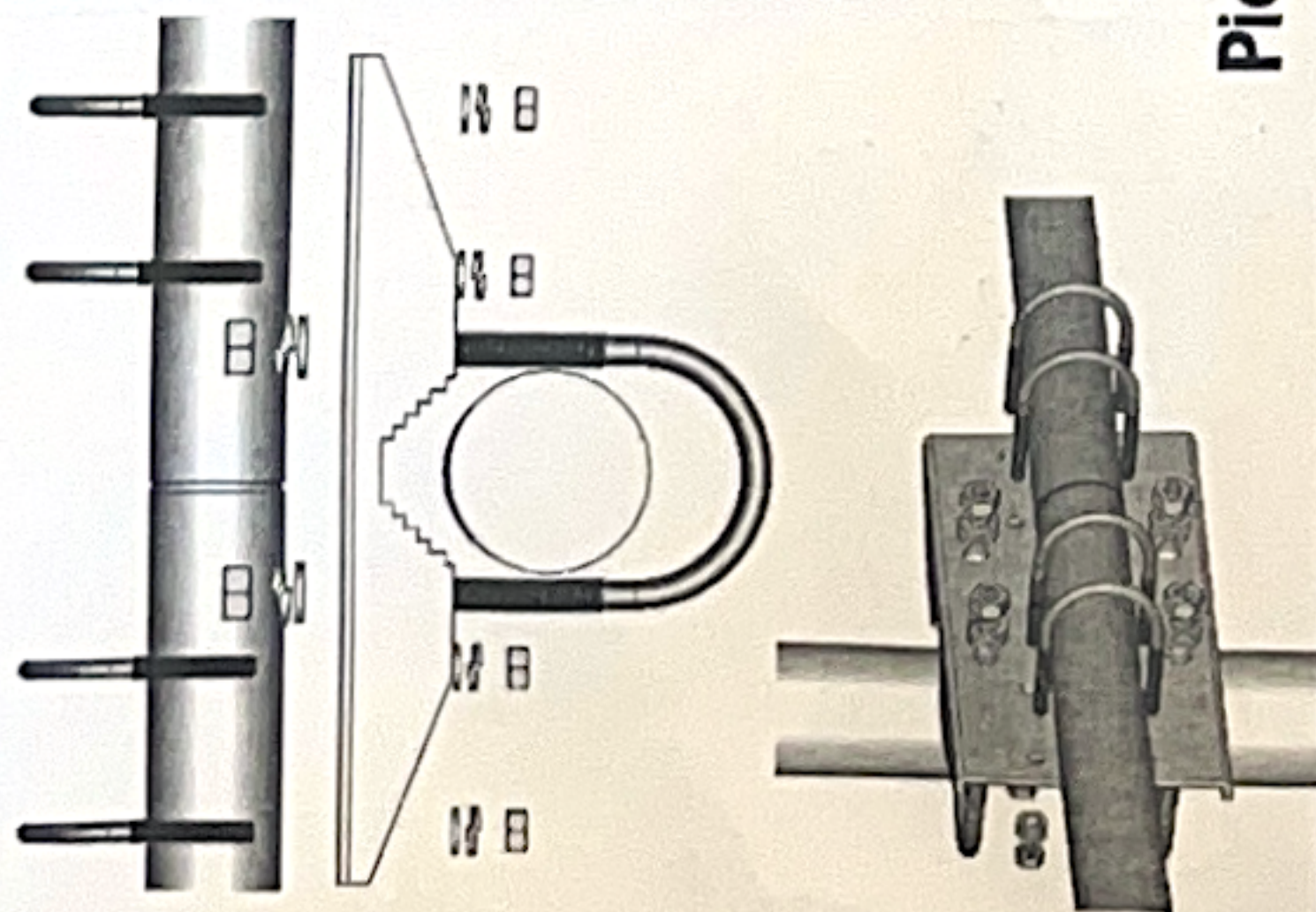


MOUNTING INSTRUCTIONS

SD/SY Mounting bracket

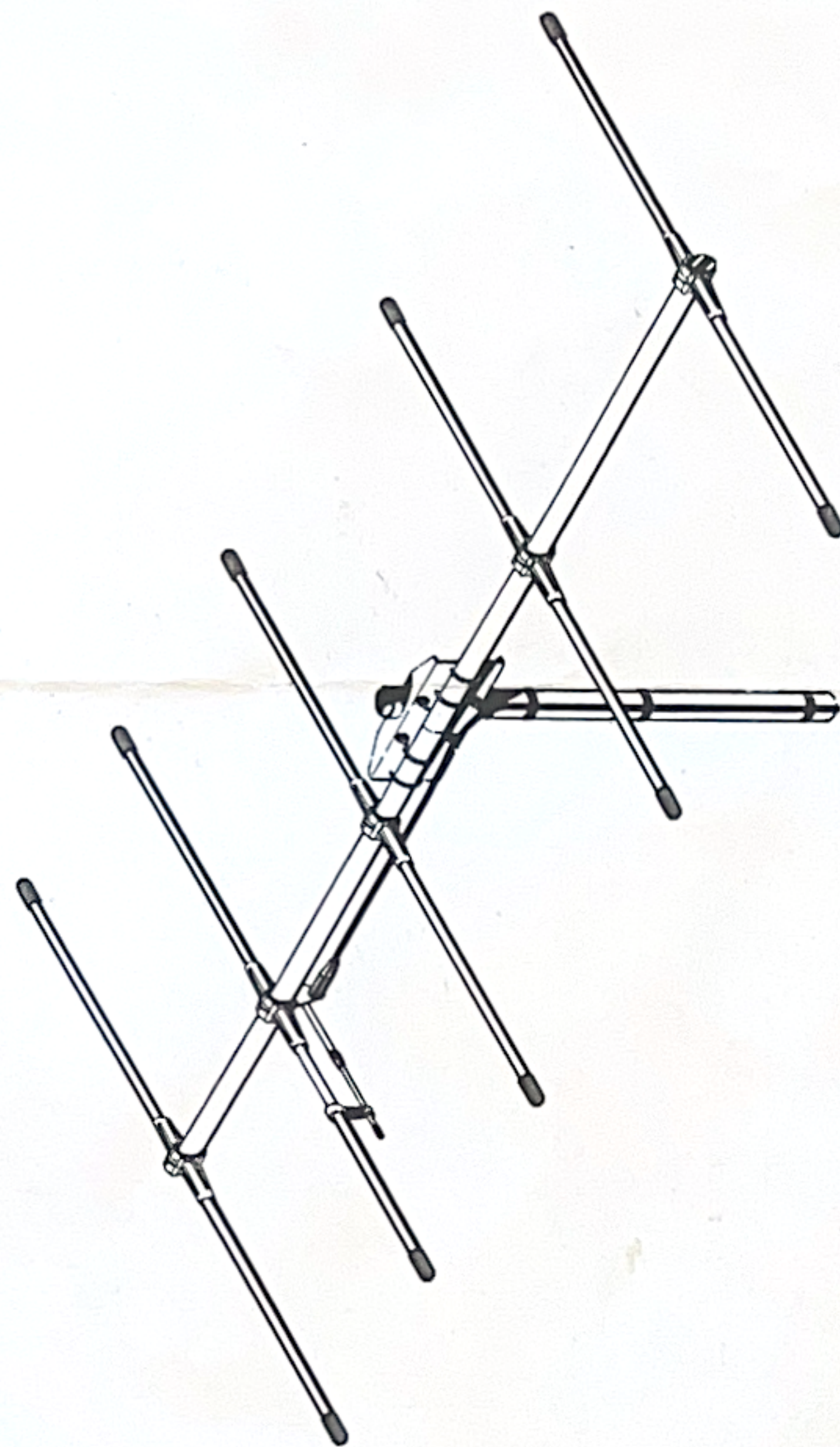


Pict.4

SD/SY bracket parts list	
Q.ty	Description
1	SD/SY Steel bracket
2	M8x200 U-bolt
4	M8 Hexagonal nut
4	M8 Grower washer
4	M8 Flat washer
4	M6x125 U-bolt
8	M6 Hexagonal nut
8	M6 Grower washer
8	M6 Flat washer
Materials: Zinc Plated Steel	
Weight: 865 gr	
Re-order code: SA088	

