# Premolded Joint



G&W's Python® premolded rubber joints (PMJ) are available for 145kV and 245kV IEC (138kV and 230kV IEEE) extruded dielectric cable systems.

PMJ shown installed on cable with copper housing outer protection.

#### **F**EATURES

- Factory premolded joint
- 100% routine tested
- 138kV are type tested per applicable requirements of IEEE 48, IEC 60840
- 230kV is prequalification and type tested per IEC62067

#### **APPLICATIONS**

- Extruded dielectric cable systems, XLPE and EPR insulated
- Cable ground shield: copper wires / tapes, corrugated aluminum or copper sheath, lead sheath.
- Direct burial, submersed or vault.

#### **O**PTIONS

- · Available with mechanical shrink or slip-on installation
- · Shield break or Non shield break configurations.
- Available with the following options for outer protection:
- Heat shrink tubing
- Copper housing
- Fiberglass housing
- Copper and fiberglass housing
- Shear bolt connectors available.

### **Application Range**

Conductor Material	Conductor Size	Insulation Diameter**	
145 (138) kV			
Copper	400mm <sup>2</sup> - 1200mm <sup>2</sup> (750 kcmil - 2500 kcmil)	60mm 04mm (2.26 in	
Aluminum	400mm <sup>2</sup> - 1200mm <sup>2</sup> * (750 kcmil - 2500 kcmil) *	60mm - 94mm (2.36 in 3.70 in.)	
245 (230) kV			
Copper	400mm <sup>2</sup> - 2500mm <sup>2</sup> (750 kcmil - 5000 kcmil)	000000 4470000 (2.000 in	
Aluminum	400mm <sup>2</sup> -2500mm <sup>2</sup> * (750 kcmil - 5000 kcmil) *	82mm - 117mm (3.23 in 4.61 in.)	

Aluminum conductors larger than 500mm<sup>2</sup> (1000 kcmil) may require special conductor connection provisions.

<sup>\*\*</sup>Contact your G&W representative for additional cable sizes.

## **Premolded Rubber Joints**

### CATALOG NUMBER BUILDER

Use the chart below to build your G&W catalog number. This number should be used for all inquiries and quote requests. In addition, the following cable information is required to process your order:

- Conductor size and O.D. of conductor (nominal and max)
- Insulation O.D. (min and max)
- 3. Insulation shield O.D. (min and max)
- Jacket O.D. (nominal and max)
- 5. Cable construction details with metallic screen type and fault current rating.



# System Voltage

Rated Voltage kV (IEC)	Rated Voltage kV (IEEE)	BIL (kV)	Code
145	138	650	PMJ140
245	230	1050	PMJ160

### **Conductor Material**

Material	Code
Copper	С
Aluminum	Α

### **Installation Method**

Description	Code
Mechanical Shrink	Х
Slip On- Use for spares or long term storage. Installation tool is available and is ordered separately	s

## **Shield Break Option**

Description	Code
With Shield Break	В
Without Shield Break	N

### **Additional Housing Protection**

Description	Code
None	x
Copper Housing with Compound	С
Fiberglass Housing with Compound	F
Copper Housing and Fiberglass Enclosure with Compound	CF

#### Conductor Size (See Application section for available application range)

Size mm²	Code	kcmil	Code
400	400M	750	750M
500	500M	1000	1000K
630	630M	1250	1250K
800	800M	1500	1500K
1000	1000M	1750	1750K
1200	1200M	2000	2000K
1400	1400M	2500	2500K
1600	1600M	3000	3000K
1800	1800M	5000	5000K
2000	2000M		
2500	2500M		

### **Ship Weight**

Catalog Prefix	Approximate Ship Weight	
PMJ140	75 kg (165 lbs)	
PMJ160	105 kg (266 lbs)	

### EXAMPLE 1: PMJ140-B-630MC-CF-X

Premolded joint, 145kV (138kV), with shield break 630mm<sup>2</sup> copper conductor cable. Kit is supplied with copper housing with compound and fiberglass enclosure with compound. Mechanical shrink installation method.

#### **EXAMPLE 2: PMJ160-N-2500KA-X-S**

Premolded joint, 245kV (230kV), without shield break for 2500 kcmil aluminum conductor cable. Slip-On installation method.