

W-DESIGN for maximum movements

PROCO Style 540 W-Type Duct Connectors: An economical integrally flanged design, the Style 540 is predominately used for applications where there are large movements. The duct connector is manufactured in a W-Design configuration with a minimum of one (1) to two (2) plies of reinforced fabric vulcanized into a homogeneous product that is 3/16", 1/ 4" or 3/8" thick. The flanges shall be an integral part of the expansion joint. The Style 540 is manufactured with a premolded arch. The arch continues through the corner and shall be fully developed when in the neutral position. Listed below are considerations regarding the design of the Style 540 non-metallic duct connectors:

System Design Considerations: In designing the Series 500, Style 540 non-metallic duct connector, several considerations must be taken into account to ensure long lasting service.

• System Media: The designer and/or requesting party should define the system media to determine the correct elastomer for each application. Evaluation of the gas/air composition should be made during design of the non-metallic fan/duct connector. Abrasion characteristics and external environment conditions should also be taken into account when specifying the fabric element.

• System Temperature: The system operating temperature is of primary importance to the design of a non-metallic fan/duct connector, although the system design is generally specified. It is important to distinguish between operating and design as "design" can include a significant safety factor which may result in an upgraded material or design selection.

• System Pressure: Normal operating pressures and maximum pressures (positive and negative) under upset conditions should be specified. Combinations of pressures and temperatures should be specifically identified.

• Movements: Movements consist of thermal growth resulting from both operating and upset conditions. Individual movements resulting from both conditions should be specified. Maximum installation misalignment should also be taken into account to determine if the non-metallic fan/duct connector design is capable of reacting to a combination of the total maximum movements.

	Style 540 Available Materials										
	ific Elastomer endations, Se	PROCO [™] "Chemical To Elastomer Guide"									
Styles	PROCO Material Code	Elastomer	Nominal Body Thickness	No. of Reinforcement Plies	Maximum Operating Temp °F	Maximum Pressure Rating (PSI)					
540	BB EE HH	Chlorobutyl EPDM Hypalon®	3/16"	1	300° 300° 225°	±2					
540	NH NN NP VV	Neoprene/Hypalon® Neoprene Neoprene/Buna-N Viton®	1/4" 3/8"	2 2	225° 212° 212° 400°	±3 ±5					

NOTES: Hypalon and Viton are registered trademarks of DuDont Dow Elastomers

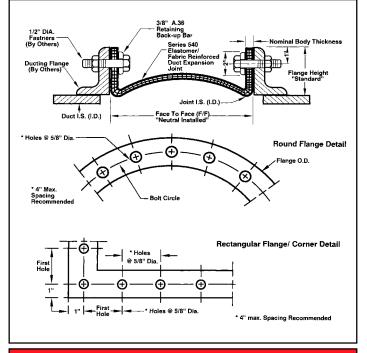
GOODYEAR

3

Expansion Joint "Cover" (outside) can be Hypalon painted on special order. Standard fabric reinforcement is polyester. Other high temperature materials are available upon request. For vacuum applications, all fabric elements should retain sufficient setback from the duct to ensure that belting does not protrude into the flow stream.

Non-Metallic Fan/Duct Connector Weight (pounds per square foot of periphery)									
Nominal		Retaining							
Body Thickness	Chloro- butyl	EPDM	Hypalon®	Neoprene/ Hypalon®	Neoprene	Neoprene/ Buna-N	Viton®	Rings/Bars Linear/Foot	
1/4"	1.6	1.6	1.8	1.8	1.8	1.8	2.5	9.5	
3/8"	2.5	2.5	2.6	2.6	2.6	2.6	4.8	3.5	

Maximum Movement Capabilities 6" Face To Face 9" Face To Face 12" Face To Face mpressid (Inches) Lateral Offset (Inches) Axial Extensir Inches Lateral Offset Inches Extensio (Inches Lateral Offset Inches Axial Inches Axial Inches Axial Axial Axial Extensi 2 .50 .75 2.0 .75 1.5 3.75 1.0 2.5 1.5



Design Data Sheet Fan/Duct Connector - Style 540

					`			<u> </u>	
Elastomer Guide"			F	Tag No.:					
of ement s	Maximur Operatin Temp °F	g Pressure		ltem	Quantity:				
	300° 300° 225° 225°	±2 ±3		E	Equipment Adjacent The Connector:				
	212° 212° 400°	±5	Application		Media: Gas or Air (circle one)		G	А	
ners order. laterials a	iers			AI	Location of Joint: (Inlet, Discharge, Bypass)				
setback from the duct to ensure that				Size	Duct I.S. or Diameter:				
or We	eight			Si	Face To Face:				IN.
eoprene/ Buna-N	Viton®	Retaining Rings/Bars Linear/Foot		Temperature	Operating:				°F
1.8 2.6	2.5 4.8	3.5	-	Tempe	Design:				°F
2.6 4.8			Pressure	Operating:				PSI	
12" Face To Face			Pres	Design:				PSI	
Axial Compression (Inches)	Axial Extension	(Inches) Lateral Offset (Inches)	Lateral Offset (Inches)	Movements	Axial Compression:				IN.
3.75			Over		Axial Extension:				IN.
moreccio	n Greater Is	ateral offeet may h						III a	O In i an
To	II F	ree: i	1-	8	66-711-	4673	5	 We	SNIP

WebSales@GoodyearRubberProducts.com

We Ship World Wide