



Standard Specification for Cast (All Temperatures and Pressures) and Welded Pipe Line Strainers (150 psig and 150°F Maximum)¹

This standard is issued under the fixed designation F1199; the number immediately following the designation indicates the year of original adoption or, in the case of revision, the year of last revision. A number in parentheses indicates the year of last reapproval. A superscript epsilon (ε) indicates an editorial change since the last revision or reapproval.

1. Scope

1.1 This specification covers all cast strainers and welded strainers in services up to 150 psig and 150°F (1 MPa and 65°C). For welded strainers used in services above 150 psig and 150°F, see Specification F1200.

1.2 This standard provides the minimum requirements for the design, fabrication, rating, marking, and testing of cast and welded pipe line strainers for services above 0°F (–18°C).

1.3 Strainers manufactured to this specification are acceptable for use in the marine environment.

1.4 The values stated in inch-pound units are to be regarded as standard. The values given in parentheses are mathematical conversions to SI units that are provided for information only and are not considered standard.

1.5 The following safety hazards caveat pertains only to the test methods portion, Section 8, of this specification. *This standard does not purport to address all of the safety concerns, if any, associated with its use. It is the responsibility of the user of this standard to establish appropriate safety, health, and environmental practices and determine the applicability of regulatory limitations prior to use.*

1.6 *This international standard was developed in accordance with internationally recognized principles on standardization established in the Decision on Principles for the Development of International Standards, Guides and Recommendations issued by the World Trade Organization Technical Barriers to Trade (TBT) Committee.*

¹ This specification is under the jurisdiction of ASTM Committee F25 on Ships and Marine Technology and is the direct responsibility of Subcommittee F25.11 on Machinery and Piping Systems.

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2. Referenced Documents

2.1 ASTM Standards:²

F1200 Specification for Fabricated (Welded) Pipe Line Strainers (Above 150 psig and 150°F (1 MPa and 65°C))

2.2 ASME Standards:³

ASME Boiler and Pressure Vessel Code, Section VIII, Division 1 Pressure Vessels

B1.20.1 Pipe Threads, General Purpose, Inch

B16.1 Gray Iron Pipe Flanges and Flanged Fittings: Classes 25, 125, and 250

B16.3 Malleable Iron Threaded Fittings: Classes 150 and 300

B16.4 Gray Iron Threaded Fittings: Classes 125 and 150

B16.5 Pipe Flanges and Flanged Fittings: NPS 1/2 through NPS 24 Metric/Inch Standard

B16.11 Forged Fittings, Socket-Welding and Threaded

B16.15 Cast Copper Alloy Threaded Fittings: Classes 125 and 250

B16.24 Cast Copper Alloy Pipe Flanges, Flanged Fittings, and Valves: Classes 150, 300, 600, 900, 1500, and 2500

B16.25 Buttwelding Ends

B31.1 Power Piping

B31.3 Processing Piping

2.3 MSS Standards:⁴

SP-51 150 lb Corrosion Resistant Cast Flanges and Flanged Fittings

SP-63 High Strength Wrought Welding Fittings

3. Terminology

3.1 Definitions:

3.1.1 *basket or element, n*—the replaceable part in a strainer that performs the barrier separation of solid particles from flowing fluid. It is normally removable for cleaning and servicing and can be furnished in a wide variety of materials,

² For referenced ASTM standards, visit the ASTM website, www.astm.org, or contact ASTM Customer Service at service@astm.org. For *Annual Book of ASTM Standards* volume information, refer to the standard's Document Summary page on the ASTM website.

³ Available from American Society of Mechanical Engineers (ASME), ASME International Headquarters, Two Park Ave., New York, NY 10016-5990, <http://www.asme.org>.

⁴ Available from Manufacturers Standardization Society of the Valve and Fittings Industry (MSS), 127 Park St., NE, Vienna, VA 22180-4602, <http://www.mss-hq.org>.