

# Self-Fusing Silicone Tapes

ARLON® and MOX-Tape® silicone tapes are produced from specially formulated silicone rubber. They bond irreversibly to provide an insulative barrier that is resistant to moisture, oxygen, ozone, and corona over a wide temperature range -54°C up to +260°C (-65°F up to +500°F). These products provide superior electrical insulation with a dielectric strength of 300 VPM minimum at 180°C (356°F).

## Applications:

### Mechanical

- Wire Harness and Bundling Wrap
- Emergency Pipe and Hose Repair
- Pipe Identification
- Air Duct Sealing
- Coolant Line Repairs
- Traction and Protection for Rollers

### Electrical

- Insulation for Splicing and Terminating Wire and Cable
- Coil Insulation in Motors
- Insulating and Sealing of Electrical Connections
- Motor Connection Wrapping
- Cable Management
- Weatherproofing

### Extreme Environments

- Space and Aviation
- Heated Transfer Lines
- Radioactive Environments
- Riggings and Power Systems in Marine
- Underwater

Properties	
Temperature Range	-54°C to +260°C (-65°F to +500°F)
Volume Resistivity	10 <sup>13</sup> ohm-cm min. (ASTM D257)
Self Adhesion	2 p.p.i min. (3.5 N/cm) (ASTM D2240)
Hardness	50± 10 Shore A (ASTM D2240)
Moisture Absorption	0.9% - 46 hrs. in H <sub>2</sub> O @ 21°C (70°F)

Performance Advantages
No Adhesive: Chemically bonds to itself at room temperature within 24 hours
Remains non-tacky to the touch and does not adhere to other substrates or surfaces
Removes cleanly and easily
Insulates with a single wrap reducing labor time and cost
Resists moisture, oxygen and ozone to ensure continuous high insulation values
Available in flame retardant options with UL-V0 rated compound
Resists heat, mechanical shock, corona and dampens vibration
Conforms smoothly when wrapped around complex forms
All tapes are protected by a special interleaved liner

Note: The above properties are published as a guide only and should not be used for specification development without testing in your own laboratory.

ARLON and MOX-Tape self-fusing silicone tapes have a 24 month shelf life\* from the date of manufacture when stored at 21°C +/- 3°C (70°F +/- 5°F) unless stated otherwise in product specific literature, labels, or certificates of conformance.

\* Not including ARLON 10 mil Rectangle which has a shelf life of 12 months.

# Self-Fusing Silicone Tapes

## ARLON and Mox Tape Rectangular Tape

Rectangular tape is of uniform thickness and is ideal for applications where a smooth, even layer of tape is not required.



Tape Cross Section



Bonded Cross Section

## ARLON and MOX Tape Fiberglass Reinforced Tape

These self-fusing silicone tapes incorporate a sinusoidal fiberglass fabric that gives a controlled elongation and increased tear resistance. 15% and 25% controlled elongation fabrics are available.



Tape Cross Section

Sinusoidal Fabric, Controlled Stretch

15 or 25% Elongation



## ARLON and Mox-Tape Triangular Tape

The triangular tapes have a tapered edge and a colored guide line along the apex which makes wrapping with a 50% overlap simple and repeatable. These tapes are ideal for applications requiring a smooth, even layer of tape.



Tape Cross Section



Bonded Cross Section

## Product Nomenclature

A	2	0	2	0	-	R	0	0	4	-	1	2	
													<b>Roll Length (in Linear Yards)</b>
													12 12 Linear Yards (example)
													<b>Width (in .025" increments)</b>
													004 1.0" (4 x 0.25")
													<b>Color*</b>
													R Red
													B Black
													W White
													X Gray
													*other colors available
													<b>Thickness</b>
													20 0.020" thick (example)
													<b>Construction Type</b>
													10 Unsupported, Rectangular Profile
													20 Unsupported, Triangular Profile
													30 25% controlled elongation fiberglass support, Rectangular Profile
													40 15% controlled elongation fiberglass support, Rectangular Profile
													<b>Silicone Tape Brand</b>
													A ARLON
													T MOX-Tape

## Certifications

Products can also be certified to many of the following specifications upon request.

MIL-I-46852C, Type 1 & Type 2  
 A-A-59163A, Type 1 & Type 2  
 MIL-I-22444C  
 Boeing DMS2186 Type 1 & Type 2  
 Lockheed Martin MMS J517  
 Lockheed Martin 5-00857  
 General Electric A50A493  
 General Electric A50E112  
 General Dynamics P5384  
 Rohr RMS315; Type 1, Type 2 & Type 3  
 FAR 25.853  
 UL V-0