

# **Rotators and Tilters**

# for telescopic and sectional support masts

#### **GENERAL DESCRIPTION**

Manual rotators and tilters allow orientation of the antenna in azimuth over 360° and elevation over ±15°. This range of rotators/tilters are particularly designed for tactical line of sight antenna systems.

All rotators and positioners are operated from the ground. Four models are available:



F3435-64638 Combined rotator/tilter compatible with a mast spigot of 60mm. Light and heavy duty.



F3435-76718 Rotator - Circular flange and V-ring collar interface (fast securing system) on both sides (mast and antenna fixation).



F3435-64340 Tilter ±15° - Can be installed over the rotator 76718 to create a double axis positioner.



F3435-63231
Rotator - Circular flange and V-ring collar interface (fast securing system).
40mm spigot for antenna fixation. The COMROD standard lightning arrestor can be directly mounted onto the integral rotator bracket.

# **INSTALLATION ON MAST**

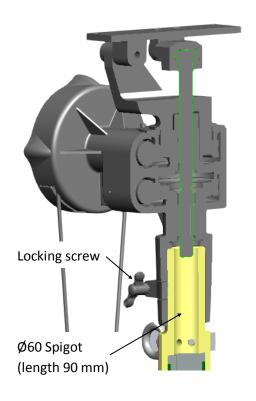
The combined rotator/tilter F3435-64638 is designed to be mounted on a 60mm mast spigot. The other three are installed on the  $\emptyset$ 224mm COMROD standard flange using a V-ring collar. Installation on the mast does not require any special tools.

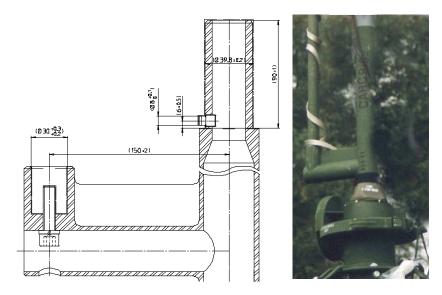
#### **TECHNICAL CHARACTERISTICS**

Reference	64638	76718	63231	64340
Rotation AZ	360°	360°	360°	-
Elevation EL	±15°	-	-	±15°
Total height	345 mm	292mm	706mm	245mm
Height above flange	-	194.5mm	609mm	147.5mm
Height below flange	-	97.5mm	98mm	97.5mm
Total weight	17.4kg	9.1kg	9.4kg	10.5kg
Weight without rope	12 kg	7.8kg	7.9kg	9.2kg
Rope length (can be adapted)	2 x 58m	58m (2 x 29m)	58m (2 x 29m)	40m (2 x 20m)
Rope diameter	5mm	5mm	5mm	5mm
Backlash	Pan < 0.22° Tilt < 4.8e <sup>-5</sup> °			
Transport bag	55x30x30	38x27x26cm	Option	38x27x26cm

# **ENVIRONMENTAL AND MECHANICAL CHARACTERISTICS**

Temperature (MIL-STD-810D, methods 501.2 and 502.2):		
<ul><li>Operation</li></ul>	-45° to +55°C	
●Storage	-56° to +71°C	
Wind (reference Winds according to ANSI TIA/EIA-222-F):		
<ul><li>For deployment/retraction</li></ul>	40km/h	
●For operation (pointing accuracy)	100km/h	
●For survival	140km/h	
(a Comrod document explaining wind calculations and tests is available upon request)		
Salt fog (MIL-STD-810D, Method 509.2 §I-3.2.d)	96 hours	
Humidity (MIL-STD-810D, method 507.2, procedure III)	95+5% RH at 28°C	
Rain (MIL-STD-810D, method 506.2, procedure I)	Heavy rain	
Ice (MIL-STD-810D Method 521.0 and EIA/TIA-222-F)	1,2 cm	
Sand and Dust (MIL-STD-810D, Method 510.2 Procedures I and II)	Remains operational	
Vibration – Loose cargo transport (MIL-STD810D Method 514.3 §1-3.2.3 Cat 3)	No damages	
Shocks, transit drop (MIL-STD-810D Method 516.3 Procedure IV)	Test Level 516.3-II	
Shocks, Bench Handling (MIL-STD-810D Method 516.3 Procedure VI Bench Handling)	Remains operational	
Altitude (MIL-STD-810D, Method 500.2, Procedures I, II and III)	No incidence on mast capability	
Fungus (MIL-STD-810D, Method 508.3)	No visual traces	
Immersion (MIL-STD-810D, Method 4.12.2 Procedure I)	30 minutes	

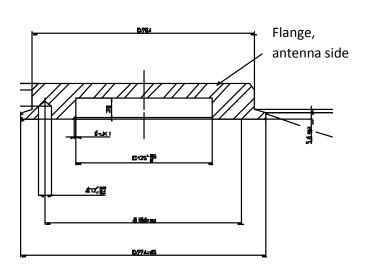




Adaptor for antenna and lightning arrestor

## Antenna Interface - Rotator F3435-76718

Antenna bracket must be designed with the following flange at the base



## Antenna Interface - Rotator F3435-64638

