Technician Training

H130/EC130 Series Airframe Field Maintenance Training Course

10 Days / 2 Weeks
Classroom 40.0 Hours
Practical 20.0 Hours

Approved By: Ross McMichael_____ Date: 01/06/2021

Instructor_____Date___/___/____

Rev. 2.2

AIRBUS

This course is comprised of a theoretical presentation and practical exercises necessary to adequately review the basic aircraft systems and perform certain maintenance tasks described in Airbus maintenance documentation. Following the successful completion of this course, the technician should be able to perform Organizational and Intermediate level maintenance tasks and procedures necessary to maintain the helicopter. This course does not include Depot level maintenance tasks and procedures as described below.

ORGANIZATIONAL LEVEL:

Complete maintenance checks and servicing, inspection for condition, and exchange of line replaceable units according to applicable documentation.

INTERMEDIATE LEVEL:

Repair on or off of the helicopter and extended periodical inspections according to applicable maintenance documentation. A maintenance facility, qualified personnel, test equipment, and special tools are required to perform these tasks.

DEPOT LEVEL:

Major repair or overhaul at the manufacturer or at an authorized service station according to special documentation. Tools / test equipment and specialized personnel trained in Depot level maintenance tasks.

PREREQUISITES:

- Currently Certified as an Airframe Maintenance Technician
- Two Years Minimum Experience as an Active Helicopter Maintenance Technician

NOTICES:

Airbus Helicopters, Inc. reserves the right to notify customer of the occurrence of any force majeure condition that, in its sole discretion, is the cause of excusable delay. In the event of a force majeure condition, the services and/or classes will be extended or, if required, rescheduled for the first available opening. Airbus Helicopters, Inc. will not be liable for any costs, claims, or damages to customer or its employees arising from delays or interruptions caused by any force majeure condition.

The following items shall serve as the training points for a typical H130/EC130 series maintenance training course focusing on field maintenance tasks as defined above. The course content shall be revised as necessary to reflect basic production helicopter configuration revision as subsequent aircraft are manufactured.

Introduction (ATA 00) Classroom 1.5 hours

SCOPE: History of Airbus helicopters, Introduction to the H130/EC130 series helicopter.

Publications (ATA 05) Classroom 4.5 hours

SCOPE: New O.R.I.O.N. publications, ATA 100 specifications as it applies to the H130/EC130 series helicopters, construction, content, use, effectivity and revisions of the Airbus World publications.

General Information / VEMD (ATA 06 to ATA 12, ATA 31) Classroom 3.0 hours / Practical 1.0 hours

SCOPE: Description, maintenance, and inspection of reference planes, ground handling, and general servicing. Description of the operating modes of the VEMD to include configuration, maintenance, flight reports, failures, over limits and power check. Practical work includes operation and integration of the VEMD.

Structure / Doors / Landing Gear (ATA 52, 53, 55, 56, 32) Classroom 2.0 hours

SCOPE: Description, construction, maintenance, and inspection of the primary and secondary structure, Fenestron and landing gear.

Main Rotor Drive System (ATA 63) Classroom 2.0 hours / Practical 4.0 hours

SCOPE: Description, construction, maintenance, troubleshooting and inspection of the gearbox, gearbox lubrication system, engine drive and rotor brake. Practical work includes removal and installation of the gearbox modules, input seal, rotor brake, hydraulic pump bearings and drive shaft.

Main Rotor Mast (ATA 62) Classroom 2.0 hours / Practical 4.0 hours

SCOPE: Description, construction, maintenance, inspection and troubleshooting of the main rotor shaft. Practical work includes removal, disassembly and reinstallation of the components of the main rotor mast assembly and swashplate assemblies.

Main Rotor Hub (ATA 62) Classroom 2.0 hours / Practical 3.0 hours

SCOPE: Description, construction, maintenance, inspection of the main rotor hub assembly. Practical work includes removal, disassembly, assembly and installation of the main rotor hub. Removal, disassembly, assembly and installation of the spring vibration absorber.

Cabin Vibration and Active Vibration Control System (ATA 18) Classroom 1.0 hours

SCOPE: Description of the cabin vibration system and the AVCS system, operation and troubleshooting techniques.

Exam Number 1

SCOPE: Students will be given a 50 question multiple choice closed book exam. The exam will question the students on information covered in the subjects preceding this exam.

Tail Rotor Gearbox System (ATA 65) Classroom 1.5 hours / Practical 1.5 hours

SCOPE: Description, construction, maintenance, inspection and troubleshooting of the tail rotor gear box and drive shafts. Practical work consists of bearing removal and replacement, tail rotor gearbox input and output seals replacement.

Tail Rotor Hub (Fenestron) (ATA 64) Classroom 1.5 hours / Practical 1.5 hours

SCOPE: Description, construction, maintenance of the Fenestron to include dynamic balancing. Practical work includes removal and reinstallation. The inspection criteria of the tail rotor blades, hub assembly, including pitch-change spider, inner and outer bearings, laminated tension torsion bars and blade bushing replacement.

Electrical Power System (ATA 24) Classroom 2.5 Hours

SCOPE: Description, operation, maintenance and troubleshooting of the electrical system including the post-mod Multi-Bloc electrical system.

Tandem Servo and Hydraulic System (ATA 29) Classroom 2.5 hours / Practical 1.0 hours

SCOPE: Description, operation, maintenance, inspection and troubleshooting of the tandem servos and the dual hydraulic systems. Practical work includes troubleshooting of the flight control servos.

Rotor Flight Controls (ATA 67) Classroom 2.0 hours / Practical 4.0 hours

SCOPE: Description, construction, operation, maintenance and rigging of the flight controls. Practical work includes rigging the aircraft flight controls and tail rotor controls.

Fuel System (ATA 28) Classroom 1.5 hours

SCOPE: description, operation, maintenance, inspection and troubleshooting of fuel system including the post-mod crash resistant fuel system.

Engine 2B1 / 2D (ATA71 to ATA 80, 26) Classroom 4.5 hours

SCOPE: Description, engine operating controls, starting system, twist grip, fuel metering, engine back-up control ancillary unit, collective pitch and yaw anticipator operation and rigging. Troubleshooting of engine failure codes. Description, operation, inspection of the fire detection system.

Air Conditioning and Heating (ATA 21) Classroom 2.0 hours

SCOPE: Description, cooling and heating system operation and troubleshooting techniques.

Pitot Static System (ATA 30) Classroom 1.0 hours

SCOPE: Description, operation and locations of the basic Pitot Static System.

Equipment and Furnishings (ATA 25) Classroom 1.0 hours

SCOPE: Description and operation of cabin furnishings to include seats and cabin equipment.

Lighting (ATA 33) Classroom 1.5 hours

SCOPE: Description, operation and troubleshooting of the interior and exterior lighting systems.

Communications and Navigation (ATA 23, 34) Classroom 0.5 Hours

SCOPE: Description and function of the communications and Navigation systems available for the H130/EC130 series helicopters.

Exam Number 2

SCOPE: Students will be given a 50 question multiple choice closed book exam. The exam will question the students on information covered in the subjects preceding this exam. An average between exams #1 and #2 of 75% or better is required to pass the class.