SY 78-5

VHF 78-88 MHz Base Station 5 Elements Yagi Antenna



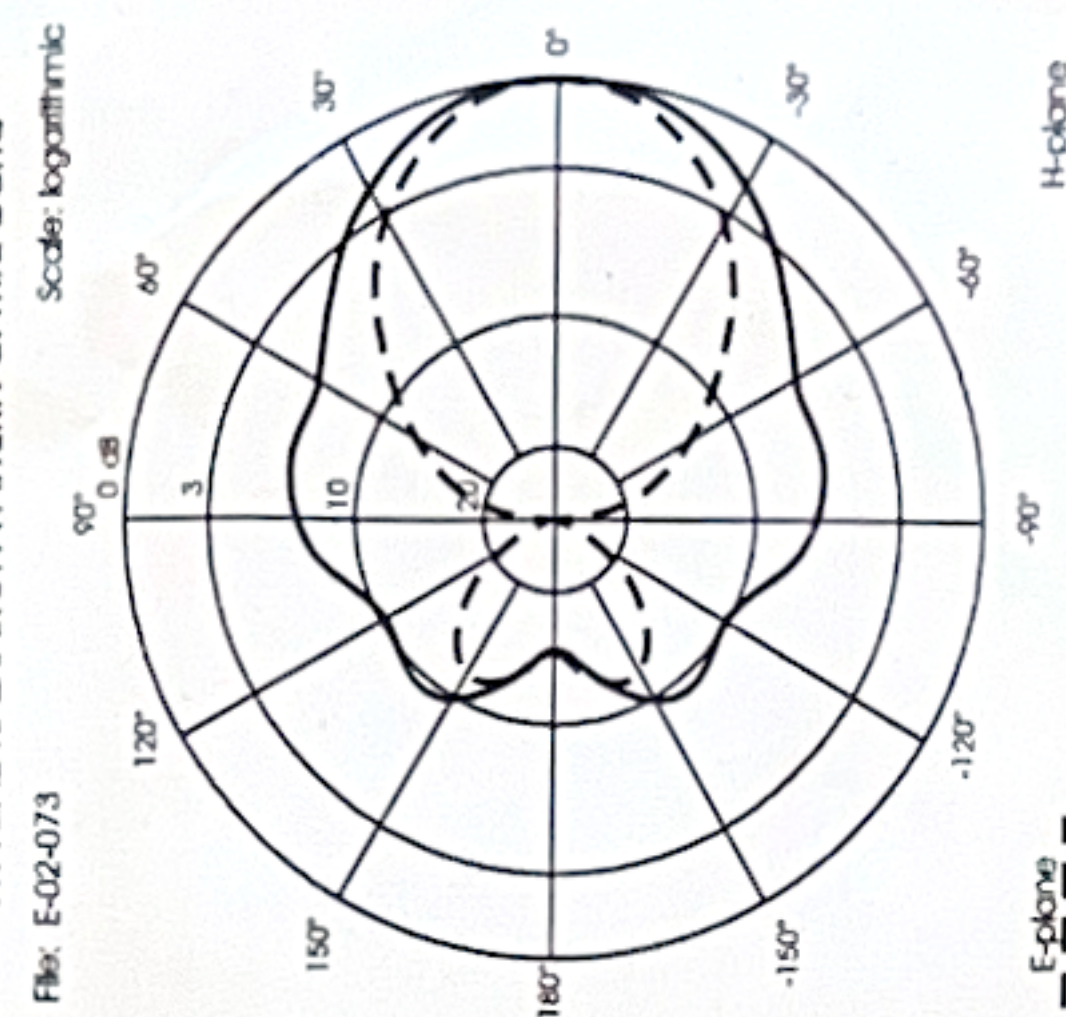
Electrical Data

Type	0.97 λ 5 Elements Yagi Antenna
Frequency Range	78 - 88 MHz
Impedance	50 Ω
Radiation (H-plane)	beamwidth @ -3 dB = 78°
Radiation (E-plane)	beamwidth @ -3 dB = 57°
Polarization	Linear Horizontal
Front to Back ratio	≥ 10 dB typical
Gain	8.4 dBi - 10.5 dBi
Bandwidth @ SWR ≤ 1.6	≥ 10 MHz
SWR @ res. freq.	≤ 1.2
Max Power	350 Watts (CW) @ 30°C
Connector	UHF-female

Mechanical Data

Materials	Aluminium, EPDM rubber, Zamak, Zinc plated steel, Chromed brass
Wind Load / Resistance	188 N @ 150Km/h / 120Km/h; 74mi/h
Wind surface	0.15 m ² ; 1.6 ft ²
Dimensions (approx.)	2020x4030x100 mm; 80x158x4 in
Boom Length/Diameter	4030mm; 158in / $\varnothing$ 33 mm; $\varnothing$ 1.3 in
Max. element length	2020 mm; 80 in
Element diameter	$\varnothing$ 16 mm; $\varnothing$ 0.6 in
Turning radius	2300 mm; 91 in
Weight (approx.)	5100 gr; 11.4 lb
Mounting mast	$\varnothing$ 35-50mm; 1.3-2in side mast w/"U" bolt

