



AgustaWestland AW189
Search and Rescue

 **LEONARDO**
HELICOPTERS

A red and white AW189 helicopter is shown in flight against a clear blue sky. The helicopter is viewed from a low angle, looking up at its rotor hub and main rotor blades. The main rotor blades are blurred due to motion. The helicopter's landing gear is visible, and there are bright lights on the front. The overall scene is dynamic and emphasizes the helicopter's capabilities.

AW189

LATEST GENERATION
CAPABILITIES

BEST PERFORMER IN ALL CONDITIONS

Belonging to the AWFamily of products the AW189 is designed for long range, all-weather SAR and MEDEVAC missions even in icing conditions, with advanced avionics and rapid start up. The aircraft benefits from an industry-leading 50 minutes 'dry-run' capability on the main gearbox. Damage tolerance, redundant systems, energy-absorbing landing gear, fuselage and seats ensure unparalleled safety and survivability.

The AW189 features a low-workload fully integrated glass cockpit, comprehensive sensor options and spacious constant section cabin equipped to ensure operational capability in the most challenging conditions. Our Customer Support & Training Global Network provides AW189 operators a range of Service Plans and a state-of-the-art training capability, maximizing operational safety and availability.

LEADING FEATURES

Fully articulated main and tail rotors

Rescue hoist / Single or Dual type
Rescue hoist camera

Two GE engines
2000 shp per engine (One APU 80 shp)
Up to 30 minutes performance in HOGE

Wide sliding doors

Extended range fuel tank

External Loudspeaker

Heavy duty landing gear

External Life Rafts

Bubble Cabin windows

Fully integrated avionics system, with four
8" x 10" colour active matrix liquid crystal
displays (AMLCD)

Weather / Search radar

Searchlight

Electro-Optic / Infra-Red (EO/IR) Device

Taxing lights

Swiveling light for rescue hoist (belly mounted)

Emergency floats (up to Sea State 6 ditching capability)

Cargo Hook

THE DIGITAL REVOLUTION

Using advanced in-house developed avionics and systems, the AW189 SAR cabin and cockpit are integrated to provide a single digital environment. This enables more efficient reliable information management and reduced crew workload resulting in greater mission capability and effectiveness.

The advanced SAR open-architecture avionics suite includes:

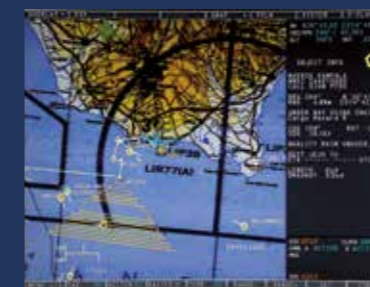
- **Search Mode and Patterns**
 - Modes: Transition Down, Transition Down to Hover, Transition Up, Mark On target, Winchman Trim
 - 5 Search Patterns: Expanding Square, Multi sector, Creeping line, Parallel and Expanding line, a new capability that only AW189 offers today on the market
 - Real time "Preview" of each search patterns
- **"Rendez-vous" functions on Moving Waypoints**

MISSION CONSOLE DISPLAY



- Direct intercept, pilot defined intercept, vessel track intercept
- **Hover Point Approach (HPA)**
- **Full Mission Equipment Integration with Flight Management System (FMS)**
 - Full integration of SAR mission Equipment (Digital Map, FLIR, Direction Finder, AIS transponder, Weather Search Radar)
 - Up to 20 Moving targets (manual input or

SEARCH PATTERN PREVIEW



- acquired by sensors, eg: AIS Transponder, Weather Search Radar and Direction Finder)
- **Flight Management Window (FMW)**. Provides real-time performance on the Multifunction Display
- **Obstacle Proximity Lidar System (OPLS)**. Provides the pilots with the safety clearance from the helicopter and the surrounding obstacles (For example hoisting operation near cliffs)

MARK ON TARGET INDICATION (PFD)



MARK ON TARGET PREVIEW (MFD)



AW189 SAR provides several other technological features as: SATCOM with flight following, V/UHF AM/FM Tactical radio, HF radio, Direction Finder, AIS Naval Transponder, Internal and external NVG compatibility, Digital Map System, Digital Video Recorder multichannel, ADELTA, TCAS II, Full or Limited Ice Protection System (FIPS/LIPS).



AW189 CHARACTERISTICS

Weights

Max Gross Weight 8,300 / 8,600 kg 18,298 / 18,960 lb

Propulsion

Powerplant 2 x General Electric CT7-2E1 Turboshafts with FADEC (2,000 shp class each) and 1 x APU (60kw)

Engine Ratings

Take off power (5 min) 2 x 1,479 kW 2 x 1,983 shp
Maximum Continuous Power 2 x 1,395 kW 2 x 1,870 shp

Seating

Crew 1-2
Passengers Up to 19 (typical layout for passenger transport)

External Dimensions

Overall length (1) 17.60 m 57 ft 9 in
Overall height (1) 5.06 m 16 ft 7 in
Rotor diameter 14.60 m 47 ft 11 in

Performance (ISA, S.L., MTOW)

VNE (IAS) 313 km/h 169 kt
Max cruise speed 287 km/h 155 kt
Hovering OGE 2,673 m 8,770 ft
Maximum range (2) 1,111 km 600 nm
Maximum endurance (2) 5 h 40 min

