

# Airborne Blade Antennas UHF / S-Band

## Type TB0405



The rugged airborne antennas model TB0405 and TS2400B are specially designed for applications onboard from aircrafts, drones and missiles

### ELECTRICAL SPECIFICATIONS

- Center Frequency adjustable to required frequency  
Range: 380 to 500 MHz, others on request
- Bandwidth: typ. 3 MHz at VSWR max. 2:1
- Polarisation: linear
- Gain: nom. 0 dBi
- Coverage: omni directional
- Power Rating: max. 20 W CW at sea level and 5 W CW at 10 km
- Impedance: 50 Ohms
- VSWR at  $f_c$ : better than 1.3:1
- at  $f_c \pm 0,5$  MHz better than 1,5:1

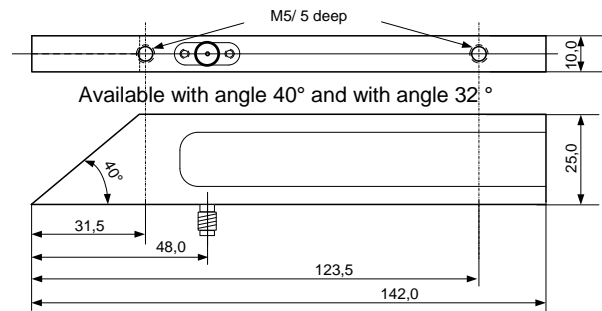
### MECHANICAL SPECIFICATIONS

- Connector Type SMA female
- Materials/Colours Aluminium/ eloxal natural
- Weight 69 g ( $\leq 2,4$  oz)

### ENVIRONMENTAL SPECIFICATIONS

- Temperature Range  $-100^{\circ}\text{C}$  to  $+210^{\circ}\text{C}$  ( $-150^{\circ}\text{F}$  to  $+410^{\circ}\text{F}$ ),  
Continuously operating  
Max.  $350^{\circ}$  for 30 sec.
- Maximum Speed max. 1.0 mach at 10 km altitude

### OUTLINE DIMENSIONS



Tested according to MIL-STD-461F, method RE102, method RE103:

Salt fog: M509.1, Pl. 48 HRS 5% Salt Solution, Humidity M507.1 RH=100%, T=114°F max

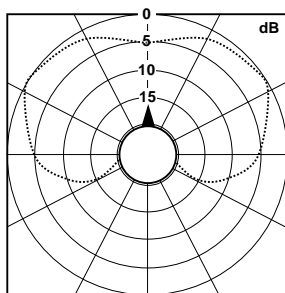
Low Temp. M514.2, Freq 20-2000 HZ

A. GRMS=19.2 12Min/Axis, B. GRMS=8.25 1hr/Axis, C. GRMS=6.9 30SEC/Axis

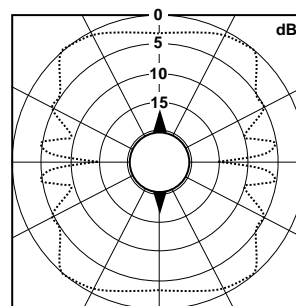
Shock M516.2, PIII, PV, A. 80G, 11msec, Terminal Saw Tooth, B. 200G, 11sec, Terminal Saw Tooth

3 Axis, 2 Shocks/Direction, ACC M513.2 PI  $\pm 23\text{G}$ , 3 Axis, 1Min/Axis

### TYPICAL ROLL PLANE PATTERNS for BLADE ANTENNA TB0405

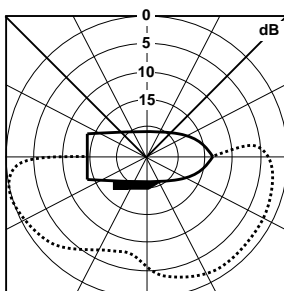


1 Antenna at 430 MHz  
/750 mm dia.

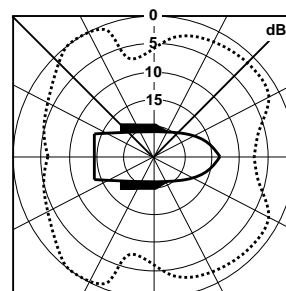


2 Antennas at 430  
MHz/750 mm dia.

### TYPICAL YAW PLANE PATTERNS for BLADE ANTENNA TB0405



1 Antenna at 430  
MHz/750 mm dia.



2 Antennas at 430  
MHz/750 mm dia.

# Airborne Blade Antennas UHF / S-Band

## Type TS2400B



The rugged airborne antenna model TS2400B is specially designed for applications onboard from aircrafts, drones and missiles. The antenna work alone or in multi antenna arrays with matching networks.

