



## FEROFORM F365

Tank Insulation and Support Pad for LNG/LPG Vessels

FEROFORM F365 is a tank insulation and support pad designed specifically for LNG and LPG vessels. FEROFORM F365 is a compact support pad that offers advantages during installation and vessel/tank design. Unlike traditional LNG/LPG tank pads, FEROFORM F365 has excellent shear strength qualities that drastically reduces the risk of delamination of the material during temperature changes.

Feroform F365	Technical Data Sheet
Product Description	Tenmat FEROFORM F365 has been specially developed as a high-performance bearing material ideal for low temperature bearing applications. This low friction composite material exhibits superior thermal insulation and strength properties. Thus, FEROFORM materials have been used in challenging temperature applications for over 25 years.
Product Advantages	<ul> <li>FEROFORM F3635 has low thermal conductivity and as such achieves a significant temperature difference across the pad thickness.</li> <li>FEROFORM F365, reinforced with high quality engineering fibres, has up to 7 times the shear strength properties of traditional support systems</li> <li>For over 25 years, FEROFORM composites have been successfully used as tank supports on a range of different sized vessels - including the largest vessels in the world in their class</li> </ul>
Storage	<ul> <li>To be stored in a dry location</li> <li>Take care not to exceed safe working loads and heights for storage shelves and racks</li> </ul>
Working Life	All Tenmat tanker pads come with a warranty for the lifetime of the ship after completion of an FEM Analysis.
Warranty	All Tenmat products come with a warranty for the lifetime of the ship.



Feroform F365 **Technical Data Sheet** 

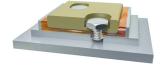
## **Physical Properties**



Property	Units	F365
Density	g/cm³	1.54
Flexural Strength	MPa	175
Flexural Modulus	GPa	7.7
Compressive Strength	MPa	
20 °C		300
-196 °C		470
Compressive Modulus	GPa	
20 ℃		3.3
-196 °C		3.8
Tensile Strength	MPa	130
Charpy Impact Notched	kJ/m²	80
Shear Strength	MPa	
20 °C		100
-196 °C		140
Compressive Yield @ 68.9 Mpa	%	
20 °C		7.3
-196 °C		6.2
Brinell Hardness		38
Swell in Water (24 hours)	%	
20 °C		0.3
80 °C		1.3
Coefficient of Thermal Expansion	x 10-6/°C	
Parallel		19
Perpendicular		30
Coefficient of Friction (Unlubricated)		0.21-0.26
Maximum Operating Temperature	°C	
Continuous		200
Intermittent		300
Normal Working Pressure	MPa	80

## **Typical Installations**









Typical support rib arrangement

Typical no penetration Typical support pillar arrangement

arrangement

Side load installation: Typical anti pitch / roll pad arrangement

## FEROFORM F3635

Tenmat Ltd Ashburton Rd West, Manchester M17 1TD United Kingdom

+44 161 872 2181 marine@tenmat.com

tenmat.com



Advanced materials. tenmat.com

Tenmat warrants the materials it produces will conform to Tenmat specifications and approved drawings where applicable. It is entirely the customer's responsibility to make the final product choice and satisfy themselves of the suitability of the product for the intended application, carrying out testing where required. For construction projects, all products which the customer is intending to use on a particular project must be approved in writing by the customer's building designer, system designer or design control professional, to ensure compliance with the latest regulations.

The information contained in Tenmat data sheets is presented in good faith. The values are "typical only" and are based on test results generally in accordance with BS2782, ASTM, a variety of other main test bodies along with Tenmat internal test methods. These values should not be relied upon for specification purposes or the primary selection of materials. As the data sheet values are typical only, Tenmat does not warrant the conformity of its materials to these properties or the suitability of its materials for any particular purpose. It is the responsibility of the customer to do the necessary testing and satisfy themselves the product is suitable for the intended application.