

Coalescing Filters - to 740 psig

740psig @ -20 to 100°F
675psig @ -20 to 200°F

Series R40- Enameled Carbon Steel ♦ Series R42- 304 Stainless

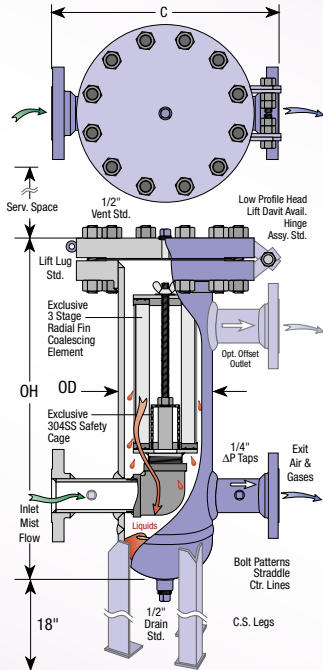
- Intake Air Flows to 150,000 SCFM Std.
- ASME U Stamp Std., Nat'l. Board Registered
- Pleated Element Design - Exceptional Useful Filter Area, Low ΔP, High Flow
- Hinged Flange w/Lift Lug Std., Service Access W/O Breaking Connections
- 304SS Throat Safety Cages and ΔP Taps Std.
- Rugged Enameled Steel or 304SS Construction



For more information contact :
SparksFilters 585-624-4500

585-624-5300 fax

E-Mail: Sales@sparksfilters.com



Series R40 coalescing pipeline filters are fabricated from rugged enameled carbon steel, (R42 are 304SS), designed, constructed, and stamped in accordance with ASME Boiler and Pressure Vessel Code requirements for unfired pressure vessels. Any model can be modified to more exactly fit your needs.

• Standard Connection Sizes from 1" to 12"

Male NPT or raised face flange in-line connections are std. Alternative orientations and sizes are available. An elevated discharge connection is shown below. A hinged blind face flange closure assembly with lift lug is standard.

• **Coalescing Filter Media.** Sparks™ #907 media is composed of microfine borosilicate glass fibers bonded with phenolic resin. Together with a textile prefilter and a final drain layer, these pleated elements are remarkably effective at coalescing fine entrained oil and aqueous vapor mist from air/gas flows with very low ΔP. Experience has demonstrated high removal (over 90%) in dealing with 1.0 to 0.3μ aerosols. **Other optional filter media such as #926 exceeds 95% removals.** Individual performance will vary with the specific viscosity and vapor pressure of liquid contaminants.

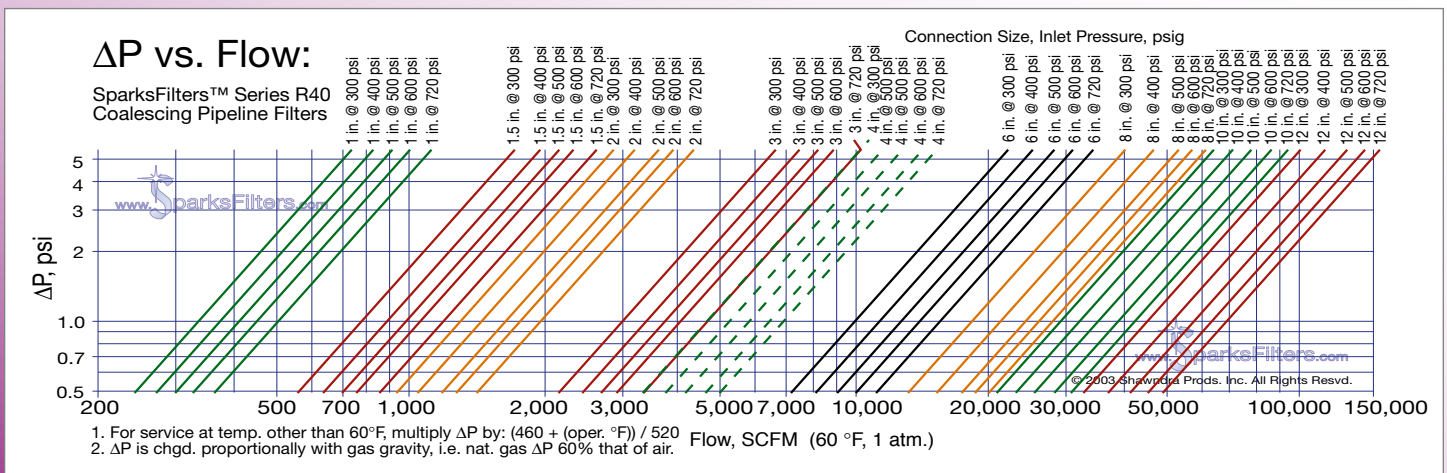
• **Options:** Models R40-0202-RF-020 and larger include 18" leg supports. (add 18" to OH) Carbon steel support legs in any length, gauges, special finishes, and head lift assemblies are optional on any model. Call for information on vessels having other pressure services, 304SS, or other materials of construction.