TYPICAL RADIATION PATTERN at mid-band

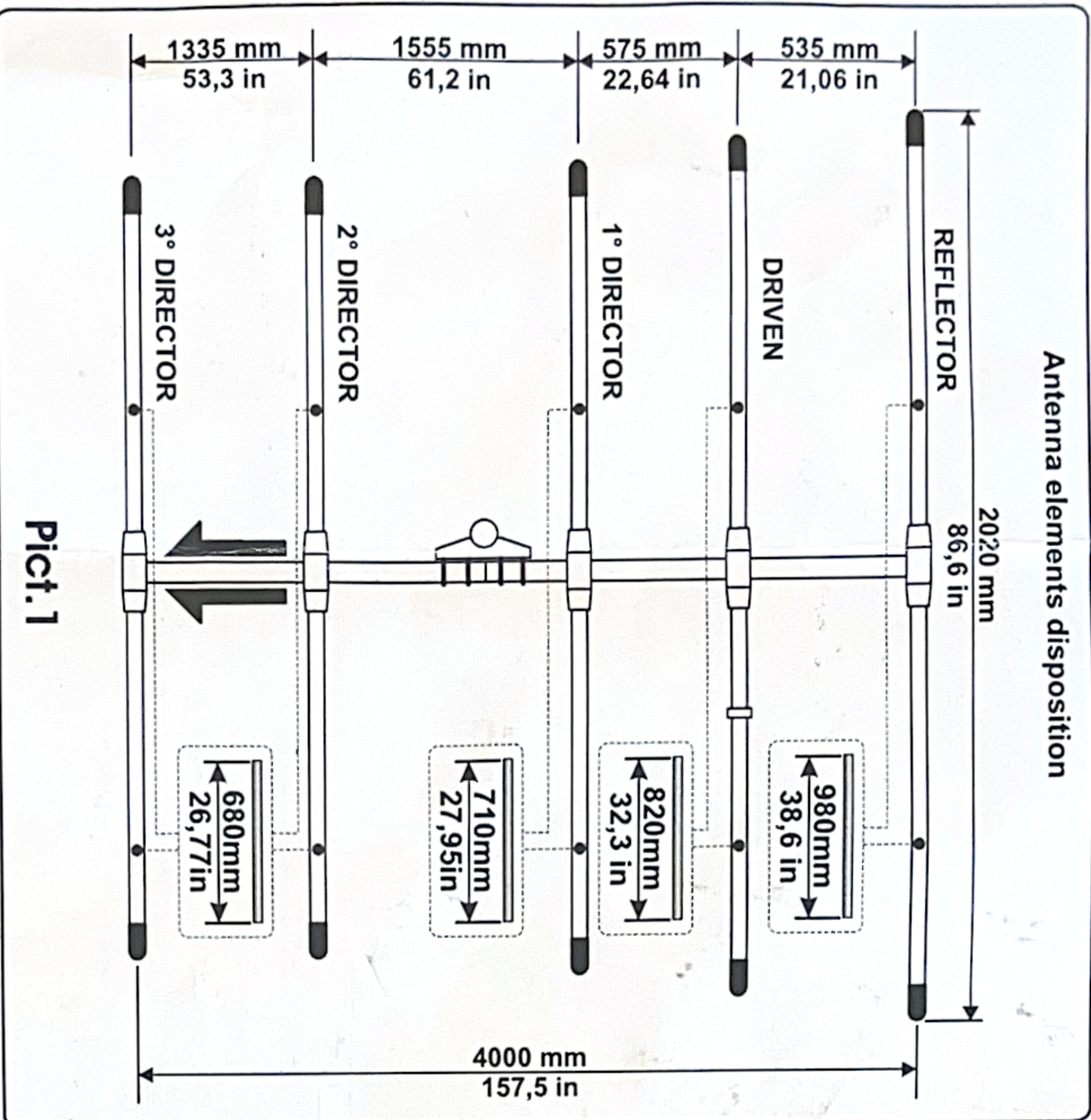


TYPICAL S.W.R. RESPONSE



MOUNTING INSTRUCTIONS

Antenna elements disposition



Pict.1

Mounting needed tools:

