Technical Construction File

Altra Doc No:
E2011-9

EU Declaration of Conformity
Declaration of Incorporation

MANUFACTURER: TB Wood's Incorporated
440 North Fifth Avenue
Chambersburg, PA 17201-1778
888-829-6637
www.tbwoods.com

PRODUCT DESCRIPTION: **Sure-Flex®Plus Elastomeric Couplings**

PART NUMBERS: J, S, B, SC, C, JE, JN, JES, JNS, E, N, H, U, HS

APPLICABLE EUROPEAN DIRECTIVES:

Machinery: 06/42/EC
ATEX: 14/34/EU

APPLICABLE INTERNATIONAL STANDARDS:

Machinery: EN 12100:2010
ATEX: EN 1127-1:2011, EN 13463-1:2009, EN 13463-5

The above part numbers are suitable for use with equipment that meets the Group II Category 2 requirements and are in accordance with the following explosion protection class:

CE Ex II 2 GD c T4
EPDM / HYTREL

CE Ex II 2 GD c T5
NEOPRENE / URETHANE

ATEX Retention Certificate held by:
DNV Nemko Presafe AS,
Gaustadalleen 30, 0373 Oslo, Norway

Authorized Signature: Date: April 20, 2016

Timothy C Hewitt
Principal Engineer – Elastomeric Couplings

The equipment described in this Declaration of Incorporation to the Machinery Directive complies with the relevant sections of the Applicable International Standards. Integration instructions are provided that contain requirements and specifications that must be implemented prior to putting this equipment into service; this equipment must not be put into service before the machinery into which it is to be incorporated has been declared in conformity with the provisions of the Machinery Directive.

The product described in this EU Declaration of Conformity complies with the ATEX Directive and relevant sections of the Applicable International Standards. Integration instructions are provided that contain requirements and specifications that must be implemented prior to putting this equipment into service. The signature on this document authorizes the distinctive ATEX marking to be applied to this equipment

All EHSR's related to this equipment have been addressed; a Technical Construction File is available for inspection by designated bodies.

Important safety information is contained in the installation, operation and service manuals; read and understand this information prior to installing or using this equipment

Sure-Flex®Plus SLEEVE RATINGS

SIZE:	Sure-Flex®Plus SLEEVE MATERIAL AND TYPE DESIGNATION:				RATED TORQUE: Nm	RATED TORQUE: (in-lbf)	AMBIENT TEMPERATURE LIMITS (1):	ATEX SURFACE TEMPERATURE RATING (1):
3	EPDM	JE, JES	Neoprene	JN, JNS	8.8	78	EPDM -34 TO 125 C (-30 TO 257 F)	EPDM 135 C/ T4
4		E, JE, JES		N, JN, JNS	17.6	156		
5		E, JE, JES		N, JN, JNS	35.3	312		
6		E, JE, JES		N, JN, JNS	66.1	585		
7		E, JE, JES		N, JN, JNS	106.2	940		
8		E, JE, JES		N, JN, JNS	166.7	1475		
9		E, JE, JES		N	264.4	2340		
10		E, JE, JES		N	422.0	3735	NEOPRENE -18 TO 90 C (0 TO 194 F)	NEOPRENE 100 C/ T5
11		E		N	665.5	5890		
12		E		N	1058	9360		
13		E		N	1667	14755		
14		E		N	2644	23400		
16		E			5339	47250		
6	Urethane		Hytrel	H, HS	203.4	1800	HYTREL -54 TO 121 C (-65 TO 250 F)	HYTREL 135 C/ T4
7				H, HS	324.8	2875		
8				H, HS	511.8	4530		
9				H, HS	813.5	7200		
10		U		H, HS	1282	11350	URETHANE -62 TO 90 C (-80 TO 194 F)	URETHANE 100 C/ T5
11		U		H, HS	2034	18000		
12		U		H, HS	3559	31500		
13				HS	5341	47268		
14				HS	8189	72480		

(1) For applications involving vibratory torque or reversing load conditions, consult factory for max temp limits

Inspection, Maintenance and Cleaning: The following checks and maintenance items are to be used as a guideline for the safe operation. Any unsafe condition should be corrected when discovered. The frequency of checks depends on the operating conditions. A maintenance schedule frequency should be chosen that is suitable to the conditions for the safe operation of the coupling. Clean the coupling only with a water dampened cloth.

Sleeve Degradation: Sleeve should be checked regularly for cracks, wear, discoloration, distortion, & crazing. If the sleeve shows any signs of these types of wear, it needs to be replaced. Also, an examination of the application and environment should be conducted to find out the reason and correct it. If the coupling does not display any of the above signs of degradation and the integrity or condition of the coupling sleeve is uncertain, it should be replaced once a year.

Dust: Wipe off any excess dust or residue on the coupling, including the teeth of both the sleeve and flanges.

INTEGRATION INSTRUCTIONS: These instructions are provided as a supplement to the standard Installation Instructions provided with the Sure-Flex®Plus products for ATEX certified product for use in certain explosive atmospheres. All aspects of the standard Installation Instructions not specifically covered here are to be adhered to. Rated application limits for the material and type of sleeve used are shown in the table above. The Sure-Flex®Plus sleeves installed must be rated for the conditions of the application. All electrically conducting parts that are connected to the coupling must be grounded. Applications with vibratory torque conditions require a de-rated temperature class, (consult TB Wood's).

Guards: Guards are required for use on couplings in an explosive environment as defined by the ATEX Directive. The guard must be of a Corrosion resistant construction, of a metallic material other than Aluminum or any light metal, and must be electrically grounded. If a ferrous material is used, then it must have sufficient coating/plating to resist corrosion.

Alignment: The coupling alignment must be within the misalignment limits for the Sure-Flex®Plus sleeve material per the standard Installation and Maintenance Instructions included with the product.

Fastener and Set Screw Tightening Torques: All fasteners must be tightened per the standard Installation and Maintenance Instructions included with the product