See <http://www.sparksfilters.com> for more options.



Filters that saved a plant from shut down. Two ASME code certified coalescing filter-separators solved a very serious problem. They now protect an existing downstream unit filled with costly molecular sieve (over \$200,000) from liquid contamination in the gas stream. Together with a second Sparks™ filter-coalescer, this unit employs an automatic drain system and removes over 500 gallons of liquid per day with over 99% efficiency.

Housing Model No.	Conn. Size	Conn. type	Cover Style	Dimensions in Inches				Wgt. Lbs.	Order Element No.
				OD	OH	C	Serv. Space		
R40-0200-MT-010	1"	MPT	Blind Flg.	6 5/8"	24	18	16	200	321-1439WK907
R40-0201-MT-015	1 1/2"	MPT	Blind Flg.	6 5/8"	28	18	16	220	321-3235WK907
R40-0202-RF-020	2"	Flg.	Blind Flg.	8 5/8"	28	18	16	240	321-3236WK907
R40-0203-RF-030	3"	Flg.	Blind Flg.	8 5/8"	39	20	24	310	321-3237WK907
R40-0204-RF-040	4"	Flg.	Blind Flg.	10 3/4"	42	24	24	500	321-3238WK907
R40-0205-RF-060	6"	Flg.	Blind Flg.	12 3/4"	51	28	26	750	321-3239WK907
R40-0206-RF-080	8"	Flg.	Blind Flg.	16	66	30	36	1500	321-3240WK907
R40-0207-RF-100	10"	Flg.	Blind Flg.	20	76	36	36	2400	321-3241WK907
R40-0208-RF-120	12"	Flg.	Blind Flg.	24	78	42	39	3400	321-3242WK907



Filter Vessel Options & Features



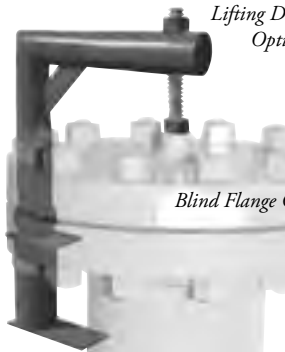
Hinges w/lift ring std. above 35 lbs.



O-Ring Closure (Hinge std.)
Buna-N Gasket Std., Viton,
Teflon coated, EPDM gaskets
available.



Lifting Davits
Optional



Blind Flange Closure

A Superior Finish! We use a high gloss enamel that has exceptional resistance to fungus, salt air, and alkalis. It is twice as costly as lesser paints. Some competitors use paints that are designed instead to hide welding and other fabrication defects. Our standard grey finish is used on all sheet metal filter housings. Pressure vessels have a special "clean white" interior finish. If you have special requirements for finishing, let us know.

Resistance To:
2 % HCL No Effect
2 % NaOH No Effect
5 % Acetic No Effect
Lactic Acid No Effect
Mineral Oil No Effect
Salt Spray, 200 hrs. No Effect
Flexibility 180°
Mandrel, 1/4" No Cracking
Fungus Resistance per Fed. Spec.
TTP-18, para. F-3g No Mildew

Optional
Low Profile Lifting Davit.



Removable
perforated 304SS
Safety Screen sits
under (down-
stream of) filter
element(s) to guard against lost pens, stray
coins, and other undesirable items at time
of filter element change out.



Our process and pipeline filters can be readily altered from standard design items, with special features and options to suit your requirements. This is a partial list of options. Call us with your special needs, we will be more than helpful.

