

## Model ASC 300-X (Internal BDC) Beacon Tracking Receiver

*Quality Products @ Reasonable Prices*



### Functional Description:

The Model ASC300 X Beacon Tracking Receiver is a high performance self contained unit that is designed to real time track the power density of a satellite beacon and output a DC voltage that is linearly proportional to the beacon power by utilizing a true, RMS-responding power detector. The ASC300 X will tune over any X band satellite (7.25 - 7.75 GHz) by utilizing an internal block down converter. The applications for the ASC300 X are for antenna tracking controllers and uplink power control system.

### Systems Specifications:

Input Frequency .....(7.25 to 7.75 GHz)  
 ..... Internal Block Converter  
 Pre-detection Bandwidth ..... 60 kHz  
 Input Level .....-90 dBm, min.; -30 dBm max.  
 ..... For full tracking range capability  
 Frequency Tuning ..... 10 kHz Steps  
 Frequency Adjust .....Front Panel or Remotely  
 AFC ..... $\pm$  30 kHz  
 Threshold .....45 dB-Hz (C/N<sub>0</sub>) for acquisition  
 Input Impedance .....50 Ohm  
 Input Connector .. Type-N, Female (SMA **Optional**)  
 Output Impedance ..... 100 Ohm, single ended  
 Output Connector. Terminal plug and BNC Female  
 Tracking Gradient ..... 0.5 V/dB, Std  
 Tracking Response .....0 to +10 VDC for a  
 ..... 20 dB input level change  
 System Level Adjust ..... 60 dB, Linear  
 Frequency Stability ..... <1 ppm, 0<sup>o</sup>c to +50<sup>o</sup> c

Frequency Reference ..... 10 MHz (Internal)  
 Phase Noise ..... >75 dB-Hz, 1 kHz from Carrier  
 Alarms ..... Unit Lock  
 Alarm Relay ..... Form-C  
 Front Panel Display ..... Vacuum Fluorescent  
 M&C ..... RS-232/422/485 Switchable on rear panel  
 M&C Connector.....DB-9, Female on rear  
 Ethernet 10/100 Base T ..... **(Optional)**  
 Ethernet Connector .....RJ-45 on rear

### Physical Characteristics:

Size .....1.75"H X 16.00"D X 19.00"W  
 Weight.....12 lb. (5.44 kg)  
 Primary Power.....90 - 264 VAC 47 - 63Hz, 1.4 A  
 Auto-Sensing

### Environmental Specifications:

Operating Temperature.....0<sup>o</sup>c to +50<sup>o</sup> c  
 Storage Temperature.....-40<sup>o</sup>c to +70<sup>o</sup> c  
 Humidity.....95% RH@ 40<sup>o</sup> c

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### Ethernet Option:

Not installed on STD units. Must be installed at factory.  
 Software support:Windows 98/2000/XP/2003/Vista/7 32bit & 64bit.  
 Protocol:TCP/IP,UDP,HTTP,SNMP,ARP,Telnet,ICMP,BOOTP,DHCP,SMTP.