FCS

Flight Calibration Services

Flight Inspection Experts

Your Competent Partner for Flight Inspection

Mission

The mission of FCS Flight Calibration Services GmbH is flight inspection of navigational and surveillance systems, as well as validation of approach and departure procedures. FCS is a leader in its field, applying latest state-of-the art technology and stringent business processes to achieve this aim in full compliance with all legal regulations and at economic pricing. Fullest customer satisfaction is our trademark!

Full Scope of Services

FCS services comprise:
- Commissioning flight inspection for newly installed systems or procedures prior to their release
- Periodic "routine" flight inspections, for

- Landing aids and en-route systems
  - ILS CAT I to III,
  - MLS, PAR
  - (D)VOR, DME, TACAN, NDB
  - GBAS
- Procedures
  - Conventional NAVAIDS and GNSS-based arrival (NPA) and departure (SID)
  - P-RNAV (DME-DME)
  - APV SBAS

Further to inspection of conventional Navaids, FCS provides flyability and obstacle clearance assessment, as well as optional FMS database integrity checks in the context of procedure inspection.

- Surveillance
  - Primary radar
  - Secondary radar (SSR/MSSR)
  - Multilateration (MLAT/WAM) and ADS-B
- COM and Direction Finders
  - Radio direction finder (VDF/UDF)
  - Checking of COM systems
- Visual Aids / PAPI
  - Runway lighting, visual aids and PAPI
  - Recording and evaluation of obstacles to aviation
- Special flight inspections
- R&D services, receiver design support, expert studies.

FCS employs Learjet or optionally King Air 350 aircraft for radar flight testing. FCS also provides SASS-C or equivalent ground recording and evaluation systems for documentation of compliance with applicable ICAO Doc 8071 and EUROCONTROL surveillance standards.

FCS special flight inspections, optionally employing FCS SISMOS technology, analyse navigational, surveillance or COM systems disturbed by multi-path propagation or other effects. FCS R&D and RF receiver design capabilities assists our customers in tracking down propagation-related system performance issues of ILS, VOR/DME/TAC as well as Mode S-based 1030/1090 MHz systems.

Advanced State-of-the Art Infrastructure
Since mid-2009 FCS is operating two identical latest model Raytheon/Beechcraft King Air 350 aircraft, featuring maximum performance and availability, as well as state-of-the-art "glass cockpit" avionics and equipment including EGPWS, TCAS-II and ADS-B. FCS aircraft D-CFMD and D-CFME are equipped with the most advanced Flight Inspection Systems (FIS) available today, with maximum measurement precision and optimised efficiency. FCS provides absolute 3D field strength measurements traceable to calibration standards.

Phase DGPS and Wide Area DGPS positioning reference systems result in minimal set-up times, and dependency on weather is strongly reduced.

Highly qualified and motivated staff
FCS employs senior-level, experienced full-time flight inspection pilots and flight inspectors licensed by the "Luftfahrt-Bundesamt" (German Federal Office

of Civil Aviation). Regular training programs and proficiency checks ensure our acknowledged high level of performance. Our customers consistently commend the high level of expertise of all FCS staff.

FCS Flight Calibration Services GmbH is a joint venture
of DFS, skyguide and Austro Control

Regulation and Standards

FCS flight inspections are performed in accordance
with relevant regulations and guidelines, such as:
- ICAO Annexes 10 & 14 and ICAO Doc 8071
- BAF (German ATC regulating agency) and
  DFS Deutsche Flugsicherung GmbH
- Skyguide (Switzerland)
- Austro Control (Austria)
- NATO STANAG A Et P-1(D)

FCS carries full DIN EN ISO 9001 certification. Aircraft
maintenance is carried out within the LBA-approved
FCS Continuing Airworthiness Organisation (CAMO).
As part of the EASA specialized operations (SPO)
AOC for flight inspection aerial work, FCS has
achieved IS-BAO "stage 2" registration in 2/2012.
IS-BAO is an SMS (Safety Management System)
"gold standard" for business aircraft operators.