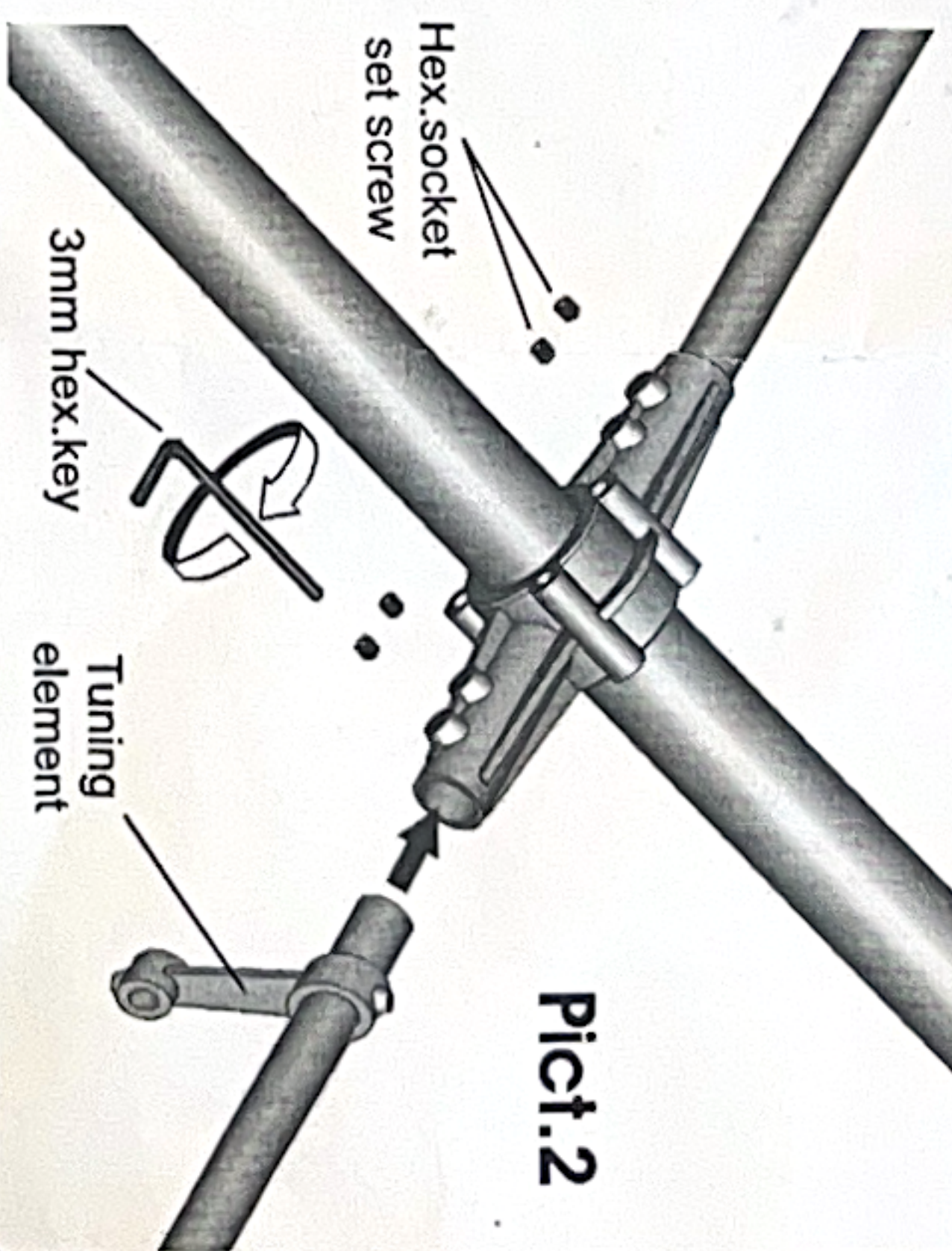
- n. 1 tape rules (meter)
- n. 1 10mm open key
- n. 1 13mm open key

REMARK: use a good coax cable like RG-8 or RG-213 as short as possible to get the best performance and we recommend to mount your antenna as far as possible from metall roofs, walls, power lines and other antennas.