• Closures, Hinges & Optional Lifting Davits.

We offer an exceptional O-Ring closure design up to 175 psig, and Blind Flange closures operating above 175 psig. Hinges are std. for blind flanges weighing more than 35 lbs., and lifting davits are available as well. Other closure options such as Threaded or Ring Joint Flange are also available. Teflon coated studs and nuts are available.

• Gauge Connections, Support Legs...

Legs are std. on many vessels. Differential pressure gauges, level gauges, and/or switches, adjustable support legs, pipe legs, special NDE (Non Destructive Examination ...like X-ray), mixed metals of construction, ie. stainless steel clean side, and other requests to meet the needs of your specific service environment are available, just ask.

• Superior Wall Thickness of Shells & Heads.

Minimum Schedule Std. Our 10" vessels have 0.365 walls where competitor's lesser drawn shells have only 0.120 to 0.130 walls. This means our vessels have much greater corrosion allowances, much more dependable closure seals, and eliminates shipping damage typical of drawn shell constructions.

• Stainless Steel Safety Cages are standard.

These removable cages have saved many a maintenance person who might have dropped a wrench or pen when changing out a filter element.

• Rust Inhibiting White Interior Enamel Standard!

Superior to clear coats. Everyone loves it! Sandblast and special finishes are available.

• Vessels Through 16" Diameter in a Hurry!

Our rapid 2 to 4 week delivery is legend!

• Detailed Approval Drawings are Fast!

Normally in a week, 2 weeks max. for complex requirements. (Yes, We do the tuff stuff! Try us.) We are very flexible on special orders and design modifications. Our non-code vessels are made from the same materials, quality and welding as our code vessels.

• ASME Code Stamp

Our companion organization, Rush Certified, Inc., is fully certified to provide the ASME Boiler & Pressure Vessel Code "U" Stamp as required by most states for unfired pressure vessels exceeding 15 psig. Each vessel is registered with the National Board of Boiler Pressure Vessel Inspectors. Our code stamp allows design service to 3000 psig.

Most jurisdictions (see table) require certain vessels to comply with the ASME Code. It is the responsibility of the end user to verify the requirements within their jurisdiction, and to advise if vessels are to contain lethal substances, i.e. poisonous gases or liquids of such nature that very small amounts could be dangerous to life (mixed or unmixed with air). ASME Code Section VIII Div. 1 covers pressure vessels for containment of internal or external pressure (vacuum). You should consider need for ASME Cert. when:

(A) Vessels have an internal or external operating pressure of greater than 15 psi max. (no size limitation) or

(B) Vessels have an inside diameter of greater than 6 inches, without limitation on length or pressure.

* Only portions of code.

Tabulation of the Boiler & Pressure Vessel Laws of the US & Canada Jurisdiction VIII(1)

AL.....Y	MO.....Y	WV.....N
AK.....N	MT.....N	WI.....Y
AZ.....N	NB.....Y	WY.....Y
AR.....Y	NV.....Y	Alb.....Y
CA.....Y	NH.....Y	B.C.....Y
CO.....Y	NJ.....Y	Man.....Y
CT.....N	NM.....N	N.B.....Y
DE.....Y	NY.....Y	N.F.&L.....Y
FL.....N	NC.....Y	NW.T.....Y
GA.....Y	ND.....Y	N.S.....Y
HI.....Y	OH.....Y	Ont.....Y
ID.....Y	OK.....Y	PE Is.....Y
IL.....Y	OR.....Y	Que.....Y
IN.....Y	PA.....Y	Sas.....Y
IA.....Y	PR.....Y	Y.Ter.....Y
KS.....Y	RI.....Y	Albuquerque... N
KY.....Y	SC.....N	Des Moines... N
LA.....N	SD.....N	Miami.....Y
ME.....Y	TN.....Y	New Orleans...Y
MD.....Y	TX.....N	Tucson.....Y
MA.....Y	UT.....Y	Univsty Cty...Y
MI.....Y*	VT.....Y	Dade Co.....Y
MN.....Y	VA.....Y	Jeff Parish...Y
MS.....Y	WA.....Y	St Louis Co...Y
		Dist.of Clmb...Y

