

FIBROPLASTICHEM
INDIA PRIVATE LIMITED
An ISO 9001 - 2008 Certified Organisation

FIBROPOLES

# FIBROPLASTICHEM INDIA PRIVATE LIMITED

An ISO 9001 - 2015 Certified Organisation ISO 45001: 2018 HSE Certified

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Visit us at : www.fibroplastichem.com







A leading Indian manufacturer of GRP component like Chemical Tanks, Pipes of different dimension, pressure vessels, Poles, Venturi, Scrubbers of international standards from its state of art facility near City of Kolkata, India since 1972.

Fibroplastichem India provides world class quality support in Engineering, Design, Sourcing& Manufacturing from its 4 nos. of plants with the help of well trained work force.

Industries rely on
Fibroplastichem India for a full
complement of GRP components
along with our full serviceengineering group to develop a
custom solution for their needs.

Our professional design engineers based on internationally accepted norms, such as AASTHO, BS EN, ASME, IS. We apply same universal specifications for domestic as well as international customers.

Kindly explore this Album /
Catalogue to learn more about
Fibroplastichem products and
services.

Our focus is to provide quality products on time, on specification and ultimately to make your Industry Eco friendly, cost effective to make the Globe better place to live.



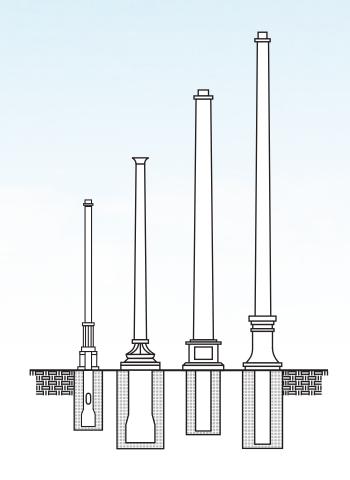
## FIBROPOLES

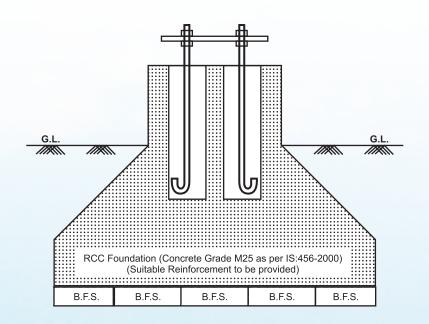
## Installation













# FIBROPOLES GRP LIGHT POLES

We offer a range of superlative quality GRP Light Poles. Manufacturers and FRP Street Light Poles Suppliers in India.

We are proud to be one of the renowned GRP poles manufacturer. The resulting research into non-corrosive materials has culminated in the choice of the Glassfibre Reinforced Plastic (GRP) Products. This material exceeded the expectations of the authorities, as it not only offered the answer to the excessive corrosion, but also offered convincing strength properties combined with an appealing finish and design.

Fibro Plastichem subsequently bought the expertise and machinery for the manufacture of filament wound GRP Poles and since commencement of production in July 2011.

Through its commitment to consistent quality, Fibro Plastichem has became one of the India's leading manufacturers of GRP poles.

FIBROPOLEs are used for highways, main roads, residential streets, sports fields, decorative lighting, area lighting, post-top lighting, perimeter security, parks and gardens, as well FIBROPOLE as it became known, is used not only for its resistance to corrosion, but is preferred by architects, developers and local authorities for its aesthetic appearance, strength, ease of installation and inherent safety for road users.

FIBROPOLEs are well suited for locations where traditional materials struggle to offer a definite and lasting solution Unlike steel or aluminum, composites are anisotropic by nature. In street furniture, such as Poles and Masts, their anisotropy is used to advantage by ensuring frangible failure, in the event of a road traffic accident, thereby saving lives.

In addition, there are no surface treatments as with traditional poles will leech out into the ground or atmosphere. Composite products are non-polluting, have a long life and can be reused in a different location as if they are brand new.

#### **DIFFERENT SHADES OF POLES**



**Brunswick Green** 

**Scamic Green** 

**Oxford Blue** 

Middle Graphite

#### **DIFFERENT SHADES OF POLES**



#### **MATERIAL**

The pole is constructed by the filament winding process to achieve optimum results for strength and rigidity. The filament winding process is continuously applied with uniform tension onto a rotating mandrel, resulting in a minimum mass glass to resin ratio of 70:30. The surface is seamless, smooth and tapered.

#### **MECHANICAL PROPERTIES**

A standard pole supporting a liminaire with a wind surface of 0.20m<sup>2</sup> may not have a pole top deflection of more than 5% of its height above ground when subjected to a basic wind pressure of 500pa. A safety factor of 2.5 times the total maximum windload is applicable.