MOUNTING INSTRUCTIONS

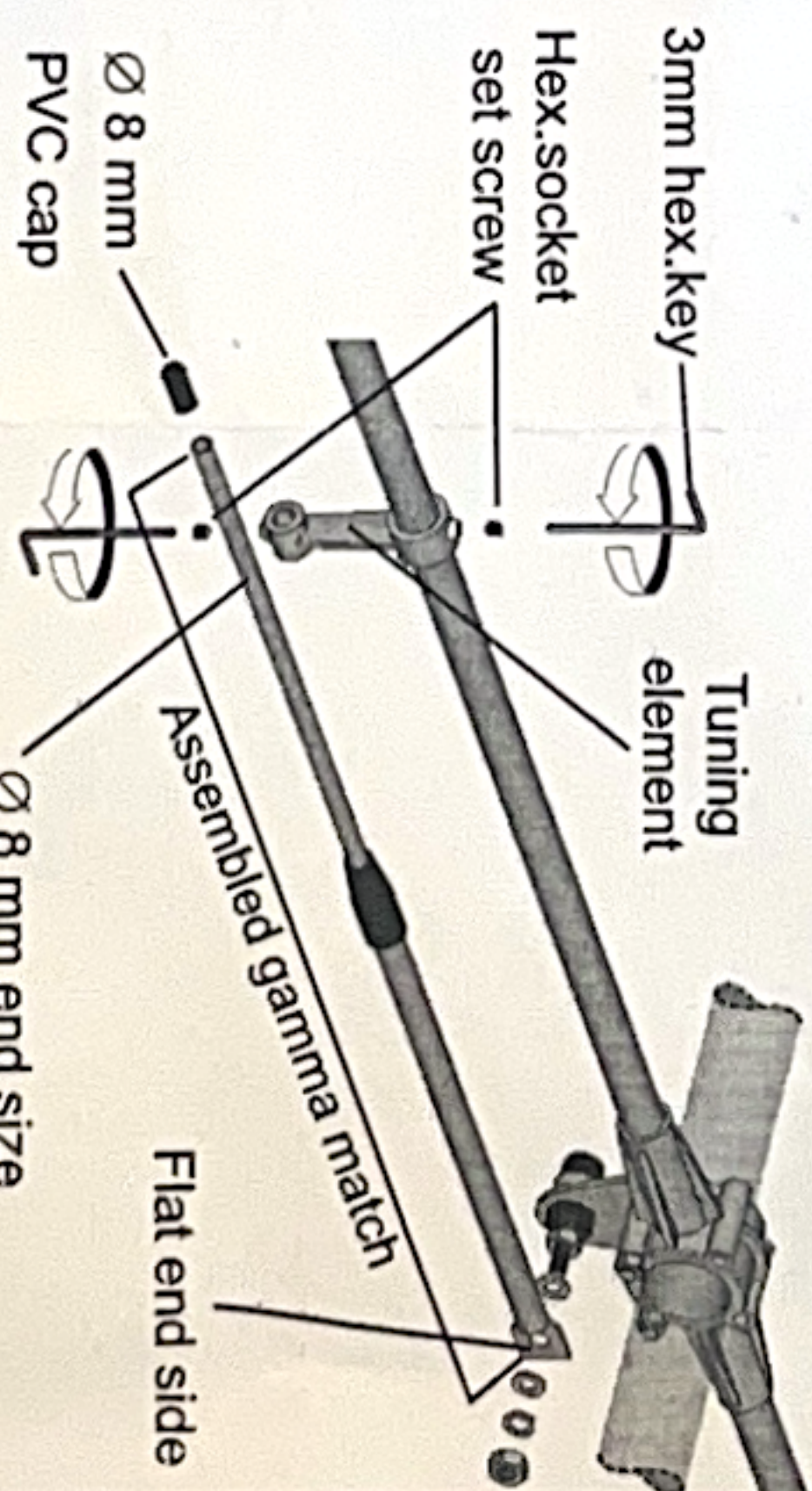
Elements mounting

- 1) Measure the length of the aluminium elements by means of a meter and install them in the element support of the boom according to the picture 1.
- 2) Insert (without locking) the tuning element on the DRIVEN ($\varnothing 16\text{mm}$ tube) and fix all the tubes with the supplied hex socket screws and key.
- 3) Place the PVC cap at the end of the tubes.



Gamma Match Mounting

- 1) Fix (without locking) the flat end side of the gamma-match by using the supplied nut and washers.
 - 2) Insert the opposite side ($\varnothing 8$) of gamma match in the tuning element and fix it at 241mm - 9,5in by means of the enclosed hardware.
 - 3) Check that the last part of your gamma match ($\varnothing 8\text{mm}$) is correctly positioned at 164mm - 6,45in and fix it with hardware.
 - 4) Lock the nut on the flat end of the gamma match and mount the PVC cap.
- Be careful to check that ALL parts are welllocked.



Qty	Description
2	M6x6 Hexagon socket set screw
1	3mm Hexagonal Key
1	Ø 8 mm PVC cap
2	M6 Flat washer
1	M6 Grover washer
1	M6 Hexagonal nut
1	Tuning element

