



Certificate of Compliance

This certificate is issued for the following:

**High Density Polyethylene (PE100) Pipe and Fittings, SDR11
Sizes DN90 through DN630
(As shown in attached listing)**

Prepared for:

Simona AG
Teichweg 16
D55606 Kirn,
Germany

Manufactured at:

Simona AG
Teichweg 16
D55606 Kirn,
Germany

FM Approvals Class: 1613

Approval Identification: 0003051354

Approval Granted: November 17, 2014

To verify the availability of the Approved product, please refer to www.approvalguide.com

Said Approval is subject to satisfactory field performance, continuing Surveillance Audits, and strict conformity to the constructions as shown in the Approval Guide, an online resource of FM Approvals.

A handwritten signature in dark ink, appearing to read 'Richard B. Dunne', written over a horizontal line.

Richard B. Dunne
Manager of Fire Protection
FM Approvals
1151 Boston-Providence Turnpike
Norwood, MA 02062



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Product Designation	O.D., Pipe Size, mm.	Pressure Rating, bar (psi)	Remarks
<i>Butt-fusion Pipe</i>			
PE100 Pipe, SDR 11	90, 110, 125, 140, 160, 180, 200, 225, 250, 280, 315, 355, 400, 450, 500, 560, 630	12 bar (175)	a, b, c

Product Designation	O.D., Pipe Size, mm.	Pressure Rating, bar (psi)	Remarks
<i>Butt-fusion Fabricated and Segmented Fittings:</i>			
End caps, machined, SDR 11	315, 355, 400, 450, 500, 560, 630	12 bar (175)	a, b, c
Reducers concentric, machined, SDR 11	355x225, 355x250, 355x280, 355x315, 400x225, 400x250, 400x280, 400x315, 400x355, 450x280, 450x315, 450x355, 450x400, 500x315, 500x355, 500x400, 500x450, 560x400, 560x450, 560x500, 630x400, 630x450, 630x500, 630x560	12 bar (175)	a, b, c
Stub flanges for loose flange ISO/DIN, elongated, SDR 11	90, 110, 125, 140, 160, 180, 200, 225, 250, 280, 315, 355, 400, 450, 500, 560, 630	12 bar (175)	a, b, c



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Product Designation	O.D., Pipe Size, mm.	Pressure Rating, bar (psi)	Remarks
<i>Butt-fusion Fabricated and Segmented Fittings:</i>			
Tee with reduced branch, welded, SDR 11	140x90, 140x110, 160x90, 160x110, 180x90, 180x110, 180x125, 180x140, 200x110, 200x125, 200x140, 200x160, 225x90, 225x110, 225x140, 225x160, 225x180, 250x90, 250x110, 250x125, 250x140, 250x160, 250x180, 250x200, 280x90, 280x110, 280x125, 280x140, 280x160, 280x180, 280x200, 280x225, 315x90, 315x110, 315x125, 315x140, 315x160, 315x180, 315x200, 315x225, 315x250, 355x90, 355x110, 315x125, 315x140, 315x160, 315x180, 315x200, 315x225, 315x250, 355x90, 355x110, 355x125, 355x140, 355x160, 355x180, 355x200, 355x225, 355x250, 355x280, 400x90, 400x110, 400x125, 400x140, 400x160, 400x180, 400x200, 400x225, 400x250, 400x280, 400x315, 450x110, 450x125, 450x140, 450x160, 450x180, 450x200, 450x225, 450x250, 450x280, 450x315, 500x110, 500x125, 500x140, 500x160, 500x180, 500x200, 500x225, 500x250, 500x280, 500x315, 500x355, 560x160, 560x180, 560x200, 560x225, 560x250, 560x280, 560x315, 560x355, 560x400, 630x160, 630x180, 630x200, 630x225, 630x250, 630x280, 630x315, 630x355, 630x400	12 bar (175)	a, b, c



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Product Designation	O.D., Pipe Size, mm.	Pressure Rating, bar (psi)	Remarks
<i>Butt-fusion Injected Molded Fittings</i>			
Elbow, 90° with elongated spigots, injected, SDR 11	90, 110, 125, 140, 160, 180, 200, 225, 250, 280, 315, 355, 400	12 bar (175)	a, b, c
Elbow, 45° with elongated spigots, injected, SDR 11	90, 110, 125, 140, 160, 180, 200, 225, 250, 280, 315, 355, 400	12 bar (175)	a, b, c
End Cap, injected, SDR 11	90, 110, 125, 140, 160, 180, 200, 225, 250, 280, 315, 355, 400	12 bar (175)	a, b, c
End Cap, elongated, SDR 11	450, 500, 560, 630	12 bar (175)	a, b, c
Reducers concentric, injected, SDR 11	110x90, 125x90, 125x110, 140x90, 140x110, 140x125, 160x90, 160x110, 160x125, 160x140, 180x90, 180x110, 180x125, 180x160, 200x140, 200x160, 200x180, 225x160, 225x180, 225x200, 250x160, 250x180, 250x200, 250x225, 280x200, 280x225, 280x250, 315x225, 315x250, 315x280	12 bar (175)	a, b, c
Equal Tee, injected with elongated spigots, SDR 11	90, 110, 125, 140, 160, 180, 200, 225, 250, 280, 315, 355, 400, 450, 500	12 bar (175)	a, b, c
Tee with reduced branch,	110x90, 125x110, 160x110, 180x160, 200x110, 200x160, 225x90, 225x110,	12 bar (175)	a, b, c



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Product Designation	O.D., Pipe Size, mm.	Pressure Rating, bar (psi)	Remarks
<i>Butt-fusion Injected Molded Fittings</i>			
injected, SDR 11	225x160, 225x180, 250x110, 250x160, 315x110, 315x160, 315x250		
Backing Ring, SDR 11	90, 110, 125, 140, 160, 180, 200, 225, 250, 280, 315, 355, 400, 450, 500, 560, 630	12 bar (175)	a, b, c
Blind Flange, injected, SDR 11	90, 110, 125, 140, 160, 180, 200, 225, 250, 280, 315, 355, 400	12 bar (175)	a, b, c
Special flange, injected, SDR 11	250, 280, 315, 355, 400, 450, 500, 560, 630	12 bar (175)	a, b, c

Remarks:

- a. Dimensions refer to the pipe outside diameter. Pipes and fittings to be connected by butt-fusion welding only.
- b. The manufacturer's butt-fusion welding instructions must be strictly adhered to for a proper joint.
- c. The fittings are manufactured of injection molded PE100.



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