#### **SALIENT FEATURES**

**LONGEVITY**: FIBROPOLEs are designed for a minimum life time of 25 years, in accordance with present standards of GRP Poles.

**FREEDOM FROM MAINTENANCE:** Based on extremely good corrosion resistance FIBROPOLEs do not need periodic maintenance or cathodic protection for below ground installations.

**VERSATILITY:** A wide range of spigots, floodlight mountings, base plates and decorative arrangements ensure a product for almost every application.

**LIGHT WEIGHT AND EASY INSTALLATION:** The light weight (1/3rd the weight of steel pipes) and long sections of FIBROPOLEs considerably reduces installation costs, while fewer joints and feasibility of rapid fabrication leads to faster installation.

**CORROSION RESISTANT:** Fiberglass reinforced pole will not deteriorate in salty air climate, acid rain or acid soil which enhances long-term life & strength

**ECONOMICAL**: Compared with metal and cement ones the GRP pole need lower transportation and installation fee. Its maintenance fee is zero and has long service life. Therefore, its comprehensive cost is lower. In the long run GRP Pole is more economical than Wood, Metal or Cement ones.

**HIGH BENDING STRENGTH**: Engineered to withstand a wind pressure of 500 pa inclusive of 0.20m<sup>2</sup> luminaire area with less than 5% deflection of the mounting height.

#### **APPLICATIONS**

FIBROPOLEs are best suitable for -

Road Lighting, Coastal Areas, Solar Lighting, Discharge Areas, Jetties Lighting, Chemical Plants, Containment Areas etc.

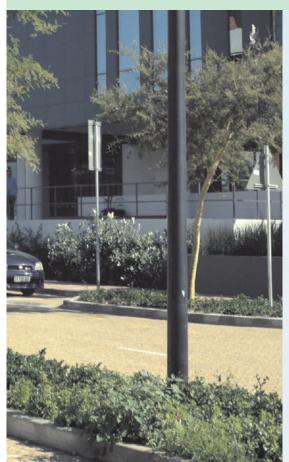
#### COMPARISON BETWEEN COMPOSITE POLES AND METAL SWAGED POLES

Features	GRP Poles	Metal Swaged Poles	
Mounting	Foundation required/optional	Concrete foundation is compulsory	
Corrosion	Non-corrosive	Highly corrosive	
Relocation	Easy and hand carried	Not feasible	
Aesthetics	Good	Periodic maintenance required	
Construction	Jointless	Multiple joints	
Weight	Light	Heavy (3times heavier than GRP poles)	
Longevity	More than 20 years	Depends upon maintenance schedule	
Periodic Painting	Not required	Periodic painting required	



# FIBROPOLES Street Lights









#### **DIFFERENT TYPE OF POLES**

#### TYPE OF POLES

#### 1. Flanged Type Pole:

Pole rests on Base Plate or Flange. Base Plate or Flange is fitted to RCC foundation by Anchor bolt.

#### 2. Burial Type

Certain portion of bottom is buried under the RCC foundation.

Effective Height (Above Ground)	Underground Portion	Total Height
1 mtr	300 mm	1.3 mtr.
2 mtr	300 mm	2.3 mtr.
3 mtr	400 mm	3.4 mtr.
4 mtr	500 mm	4.5 mtr.
5 mtr	500 mm	5.5 mtr.
6 mtr	500 mm	6.5 mtr.
7 mtr	650 mm	7.65 mtr.
8 mtr	750 mm	8.75 mtr.
9 mtr	1200 mm	10.2 mtr.
10 mtr	1500 mm	11.5 mtr.
11 mtr	2000 mm	13.0 mtr.
12 mtr	2000 mm	14.0 mtr.

ARM FOR STREET LIGHT GRP POLES					
SI.	Туре	Height of Arm (mm)	Respective Pole Height		
1	Single Arm	500 - 1000 mm	Upto 5 mtrs.		
2	Single Arm	800 - 1200 mm	6 - 8 mtrs		
3	Single Arm	1000 - 1500 mm	8 - 12 mtrs		
4	Double Arm	500 - 1000 mm	Upto 5 mtrs.		
5	Double Arm	800 - 1200 mm	6 - 8 mtrs		
6	Double Arm	1000 - 1500 mm	8 - 12 mtrs		

# GRP CYLINDRICAL STEP POLE / STEP HINGED POLEType of PoleHeight (mtr)Top OD (mm)Bottom OD (mm)Cylindrical390110Cylindrical490110Cylindrical590110

