





MOBILE RADIO BEACON "PRIME"

PURPOSE

Mobile Radio Beacons "PRIME" are intended for equipping transportation vehicles in aerodrome movement area. These devices allow solving efficiently the tasks of surveillance, monitoring and routing at high intensity of aerodrome traffic, and allow minimizing probability of emergencies including the ones arising in conditions of limited visibility.

These devises are easily installable and do ensure unambiguous definition of location place as well as identification of any kind of objects equipped therewith. Application of techniques similar to the ones applicable for aircraft ensures full compatibility with ground traffic surveillance, control and monitoring systems, namely A-SMGCS, MLAT and ADS-B.



ADVANTAGES

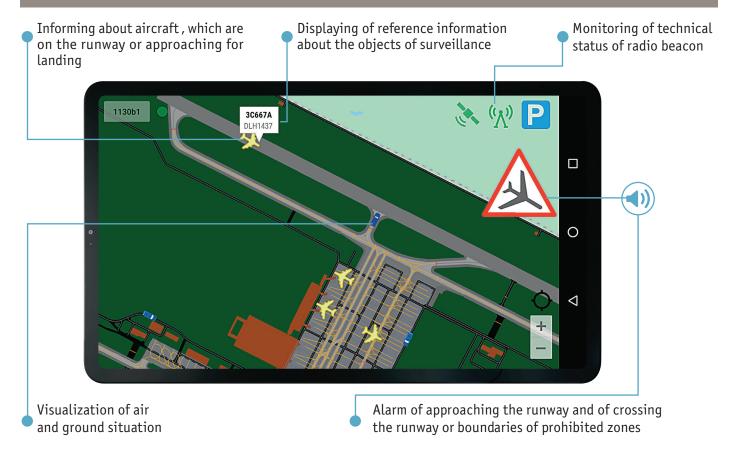
- » compliance with the standards and techniques of A-SMGCS design;
- » application as a part of MLAT / ADS-B systems or as an independent data source;
- » operation in automatic mode;
- » independence on weather conditions;
- » convenience of installation, small dimensions and weight;
- » optimization of operational expenses;
- » economic efficiency: cost-result.







SITUATIONAL AWARENESS MONITOR



The set of "PRIME" radio beacon includes the displaying device that exercises the function of situational awareness directly for the driver of a transportation vehicle. Availability of credible real-time environmental information for all participants of aerodrome movement activities decreases the load of controller staff and ensures the enhanced level of safety and efficiency of the tasks accomplished.

SPECIFICATIONS

Operating frequency	1090 MHz
Transmitter power	not less than 18 W
Maximal range of operation	not less than 10 km
Format of message output	Mode S squitter DF 18 (ES/NT)
Positioning System	GPS/GLONASS
Power supply voltage	9-36 V
Consumption power	not more than 6 W
Mass-dimensional characteristics:	
» Weight, kg	1.4
» Diameter, mm	207
» Height, mm	200
Version	all-weather
Operational temperature, °C	from -50 up to +50
Compliance with requirements and standards	RTCA DO-260B, ICAO Annex 10, Vol.4, ICAO Doc 9871



The device has passed all the tests required.