



ISO JF180

Jet Fire Jacket System

Engineered by  GARDYON

PRODUCT INFORMATION & FIRE TEST CERTIFICATION SUMMARY

ISO-JF180 Engineered Jet Fire Flexible Jacket System

A Fire Protection System Designed, Tested, & Certified:
Jet Fire | Rapid Rise Hydrocarbon | Cellulosic | Weatherability



ISO JF180

Jet Fire Jacket System

Engineered by **GARDYON**

Product Overview

The **GARDYON ISO JF180** Jet Fire Jacket System is a premier fire protection solution that has been supplied extensively to the Oil & Gas Industry for both onshore and offshore applications. It is designed and manufactured as a removable, compact, flexible and adaptable system, using a combination of quality materials, reinforced with a fine gauge stainless steel mesh.

The **GARDYON ISO JF180** Jet Fire Jacket System is simple to install and assemble, and just as easy to dismantle and reassemble. This jacket system is specifically engineered to fit closely around the protected equipment providing a removable, compact and user friendly enclosure. The flexibility enables efficient installation in areas where access is difficult or where the shapes of the protected item make conventional systems impossible to install. The system is constructed from pre-shaped panels designed to fit together around the equipment to be protected.

This engineered fire protection system has been designed to withstand the harsh environmental conditions experienced by offshore installations located in any part of the world. In addition, the stainless mesh system ensures that the day to day knocks are absorbed without detriment to the integrity of the system's mechanical strength. The system can be designed to withstand any fire scenario envisaged by the safety case or deemed required by a regulatory authority because the jacket system has been tested and certified to the most onerous of fire test standards, namely, ISO Jet Fire test standard 22899.

Features & Benefits

- Uses a combination of quality materials, reinforced with a fine gauge stainless steel mesh to ensure flexibility and adaptability
- Meets strict fire resistance standards:
 - Can be designed to withstand any fire scenario
 - Meets requirements of regulatory authorities
 - Certified by Lloyd's Register to:
 - Jet Fire ISO 22899
 - Pool Fire UL 1709for up to 3 hours
 - Blast Pressure 2.5 Bar
- Ability to withstand harsh environmental conditions
- Mechanically durable – Durable design and high mechanical strength withstands day-to-day knocks and handling
- Design enables efficient installation - Simple to install, easy disassembly & re-assembly
- Accommodates difficult to access locations
- Accommodates irregular shapes where traditional systems are not suitable
- Tailor made with full technical support
- Track record
- Specific design to the fire type, duration, limiting unexposed temperature
- Inspection hatches, etc can be incorporated



Application Areas



- PIPING - services, risers, hydrants, etc
- FLANGED JOINTS
- VALVES & ACTUATORS
- JUNCTION BOXES & CONTROL CABINETS
- STRUCTURAL STEELWORK
- CABLE TRAYS

- CONDUITS
- RISER BALCONIES
- PIPE SUPPORTS
- VESSELS & TANKS
- MANWAYS
- INSPECTION HATCHES

Jet Fire Testing & Certification

The **GARDYON ISO JF180** Jet Fire Jacket System is tested to ISO 22899 and Certified by Lloyd's Register and American Bureau of Shipping.

Product Description

The **GARDYON ISO JF180** Jet Fire Jacket System is a flexible fire-insulating enclosure system comprising of multiple layers of specially treated fire resistant materials of varying densities held under compression using a unique system of fasteners. The fasteners hold the components in this system together to ensure that all materials remain securely held together preventing any movement or slumping which does occur with lower quality insulation jacket systems.

ISO JF180 is manufactured using a combination of quality materials, reinforced with a fine gauge stainless steel mesh which ensures a highly flexible and adaptable system.

The system is designed for ease of handling and is totally demountable and reusable.

Weathering

A combination of high performance weather resistant fabrics has proven particularly suitable for the outer skin of the **ISO JF180** providing excellent resistance to weathering and the fact that it can be used in a wide range of operational temperatures (between -40 °C and 300 °C). The silicone layer fabric burns with virtually no toxic decomposition.

Quality Assurance Organization

Design and Engineering, Manufacture and Installation of the **GARDYON ISO JF180** Jet Fire Jacket System is in accordance with OHSAS 18001:2007.

Quality Management Systems shall be followed against the requirements of BS EN ISO 9001:2008.



