

## THOMMEN FOR EXCELLENCE IN AVIATION MISSION EQUIPMENT

### GENERAL

THOMMEN AIRCRAFT EQUIPMENT AG is a leading manufacturer of Air Data Systems and aircraft Instruments used worldwide on a full range aircraft types from helicopters to corporate turbine aircraft and commercial airliners. Our recent innovation brings out AD32 Encoding Altimeter in aviation market which measures the barometric altitude. It has integrated Solid-State pressure sensor for static port..

The THOMMEN AD32 Encoding Altimeter exceeds FAA Technical Standard Order (TSO) and accuracy requirements.

The computed air data parameters are transmitted via the confi gurable ARINC 429 interface data bus with two ARINC 429 transmit channels. The Baro tting knob has a push-to-reset function. The AD30 has also an integrated altitude alerter. The baro setting knob has a push-to-reset function. The corrected altitude is displayed on a high contrast LCD in digital format and by a stepper motor driven pointer.

It is designed to be modular and hence very easy to maintain. Thanks to the RS232 maintenance serial interface. Its power supply is designed for 28 VDC. The low power consumption of less than 8 Watts and its low weight of only 1100 grams (2.5 lbs) have been optimized for applications in state-of-the-art avionics. The extensive Built-In-Test guarantees safe operation.

THOMMEN AD32 Encoding Altimeter can be confi gured for different applications very easily hosting capabilities by supplying data to next generation equipment and display of altitude in feet or meters by the help of scale setting button, all without altering system architecture.



#### THOMMEN AIRCRAFT EQUIPMENT AG

Hofackerstrasse 48 | CH-4132 Muttenz | Switzerland Phone: +41 (0)61965 22 22 / Fax: +41 (0)61961 81 71 sales@thommen.aero www.thommen.aero

# **ENCODING ALTIMETER**

## **TYPE: AD32**



## **CHARACTERISTICS**

#### FEATURES:

- Solid state static pressure sensor.
- English/Metric Scale Setting.
- Baro Push-to-Reset Function.
- Push-to-Test and Continuous Built-In-Test
- BIT Failure Memory.
- Display with LCD/Stepper Motor Driven Pointer.
- ARINC 408, 3ATI, with IMI Ring Pointers.
- RS232 Maintenance Interface.

#### SIGNAL INPUTS:

- Primary Power 28 VDC
- Emergency Power 28 VDC.
- Lighting Power 28 VDC (Optional 5 VDC).
- ARINC 429 Serial Data Bus 2 Receive Channels.

- MTBF 21,000 Hours (Acc. MIL-HDBK-217F).

#### SIGNAL OUTPUTS:

- Encoded Altitude ICAO Per TSO C-88a.
- Warning Flag Valid GND/28 VDC.
- Optional Baro Potentiometer Output
- . ARINC 429 Serial Data Bus 2 Transmit Channels.

#### **OPERATING SPECIFICATION:**

- Altitude Error Scale:
- •-1,000 to 20,000 feet (±10 feet)
- • 20,000 to 29,00 feet (±20 feet).
- • 29,000 to 41,000 feet (±30 feet).
- • 41,000 to 53,000 feet (±50 feet)
- FAA TSO-C10b/TSO-C88a.
- RTCA/DO-178B Level A.
- RTCA/D0-160D
- -Operating Temperature -20 ... 70°C
- -Storage Temperature -55 ... 85°C

#### RELIABILITY:

• MTBF 21,000 Hours (Acc. MIL-HDBK-217F).

## PARAMETERS

Pressure Altitude	-1,000	to	+53,000 ft (+16154.4 m)
Baro Corrected Altitude	-1000	to	+53,000 ft (+16154.4 m)
Altitude Rate	-99°C (146°F)	to	+60 °C (140°F) (+15240.0 m
Static Air Temperature SAT	0	to	20,000 ft/min. (+6096 m/min.)
Baro Setting QNH	20.67 700	to to	31.00 inHg 1,050 mbar

AD32 ENCODING ALTIMETER



THOMMEN AIRCRAFT EQUIPMENT AG is a certified company: EASA Part-21 G + 0 / EASA Part-145 / AS/EN 9100 Specifications are subject to change without prior notice. Thommen 04/16. Part No. 70794159. Technical modifications reserved.