

Medium Voltage Junction Box

Model 411

Description

The Model 411 MV junction box is designed to join two three phase circuits, up to 11 kV, using single or multicore MV power cables. There is sufficient space inside the enclosure to allow for MV cable termination and routing of cables. There are facilities for connection of cable ground conductors and ground straps from the stress control sleeves. With the door opened, ingress protection of IP2X is provided by an insulating cover over the terminals.

The junction box is certified as an increased safety (Ex e) enclosure. Ingress protection is IP66.

For power cables that include optical fibers, a fiber breakout facility is available.

All 400 series products are intended for use in Floating Production Systems (FPS). They are well suited for any application requiring a product that can withstand harsh marine conditions or require long life with minimal maintenance intervals. Designed and manufactured in our ISO 9001 facility under our project management system, products have a two year warranty and are provided with a complete document package.

All products can be modified to meet specific requirements. Installation, commissioning and service is available. Contact the factory for details.



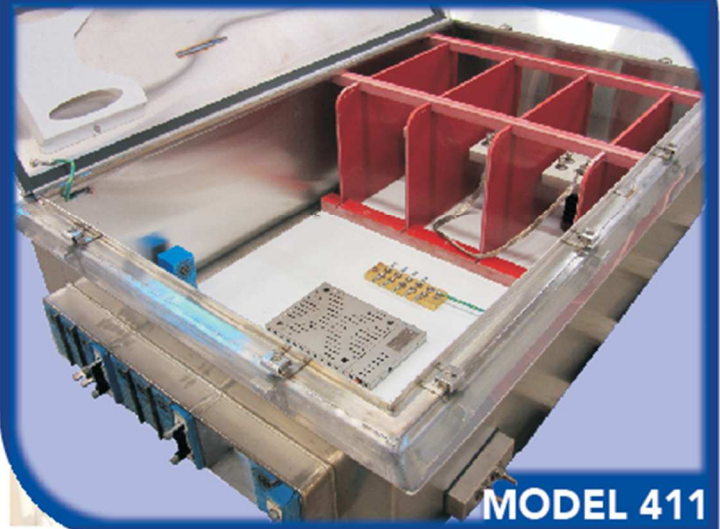
Features

- 316 stainless steel enclosure
- Hazardous area certified / maritime classification
- Voltages to 11 kV
- Currents to 640 A
- IP66
- Temperature: -20 °C to +60 °C

Options

- Temperature sensor / Heater
- Cable termination accessories
- Higher current rating
- Optical fiber breakout
- Extended temperature range
- Model 492 MV cable assemblies

MEDIUM VOLTAGE JUNCTION BOX



MODEL 411

Specifications

| Electrical | |
|------------------------------|--|
| Terminals | 3 |
| Voltage | 11 kV |
| BIL | 75 kV |
| Current | 640 A |
| Fault current | 30 kA - 1 sec. |
| Terminals | Suitable for landing three cables M12 hardware supplied |
| Grounding/bonding | Grounding balls on terminals Internal ground bar for stress control sleeves External ground connection |
| Interface | |
| Mounting | Four tabs top and bottom, two slotted |
| Door | Continuous hinge with door clamps Lockable |
| Cable entry | Cable glands or transits |
| Certifications | |
| Marine ¹⁾ | ABS, DNV GL, LRS, BV |
| Hazardous Area ¹⁾ | Ex e II T4 Gb ATEX, IECEx, AEx, CSA, IEC |
| Environmental | |
| Temperature | -20 °C to +60 °C (operating) -20 °C to +85 °C (storage) |
| Ingress | IP66 |
| Ship motion | 1 g in any direction |

1. Available on request.

| Physical | |
|--|---|
| Height | 60" [1525 mm] 72" [1825 mm] |
| Width | 36" [915 mm] |
| Depth | 17" [430mm] |
| Weight | 450 lb [205 kg] (60") 470 lb [215 kg] (72") |
| All dimensions depend on the configuration | |
| Material | 316 / 316L stainless steel |
| Drawing | 411-0501-00 |
| Options | |
| Heater | Self-regulating heater 120 V or 220 V, 100 W Other wattages available |
| Temperature sensor | PT100 typical with transmitter for 4-20 mA output |
| Optical | Fiber breakouts and bushing brackets or splice trays are available for cables having optical fibers |
| Accessories | Supply of stress control sleeves, lugs, glands, reducers, plugs as required |
| Extended ratings | Voltages up to 11 kV Current up to 1000 A -40 °C to +80 °C This will affect the hazardous area certification |

All specifications and information are subject to change without notice. Please contact Focal for the latest updates.

© 2016 Moog Inc. DS411-v1.0

www.moog.com/marine

Focal Technologies Corporation, A Moog Inc. Company