



INTRODUCTION

It is an ADS-497 (Automatic Dependent Surveillance-Broadcast) 1090 MHz Mode S Extended Squitter Ground Station, whose primary function is to receive 1090 MHz Mode S Extended Squitter (1090 ES) messages broadcasted by ADS-497 equipped aircraft (and possibly airport surface vehicles), extract the data contained therein (Position, Height, Velocity, Call-sign, ...), assemble appropriate ATX021 target reports, ATX025 status reports, and optionally ATX023 & ATX247 version reports, and forward these reports to client systems over a data network.

FEATURES

- Providing surveillance redundancy where radar coverage exists
- As stand-by to radar systems to provide supplementary surveillance coverage
- Filling surveillance gaps where surveillances coverage is not possible due to high terrain and remote areas
- ADS-497 data locally integrated with ATM automation systems installed
- Providing Geometric Altitude is useful for RVSM (REDUCED VERTICAL SEPARATION MINIMUM) monitoring, and also as an indicator of correct QNH setting in the aircraft
- ATM operators are able to distinguish between surveillance targets from different type of sensors through different symbols and colors
- Sharing ADS-B data with the neighboring countries

TECHNICAL SPECIFICATIONS

- Processed and Decoded Signals: Modes S DF = 17, 18, 19 compliant to ICAO Annex 10, Doc 9871, RTCA DO-260/A/B, EUROCAE ED-102/A
- Target Capacity: Up to 1500 targets
- Update Rate: 0.5 sec
- System Latency < 250 ms
- Data Formats: ASTERIX Cat 21 & 25 & 247 & 23
- Sensitivity at antenna port better than -90 dBm
- Range: 250NM
- SNMP controlled
- Operating temperature: -40 ~ +70 °C
- Ingress protection: IP 52