### ELECTRICAL SPECIFICATIONS

- Frequency Range 2.2 to 2.4 GHz optional 2.3 to 2.5 GHz
- Polarisation linear
- Gain nom. 0 dBi
- Coverage omni directional
- Power Rating max. 20 Watts CW at sea level and 5 Watts CW at 10 km
- Impedance 50 Ohms
- VSWR better than 1.5:1

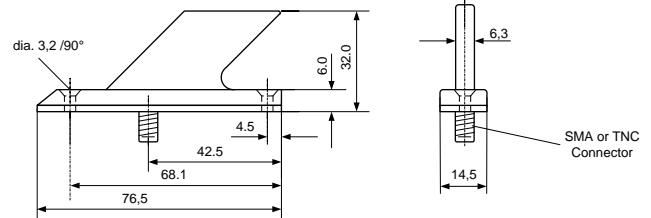
### MECHANICAL SPECIFICATIONS

- Connector Type SMA female, optional TNC-female
- Antenna High 32 mm (1.4 inch)
- Materials/Colours radome – high temperature PPA/beige  
Mounting plate – stainless steel
- Weight ≤100 gramms (0.22 lb)

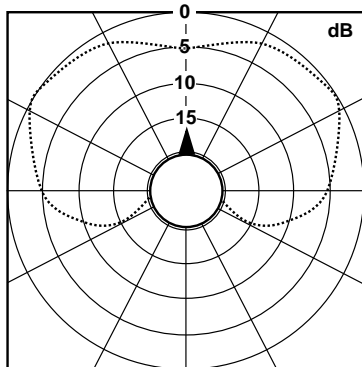
### ENVIRONMENTAL SPECIFICATIONS

- Temperature Range -55°C to +150°C (-70°F to +300°F),  
operating -65°C to +200°C (-85°F to +390°F), storage
- Maximum Speed max. 2.5 mach at 15 km altitude

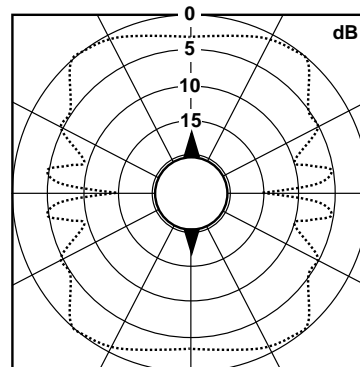
### OUTLINE DIMENSIONS



### TYPICAL ROLL PLANE PATTERNS for BLADE ANTENNA TS2400B

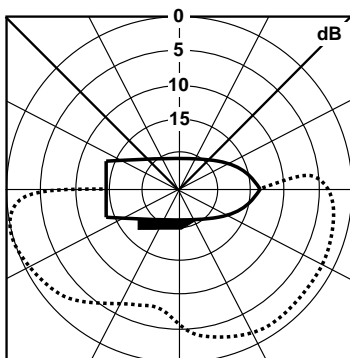


1 Antenna at 2300 MHz /150 mm dia.

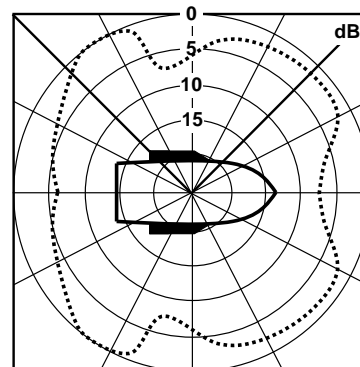


2 Antennas at 2300 MHz /150 mm dia.

### TYPICAL YAW PLANE PATTERNS for BLADE ANTENNA TS2400B



1 Antenna at 2300 MHz /150 mm dia.



2 Antennas at 2300 MHz /150 mm dia.