(1) Rotors turning

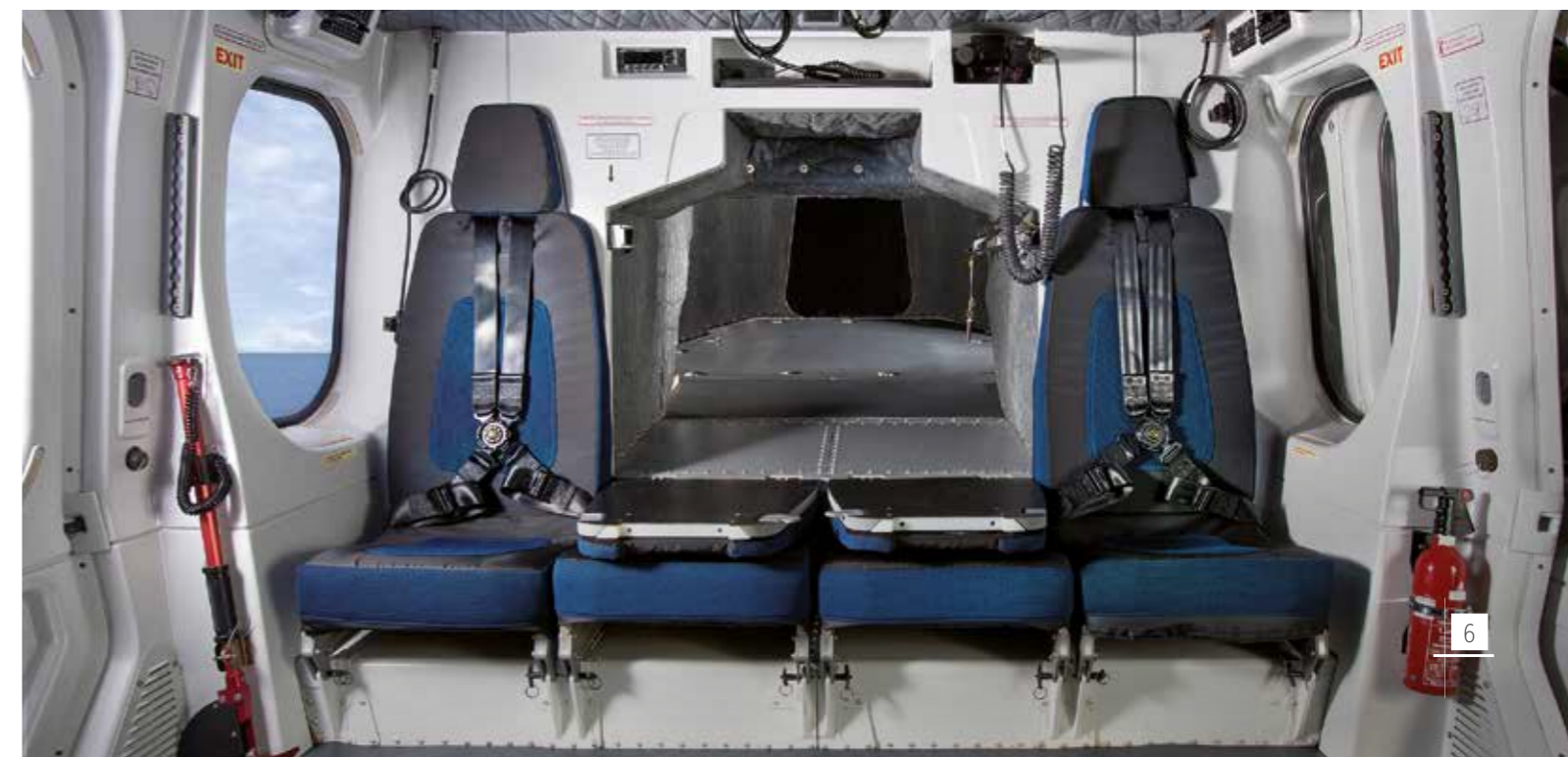
(2) No reserve, with the "extended range" auxiliary fuel tank

SPACE AND ACCESSIBILITY

The AW189 features the largest cabin in its class and spacious baggage compartment accessible from the passenger cabin in flight as well as from two external doors. (Total internal volume, cabin plus baggage compartment 13.6 m³ / 480.3 ft³).

Benefits include:

- Large, flat floor space, with accommodation for two stretchers (either longitudinally or transversally positioned) and eight or more personnel with mission console and SAR equipment in the storage compartment, accessible in flight
- Easy access to the entire patient's body from both sides
- Accommodation for a full suite of advanced life support equipment
- Easy reconfiguration, with fixtures and provisions for a number of self-contained systems
- Low vibration and noise levels
- Large sliding doors for easy patient entry or egress, both when the helicopter is on ground and during winching operations
- Mission console
- Cabin extension for baggage accessibility
- Sea Tray tub





Leonardo - Società per azioni
Registered Head Office:
Piazza Monte Grappa, 4 - 00195 Rome - Italy
Tel. +39 06 324731 - Fax +39 06 3208621
Leonardo Helicopters
Head Office:
Via Giovanni Agusta, 520 - 21017 Cascina Costa di Samarate - Italy
Tel. +39 0331 229111



© Leonardo - Società per azioni

This document contains information that is proprietary to Leonardo - Società per azioni and is supplied on the express condition that it may not be reproduced in whole or in part, or used for manufacture, or used for any purpose other than for which it is supplied.

leonardocompany.com