

Pressure – Temperature Limits for TopFilter cast TFOV-A300 filters

1.0 Scope

- 1.1 This specification outlines the temperature related pressure limits in line with various flange drilling for TopFilter Cast TFOV-A300 Filters

2.0 Limitations

- 2.1 The maximum working pressure at any temperature is limited by either the flange drilling or the vessel rating - the lower value must always be used.
- 2.2 Ensure that suitable seal material is utilised for the intended operating temperature of the filter unit. The temperature limitations for common seal materials are shown below:

Viton® (or Flourocarbon, FPM)	-20°C to +200°C
Nitrile (or Buna N, NBR)	-30°C to +120°C
Ethylene Propylene (or EP, EPDM)	-50°C to +150°C
PTFE (Teflon) encapsulated Viton	-20°C to +200°C
PTFE (Teflon) encapsulated Silicone	-55°C to +260°C

Viton is a registered trademark of DuPont Performance Elastomers.

The above values are guidelines based upon absolute compatibility with the fluid and are not binding due to unaccountable factors that may be detrimental to the performance of the 'O' Rings.

- 2.3 All pressures are non-shock and do not account for excessive pressure or thermal cycling.
- 2.4 If in doubt about specific applications – contact SPX.
- 2.5 It is the customers responsibility to use suitable flange bolting materials and gaskets to connect the filter unit in line to facilitate the pressure values published.

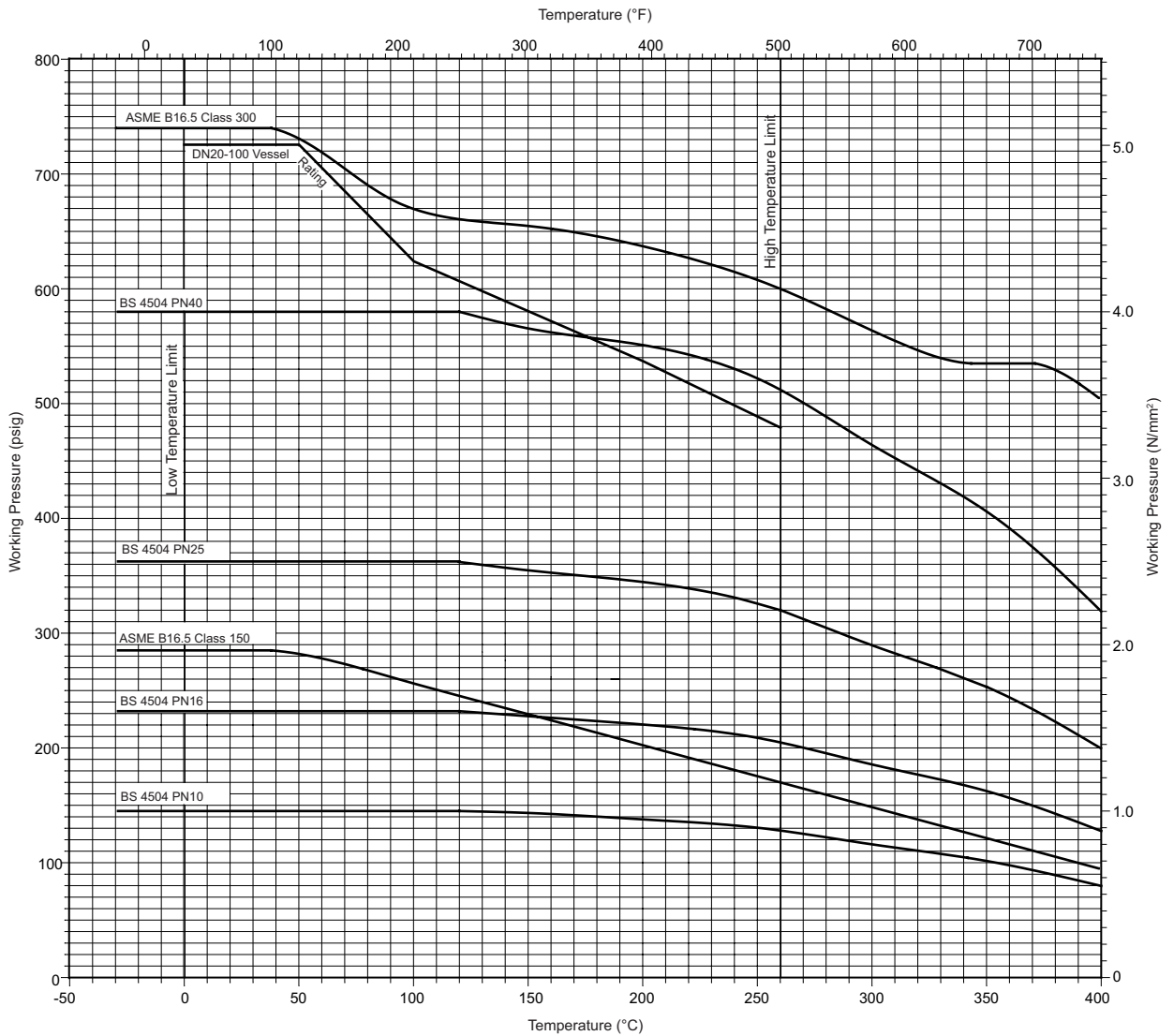
3.0 Reference Documents

- 3.1 The following standards have been referenced in this specification:
- ANSI B16.1, 16.24
 BSEN1092-2
 ASME B16.5a – 1998
 BS4504: Section 3.1, 3.3 – 1989

