Request a Quote

(800) 775-6525 Fax: (800) 421-2923
engineering@marcorubber.com
www.marcorubber.com

Marco Compound # F1006
40 Durometer, Blue, Commercial Grade
Technical Datasheet

Common Names:
Fluorosilicone, FVMQ

General Description:
Fluorosilicone is a widely used elastomer that can be compounded to meet a wide range of application conditions. The mechanical and physical properties are very similar to silicone rubber. However, fluorosilicone offers improved fuel and mineral oil resistance but poor hot air resistance when compared with silicone. This material is widely used in semiconductor Ashing equipment for its resistance to oxygen plasma. Please contact engineering@marcorubber.com for assistance in selecting a specialized compound when increased resistance to temperature, lubricants, or physical properties is required.

Features:
- Excellent flexibility and resistance to compression set
- Excellent resistance to aging and weather-sunlight
- Resistance to oxidizing chemicals, animal and vegetable oils, fuels, aromatic and chlorinated solvents
- Resistant to diluted alkalies, diester oils, aliphatic and aromatic fluorocarbons, silicone oil, toluene, benzene, ozone and oxidative environments.

Limitations:
- Brake fluids, ketones, hydrazine, adelhydes, amines, ketones
- Poor abrasion resistance

Service Temperature:
-100 to 350º F (-73 to 177°C)

Specification:
ASTM D2000 M2FK406 A19 EF31 EO36

PHYSICAL PROPERTIES

ORIGINAL PROPERTIES	ASTM D2000 Requirements	Typical Test Results
Hardness, Shore A	40 +/- 5	38
Color	Blue	Blue
Tensile Strength, MPa (psi)	6.0 (870)	7.9 (1146)
Ultimate Elongation	150	447
Specific Gravity	-----	1.437

HEAT RESISTANCE – A19, ASTM D 573 (70 hrs. @ 200°C)	ASTM D2000 Requirements	Typical Test Results
Hardness Change, Shore A, ASTM D2240	+15	+1
Tensile Strength Change, %, ASTM D412	-45 (max)	-25
Ultimate Elongation Change, %, ASTM D412	-45 (max)	-23

Request a Quote

COMPRESSION SET – ASTM D 395 Method B (22 hrs. @ 175°C)	**ASTM D2000 Requirements**	**Typical Test Results**
Permanent Set %	-----	+10

FLUID RESISTANCE – ASTM Fuel C – EF31, ASTM D 471 (70 hrs. @ 23°C)	**ASTM D2000 Requirements**	**Typical Test Results**
Hardness Change, Shore A, ASTM D2240	0 to +15	-5
Tensile Strength Change, %, ASTM D412	-60	-19
Ultimate Elongation Change, %, ASTM D412	-50	-17
Volume Change, %, ASTM D412	0 to +25	+20

FLUID RESISTANCE – ASTM #3 Oil – EO36, ASTM D 471 (70 hrs. @ 150°C)	**ASTM D2000 Requirements**	**Typical Test Results**
Hardness Change, Shore A, ASTM D2240	0 to 10	-5
Tensile Strength Change, %, ASTM D412	-35	-17
Ultimate Elongation Change, %, ASTM D412	-30	-27
Volume Change, %, ASTM D412	0 to +10	+3

Date: 2015-08-27