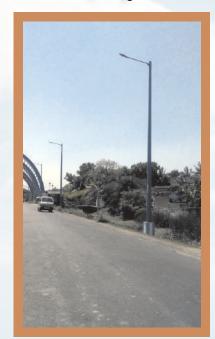
GRP CYLINDRICAL GARDEN POLE / HINGED POLE				
Type of Pole	Height (mtr)	Top ID (mm)	Bottom ID (mm)	
Cylindrical	1	80	80	
Cylindrical	2	80	80	
Cylindrical	3	80	80	
Cylindrical	4	80	80	
Cylindrical	5	80	80	

GRP CONICAL STREET LIGHT POLE			
Type of Pole	Height (mtr)	Top ID (mm)	Bottom ID (mm)
Conical	3	70/85	94/128
Conical	4	70/85	102/143
Conical	5	70/85	110/158
Conical	6	85/96	172/183
Conical	7	85/96	187/198
Conical	8	85/96	201/212
Conical	9	85/96	216/227
Conical	10	85/96	230/241
Conical	11	85/96	245/255
Conical	12	85	260

# FIBROPOLES Street Lights



**Double Arm** Installed at Digha, WB



Step Pole Installed at Gateway, Digha, WB



**Double Arm** Installed at HDA, WB



**F - Pole** Installed at Surat, Gujarat



Single Arm Installed at Dankuni, WB



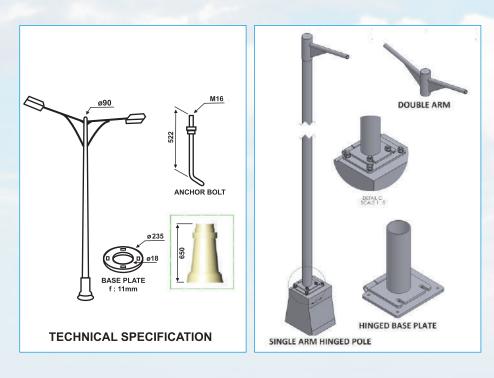
**Double Arm** Installed at Chennai, TN

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# FIBROPOLES Decorative Poles

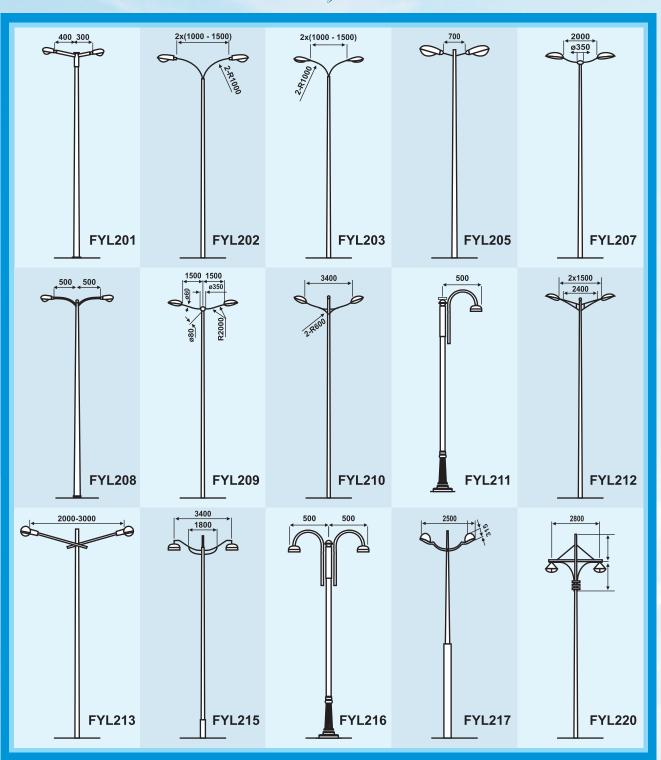






## FIBROPOLES

Decorative Arms (Line Drawing)



## **FIBROPOLES**

## Decorative Poles Base



DPB - 001



DPB - 002



DPB - 003



DPB - 004



DPB - 005



DPB - 006



DPB - 007



DPB - 008



DPB - 009



DPB - 010



DPB - 011



DPB - 012

## FIBROPOLES

Decorative Poles



Swan Neck Pole Installed at Surat, Gujarat



Designer Pole
Installed at Factory Premises



Long Swan Neck Pole Installed at Jaipur



**Double Arm Designer Pole** Installed at Bhubaneswar, Odisha



**Designer Pole** Installed at New Town, Kolkata



**Designer Pole** 





# FIBROPOLES Decorative Garden Poles

# FIBROPOLES Decorative Garden Poles







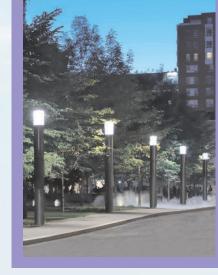




**DGP 102** 

**DGP 103** 













**DGP 104** 

**DGP 105** 

**DGP 106**