Issue	Original	Rev.1	Rev.2
Compiled by	K Dunks		
Approved by	S. Ivey		
Date	01/06/02		

Pressure – Temperature Limits for TopFilter cast TFOV-A300 filters

4.0 Pressure Temperature Curves – Carbon Steel TFOV-A300



TopFilter TFOVS-A300 Pressure Temperature Rating -- Cast Steel

5.0 Maximum Non-Shock Working Pressure At 50°C For TopFilter Cast Steel TFOV Filters:

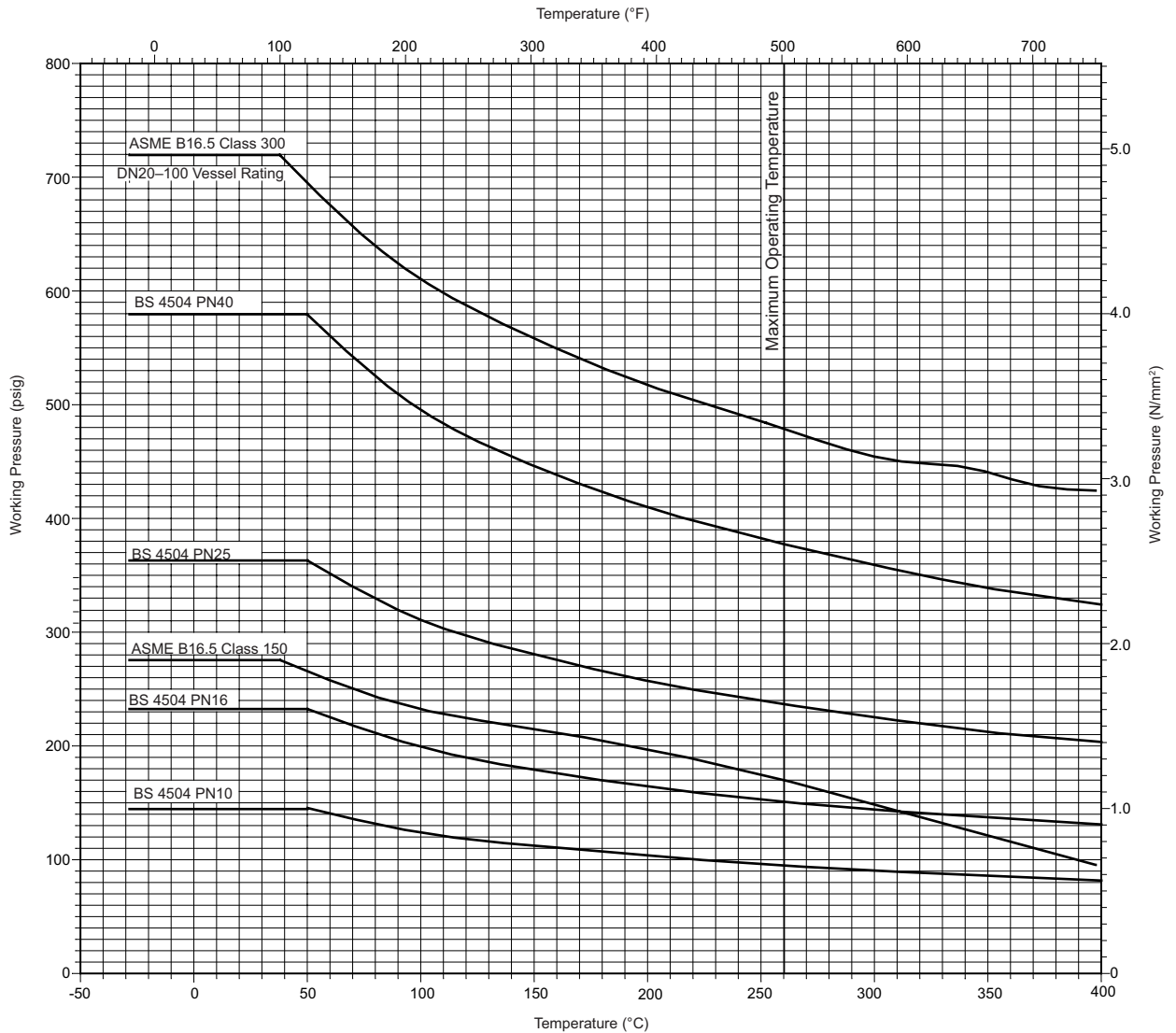
DN20, 25, 40, 50, 80, 100 50 barg @ 50°C

Caution should be taken on applications below 0°C (unless low temperature steel is specified).

Issue	Original	Rev.1	Rev.2
Compiled by	K Dunks		
Approved by	S. Ivey		
Date	01/06/02		

Pressure – Temperature Limits for TopFilter cast TFOV-A300 filters

6.0 Pressure Temperature Curves – Stainless Steel TFOV-A300:



TopFilter TFOV-A300 Pressure Temperature Rating -- Stainless Steel

7.0 Maximum Non-Shock Working Pressure At 50°C For TopFilter Cast Stainless Steel TFOV-A300 Filters:

Dn20, 25, 40, 50, 80, 100 48 barg @ 50°C

Issue	Original	Rev.1	Rev.2
Compiled by	K Dunks		
Approved by	S. Ivey		
Date	01/06/02		