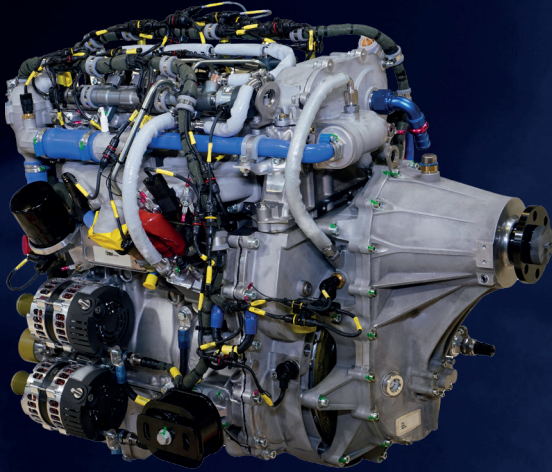


TEI-PD200



PISTON ENGINE



The TEI-PD200 is specifically engineered to operate in maritime and saline environments in line with marine operational requirements for ship-based missions. Compared to Türkiye's first indigenous turbodiesel aviation engine, the TEI-PD170, the TEI-PD200 has been developed through modifications to more than 100 components, as well as the gearbox. It has successfully completed salt fog tests conducted in accordance with the MIL-STD-810G Method 509.6 standard.



BAYRAKTAR TB3

TAKE-OFF AND LANDING FROM
DRONE CARRYING AMPHIBIOUS
ASSAULT SHIP
19 NOVEMBER 2024

TURBODIESEL AVIATION ENGINE

TECHNICAL SPECIFICATIONS

› Displacement	: 2.1 L
› Engine Configuration	: Straight 4 cylinder
› Fuel Supply	: Common rail diesel injection
› Air Induction	: Two-stage turbocharging
› Maximum Take-Off Power	: 197 HP (±2)
› Maximum Continuous Power	: 172 HP (±2)
› Dry Weight	: 162 kg
› Engine Cooling	: Water cooled
› Material	: Aluminium block, and cylinder head
› Fuel Options	: JP-8, JET-A1, JP-5, and EN 590
› BSFC (@MSL)	: 207 g/kWh (±3)
› Electrical Power	: 9 kW (2x4.5 kW)
› Altitude Power (@20,000 ft)	: 170 HP
› Altitude Power (@30,000 ft)	: 130 HP
› Altitude Power (@40,000 ft)	: 90 HP
› Critical Altitude	: 20,000 ft
› Maximum Altitude	: 45,000 ft
› Propeller Control	: ECU controlled hydromechanical
› Aircraft Configuration	: Tractor/pusher compatible
› Engine Control	: Redundant ECU (FADEC)
› FADEC Software	: DO-178C DAL-C certifiable
› Alternator Control	: DO-178C DAL-C certifiable

ADVANTAGES OF THE TEI-PD200

- › Superior high altitude capability
- › Less fuel consumption
- › High power/weight ratio
- › Compact design
- › More than 90% localized
- › 3,600 hours engine lifetime
- › High take-off power

OTHER HIGHLIGHTS

- › Turbodiesel aviation engine designed for Medium Altitude Long Endurance (MALE) unmanned aerial vehicles
- › FADEC is compliant with MIL-STD-461F, MIL-STD-704F, MIL-STD-810G
- › Reconfigurable engine control system software and hardware developed by TEI
- › Engine is designed and validated according to EASA CS-E