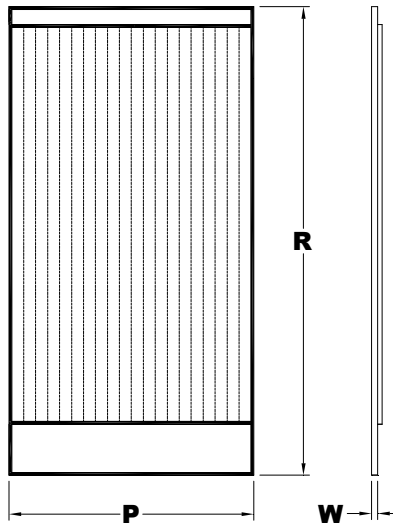


## QSW (Quick Shrink Wrap) Adhesive-Lined Polyolefin Wraparound Repair Sleeve




**Table 1: Dimensions**

Size	Substrate Diameter Range	Dimension P +1 mm (0.04 in.), - 0	Dimension R ± 6 mm (0.24 in.)
	mm (in.)	mm (in.)	mm (in.)
QSW-60-100	10 (0.4) – 20 (0.8)	60 (2.4)	100 (4.0)
QSW-60-200	20 (0.8) – 50 (2.0)	60 (2.4)	200 (7.9)
QSW-60-300	40 (1.6) – 75 (3.0)	60 (2.4)	300 (11.8)
QSW-60-400	50 (2.0) – 100 (4.0)	60 (2.4)	400 (15.7)
QSW-100-100	10 (0.4) – 20 (0.8)	100 (4.0)	100 (4.0)
QSW-100-200	20 (0.8) – 50 (2.0)	100 (4.0)	200 (7.9)
QSW-100-300	40 (1.6) – 75 (3.0)	100 (4.0)	300 (11.8)

- Notes:** 1. Dimension **W** (wall thickness): 0.65 mm (0.025 in.) nominal  
2. Dimension **R** (length of sheet) shrinks approximately 10%

**Material:** QSW sleeves shall be fabricated from irradiated modified polyolefin compounded to produce a homogeneous, uniform product whose exterior surface is essentially free from flaws, defects, pinholes, seams, cracks or inclusions, and the color shall be black. The interior shall be coated with a hot melt thermoplastic adhesive.

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		TE Connectivity 305 Constitution Drive Menlo Park, CA 94025 USA		Raychem Tubing		Title: QSW (Quick Shrink Wrap) Adhesive-Lined Polyolefin Wraparound Repair Sleeve	
						Document No : <b>QSW</b>	
TE Connectivity reserves the right to amend this drawing at any time. Users should evaluate the suitability of the product for their application.							
Cage Code: 06090	Scale: None	Size: A	Rev. Date: 15-Apr-11	Rev: B1	Sheet: 1 of 2		

**Table 2: Properties**

Property	Unit	Requirement	Test Method
Tensile Strength	psi (MPa)	2466 (17) minimum	ASTM D412
Ultimate Elongation	percent	350 minimum	ASTM D412
Specific Gravity	- - -	1.05 maximum	ASTM D792
Hardness	shore D	40-50	ASTM D2240
Accelerated Aging 168 hrs @ 150 ± 2°C (302 ± 4°F) followed by tests for:			ASTM D2671
Tensile Strength	psi (MPa)	1740 (12) minimum	ASTM D412
Ultimate Elongation	percent	200 minimum	ASTM D412
Low Temperature Flexibility 4 hrs @ -40 ± 3°C (-40 ± 5°F)	---	No cracking	ASTM D2671 Procedure C
Dielectric Strength	V/mil (kV/cm)	500 (200) minimum	ASTM D2671
Volume Resistivity	ohm-cm	1 x 10 <sup>12</sup> minimum	ASTM D2671
Water Absorption 168 hrs @ 23 ± 2°C (73 ± 4°F)	percent	0.2 maximum	ASTM D2671
Fluid Resistance 24 hours @ 23 ± 2°C (73 ± 4°F) in: Hydraulic Fluid (MIL-H-5606) JP-8 (MIL-T-5624) Lubricating Oil (MIL-L-7808) Lubricating Oil (MIL-L-23699) 5 percent NaCl (A-A-694) Deicing Fluid (MIL-A-8243) Skydrol 500			AMS-DTL-23053/5
Followed by tests for:			
Tensile Strength	psi (MPa)	1000 (6.9) minimum	ASTM D412
Dielectric Strength	V/mil (kV/mm)	400 (15.8) minimum	ASTM D2671
Weathering	The material from which QSW is manufactured contains carbon black to protect it from ultraviolet radiation.		

- Acceptance Tests:**
- 1. Dimensional** (1 piece per lot): Shall meet the specified dimensions.
  - 2. Visual** (20 pieces per lot): Both backing and adhesive surfaces shall be essentially free from flaws, defects, pinholes, seams or cracks, and must have clean cut edges.
  - 3. Application** (1 piece per lot): 15 minutes @ 175 ± 2°C; No slip page, bubbles or flaws.

Customer Drawing

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