MIN. OPERATING TEMP..... 20°F
 (-7°C)

FACTORY TEST PRESSURE..... 450 PSI
 (3.1 MPa)

BURST PRESSURE..... 1800 PSI
 (12.2 MPa)

INTENDED USE

The Model 40E30 Fiberglass RO/UF Pressure Vessel is designed for continuous, long-term use as a housing reverse osmosis and ultrafiltration elements in typical commercial water treatment systems at pressures up to 300 psi. Any make of 4-inch nominal diameter spiral-wound element with a 3/4" diameter male product water tube is easily accommodated.

The Model 40E30 must be installed, operated and maintained in accordance with the listed precautions, and good industrial practice to assure safe operation over a long service life.

The high performance reinforced plastic shell must be allowed to expand under pressure; undue restraint at support points or piping connections can cause leaks to develop in the shell. The end closure, incorporating close-fitting, interlocking metal components, must be kept dry and free of corrosion; deterioration can lead to catastrophic mechanical failure of the head assembly.

CodeLine will assist the purchaser in determining the suitability of this standard vessel for their specific operating conditions. The final determination however, including evaluation of the standard materials of construction for compatibility with the specific corrosive environment, shall be the responsibility of the purchaser.

Specifications subject to change without notice.

PRECAUTIONS

- DO... read, understand and follow all instructions; failure to take every precaution will void warranty and may result in vessel failure
- DO... mount shell on horizontal or vertical members at central span "S" using compliant vessel supports; tighten hold down straps just snug.
- DO... provide overpressure protection for vessel set at not more than 105% of design pressure
- DO... inspect end closures regularly; replace components that have deteriorated and correct causes of corrosion
- DO NOT... make rigid piping connections to ports or clamp vessel in any way that restricts growth of fiberglass shell under pressure; ▲ DIA = 0.01 in. (0.25mm) and ▲ L = .03 in. (.8mm) for a length code -1 vessel
- DO NOT... hang piping manifolds from ports or use vessel in any way to support other components
- DO NOT... operate vessel at pressures and temperatures in excess of its rating
- DO NOT... operate vessel without element installed.
- DO NOT... operate vessel with permeate port pressure in excess of 125 PSI (0.9 MPa) at 120°F (49°C; PVC permeate port) or 176°F (80°C; PET permeate port)
- DO NOT... tolerate leaks or allow end closures to be routinely wetted in any way
- DO NOT... pressurize vessel until double checking to verify that the retaining rings are in place
- DO NOT... work on any component until first verifying that pressure is relieved from vessel

NOTE

Spiral Retaining Ring Removal Tool (50303) recommended to open and close vessel.

CAUTION:
 EYE PROTECTION SHOULD BE WORN WHEN REMOVING OR INSTALLING RETAINING RINGS.
 KEEP FINGERS CLEAR FROM RETAINING RING WHILE INSTALLING LAST OF THREE TURNS.
 RING MAY SNAP INTO POSITION POSSIBLY PINCHING FINGERS.

ORDERING

Please specify the following:

- VESSEL MODEL NUMBER built from table of options below
- MEMBRANE ELEMENT MAKE AND MODEL NUMBER
- SPECIFIC CONCERNS regarding INTENDED USE and requests for SPECIAL MATERIALS of CONSTRUCTION

40E30- [] B- [] [] [] -H []

MODEL 40E30 — Fiberglass RO/UF Pressure Vessel
 4" Nominal Diameter
 300 PSI Design Pressure

SHELL LENGTH — (Length given as the maximum number of elements that can be contained)

Code	Element Capacity	
-1	40" LONG	60" LONG
-2	One Each	
-3	Two Each	Two Each

SHELL FINISH —

Exterior Shell Finish
Blue, high-gloss polyurethane coating

assigned by CodeLine Division.

CERTIFICATION

Code	Certification Grade
H	Certified by CodeLine Division, not ASME Code stamped

PERMEATE PORT MATERIALS

Code	Materials
P	Polyvinyl Chloride
*T	Polyethylene Terephthalate

PERMEATE PORT CONFIGURATIONS

Code	Port Sizes
1	1/2" NPT Female (Standard per drawing)
*2	1/2" BSP/JIS Female

FEED/CONC. PORT CONFIGURATIONS

Code	Port Sizes
1	1/2" NPT Female (Standard per drawing)
*2	1/2" BSP/JIS Female

* OPTIONAL – Consult factory for specifications and pricing