Military Aircraft Services
Bringing our performance to the next level

20+ Sites across the globe
35+ years of experience
28% of Airbus military Aircraft business in 2018 came from services
1,6 € Bn 2018 revenues

Source: TAS Services live, 2018 figures
Services portfolio. We make it fly.
Our model

**Tailored** packages to meet each Customer’s specific operational needs & ensure smooth transition from Entry Into Service (EIS) to Full Operational Capability (FOC)

**ENTRY INTO SERVICE (EIS)**
- A/C acquisition
  - Initial provision of spares
  - Ground support equipment
  - Airport tools
  - Handling & servicing
  - Operational & maintenance manuals
  - Field Service Representative
  - OEM support engineering (AMTAC)

**SUSTAINMENT SUPPORT MODEL SELECTION**
Services set up
- Before fleet Initial Operational Capability
- For sustainment after EIS
- Ensure mission readiness @ required level
- Build on top of Through Life Support (TLS – serving as minimum OEM support to A/C Operator)

**IN-SERVICE SUPPORT**
A/C life cycle

**Full In-Service Support**
Performance based Integrated Services provide availability @ different levels

- On demand services as an alternative
Focus on your mission, we take care of everything else

1990s
- On demand product support

2000s
- Performance based solutions

2010s
- Introduction of Full In-Service Support (FISS)

Ensuring from material availability up to fleet readiness

Customised solutions matching the mission needs

Steady budget/plannable expenditures

24x7 OEM engineering & technical support
Common Services

- Technical & Engineering support
- Maintenance services
- Availability of spares
- Flight Operations support
- Ground Support Devices services (GSD)
- In Service Security services
- Technical Information Data (TID)
- Airworthiness management services

A400M Global Support Step II

- 6 Operators
- 4.5 years of contract duration
- 119 A/C
- 65 A/C for spares availability
- 181 K Flight Hours
- 105 K spares availability
A400M Global Support Step II: 360° Full In-Service Support

Extended **commitment** between Industry, OCCAR and the Nations, continuing the long-term solution started in Step I.


A cost-effective **Performance Based Solution**: all services are geared toward achieving specific Fleet Availability operational requirements.

A **Modular** service permitting tailored National solutions, as per specific operational requirements.

Transparency and enhanced competitiveness, thereby providing the best **Value for Money**.
Military Aircraft services in the digital era

Digitalisation as enabler

Smart services

FISS for fleet availability

Shaping future with Big Data Analytics

smartforce
Increase fleet availability
Reduce maintenance effort
Increase mission readiness
Increase fleet availability
Massive amounts of data available but not fully exploited to the benefit of governmental Operators

- Time consuming manual work
- Inability to monitor & improve data quality
- Data silos = unexploited value
- Lack of consolidated overview
- Superficial operational insights
- High cost of data integration

Data silos =

- High cost of data integration
- Inability to monitor & improve data quality
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- Superficial operational insights
- High cost of data integration

Data Silos

- Massive amounts of data available but not fully exploited to the benefit of governmental Operators
- Preventing insights & meaningful impact on:
  - Operational execution
  - Resources efficiency
  - Safety
The future of fixed and rotary wing military aircraft

- By linking data silos together, governmental Operators gain cross-functional visibility
- Extract valuable information to increase efficiency & mission readiness
Data recording

Capture more & better quality data for Operators

Filter sensitive & restricted data

Data transfer

Data analysis

Results: Fly, Predict, Rely, Plan, Supply & Diagnose

A400M

2,5% DATA

250,000 parameters

Today

Tomorrow

Soon

Multiplatform state-of-the-art system maximizing commonalties & ensuring real big data analytics on-board & off-board
Broad range of services

DIAGNOSE
Benefit from in-depth analysis to automatically identify faults to increase cost efficiency

RELY
Rely offers solutions by exploring operational data & improve fleet performance insights at part number level

PREDICT
Predict makes unplanned events planned

PLAN
Plan optimises the planning & execution of platform related activities

SUPPLY
Benefit from in-depth analysis to minimize maintenance and improve parts forecasting

FLY
Fly provides digital services to optimise mission preparation time & improve operational efficiency
Joint Cooperation world-wide

Airbus & Singapore to co-develop digital services for military aircraft

Early Adopter Program

- Air Tanker
- German Air Force
- DSTA
- Spanish Air Force
- Australian Air Force
Services will expand the capabilities of the German Air Force.
Predict

Making the unscheduled, scheduled

Applicability
Weight on Wheels Sensor Fault Model

**TODAY**

Detection: class 5 failure
Detection: class 6 failure

Combination of these failures

AOG*!

**CUSTOMER BENEFIT**

A400M Pilot case results

**TOMORROW**

Anticipation of critical combination of 5 & 6 class failures

ANTICIPATION, time to react

NO AOG*!

**MISSION**

Several hours of reduction of AOG time

**MAINTENANCE**

Several hours of reduction of maintenance effort, Fault isolation

**MATERIAL**

Significant reduction of unscheduled removals

Potential sensor failure which may lead to an ECAM* message when combined with another sensor failure

Prediction of the probability of occurrence of next fault leading to AOG*
Stress measurement system displays fault. Air Refueling Boom System is now inoperational. If not rectified, Force degradations occur, due to internal electronics calibration of the stress management system.

**CUSTOMER BENEFIT**

Detection of preliminary forces degradations and alert before total failure. Calibration can be performed on site.

**TODAY**

**TOMORROW**

Alert, Replacement & sent back to supplier for repair

ANTICIPATION, time to react
How do we see the future of Military Aircraft Services?

**Co-creating** our digital transformation with our customers

**Expanding** digital aircraft services to all platforms

**Full in-service support** through enhanced capabilities

**TODAY**

**TOMORROW**

**THE FUTURE**

Shaping the future of services together with our customers!