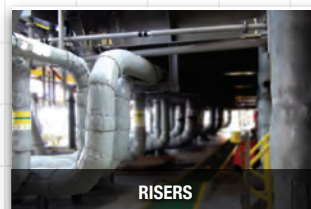
ESDV



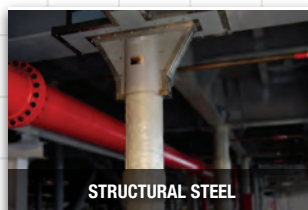
PIPE SUPPORTS



VALVES & PIPEWORK



RISERS



STRUCTURAL STEEL



FIRE WATER SYSTEMS



FLARE TOWER STRUCTURE



STRUCTURAL SUPPORTS



STRUCTURAL SUPPORTS



STRUCTURAL SUPPORTS



ISO JF180
Jet Fire Jacket System

Engineered by GARDYON

Fire Test Certification Summary

CERTIFICATE NO.	CLASSIFICATION	TEST STANDARD
SAS F120013	JF/Pipes – Pressure Vessel/200/40min	ISO 22899
SAS F120014	JF/Pipes - Pressure Vessel/100/180min	ISO 22899
SAS F120015	JF/Pipes - Pressure Vessel/75/180min	ISO 22899
SAS F110405	JF/Pipes - Pressure Vessel/200/75min	ISO 22899
SAS F120016	JF/75/180 Range of classifications	ISO 22899
14-LD1217211C-PDA	JF/Tubular Member/200/65	ISO 22899
14-LD1217211C-PDA	JF/Tubular Member/400/180	ISO 22899
14-LD1217211C-PDA	JF/Tubular Member/200/40	ISO 22899
14-LD1217211C-PDA	JF/Tubular Member/400/55	ISO 22899
14-LD1217211C-PDA	JF/Tubular Member/550/70	ISO 22899
14-LD1217211C-PDA	Tubular Member 107 minutes	UL-1709
14-LD1217211C-PDA	Tubular Member 294 minutes	UL-1709
SAS F150316	JF/Various Applications/200/25 (Blast Rated)	ISO 22899
SAS F150316	JF/Various Applications/600/100 (Blast Rated)	ISO 22899
SAS F150317	JF/Various Applications/200/35 (Blast Rated)	ISO 22899
SAS F150317	JF/Various Applications/400/70 (Blast Rated)	ISO 22899
SAS F150317	JF/Various Applications/550/130 (Blast Rated)	ISO 22899
SAS F150318	JF/Various Applications/200/70 (Blast Rated)	ISO 22899
SAS F150318	JF/Various Applications/550/190 (Blast Rated)	ISO 22899
SAS F150319	JF/Various Applications/200/40 (Blast Rated)	ISO 22899
SAS F150319	JF/Various Applications/400/55 (Blast Rated)	ISO 22899
SAS F150319	JF/Various Applications/550/75 (Blast Rated)	ISO 22899
SAS F150320	HC/Various Applications/538/80	UL-1709
SAS F150320	HC/Various Applications/538/225	UL-1709
SAS F150320	HC/Various Applications/538/290	UL-1709
SAS F150321	HC/Various Applications/538/90	UL-1709
SAS F150321	HC/Various Applications/538/100	UL-1709
SAS F150321	HC/Various Applications/538/110	UL-1709
SAS F150322	HC/Various Applications/538/105	UL-1709
SAS F150322	HC/Various Applications/538/115	UL-1709
SAS F150322	HC/Various Applications/538/220	UL-1709

GARDYON

A Global Protector of Oil & Gas Assets

GARDYON is a global company committed to protecting your onshore and offshore oil & gas assets. Focused on innovation in the field of engineered fire protection, **GARDYON** pioneers solutions using in-depth Research & Development, advanced Engineering & Design skills, and highly efficient Manufacturing facilities. Its innovative solutions are only the means to an end, which is a peace of mind that we bring to the table.

At **GARDYON**, every innovative idea is backed by a comprehensive execution plan from inception to commercialization. We believe that innovation and execution are not mutually exclusive, and our ability to get both of these elements right, makes us leaders in our own right.

Our extensive experience in the development, design, manufacturing, installation and maintenance of fire protection and thermal systems ensures that every innovation idea is materialized to its full potential.



RESEARCH & DEVELOPMENT

Gardyon understands the need to innovate and develop safer and more efficient solutions. One of the most important developments has been to incorporate the ISO jet fire test standard in our comprehensive programme of testing and certification. Lloyd's Register under their Type Approval scheme have certified Gardyon's engineered pre-cast panel system, "Charcast®7", as well as Gardyon's flexible jacket system, "ISO-JF180". These systems represent engineered thermal solutions for both fire and blast protection.



ENGINEERING & DESIGN

At Gardyon, we pride ourselves on our ability to convert innovative ideas into actual life- and asset-saving solutions. Assuring the designs have the necessary National Authority and Classification Society approvals, Gardyon conducts in-house detailed engineering & design, to provide turnkey solutions.

No other company offers such a range of engineering skills – this allows our clients to have full confidence in entrusting their fire protection and insulation requirements from design to installation to a single-source service provider, regardless of geographical location. Every Gardyon engineered solution is approved and certified as appropriate for weather and environmental protection, durability, fire performance, insulation performance, corrosion protection and aesthetics. These qualifications are further enhanced by the necessary National Authority and Classification Society approvals.



MANUFACTURING

Gardyon's highly efficient manufacturing facilities are coupled closely to in-house design expertise, assuring that all products are right the first time, and on time. Our global material supply partners who support our manufacture also bring to the table decades of expertise and an in-depth background in this high-level technology. The seamless flow from research & development, to design & engineering, to in-house manufacturing ensures that every Gardyon engineered solution is precision-crafted bringing the maximum value to the customer.

The high level of finish, which is enabled by our precision manufacturing capabilities, ensures that the system is instantly recognisable as another quality product from Gardyon. It emphasizes Gardyon's commitment to detail, and provides clients with the peace of mind that Gardyon's products will continue to perform consistently at its peak - be it day one, or two decades later.



ISO JF180

Jet Fire Jacket System

Engineered by **GARDYON**

www.iso-jf180.com

ISO-JF180 Engineered Jet Fire Flexible Jacket System

A Fire Protection System Designed, Tested, & Certified:
Jet Fire | Rapid Rise Hydrocarbon | Cellulosic | Weatherability



© Gardyon Private Limited, 2016

This document and its contents are the copyright of Gardyon Private Limited and may not be reproduced in whole or in part without the express permission of Gardyon Private Limited.