

DA42

Advanced twin technology,
safety and performance



AIRFRAME

The DA42 offers exceptional visibility thanks to its panoramic wrap around canopy and generous rear windows. Comfortable access for all on board is assured through the forward swinging canopy and large rear door that provides access to the folding rear seats and fuselage baggage area. Additional baggage is stowed in two generous nose compartments that are sized for golfbags and offer maximum flexibility in loading for any mission. Comfort is assured by adjustable front seatbacks and lumbar support. Luxury features abound

throughout, including premium leather interiors in several styles and colors, all LED interior lighting, optional electric air conditioning and more.

The sleek all carbon composite airframe incorporates advanced aerodynamics with the latest in passive safety technology for high performance, great efficiency and superior occupant protection. The composite airframe is durable, easily maintained and will keep looking great for many years to come.

PROPULSION

The turbocharged Austro AE300 jet fuel piston engines perfectly match the DA42's aerodynamically efficient airframe, burning less than 17 gph, combined, at a high speed cruise of 190 kts, and less than 11 gph overall in a typical flight training environment.

Control is jet-engine simple, with each engine / propeller combination controlled by a single power lever and power settings displayed in % power. Simplified power control means that you can focus on more important things and that is not just more convenient, but safer too.

The 3 blade MT hydraulic constant speed propellers feature advanced blade geometry for efficient performance,

smoothness and low noise. They are automatically controlled by each engine's digital engine control through conventional hydraulic governors. Feathering is as simple as flipping a single switch.

The DA42's AE300 170 hp jet fuel piston engines have been in service in Diamond's DA40 and DA42 since 2009. With over 1,200 engines in service and a total fleet time of well over 600,000 hrs as of November 2015, the AE300 has proven itself to be smooth, reliable and efficient.

Austro Engines and MT Propellers are supported by North American based factory support and parts centers and a network of Authorized Service Centers.



AVIONICS

The fully integrated Garmin G1000 flight deck with standard 3-axis GFC700 Automated Flight Control System, yaw damper and Electronic Stability and Protection (ESP™), is complemented by a long list of avionics options to perfectly

suit your needs. Integrated weather radar, normally available only on much more expensive aircraft, is available as are Traffic Alerting, Synthetic Vision, and much more.

STANDARD FEATURES & OPTIONS

Airframe & Powerplant

- 2 x 170hp Austro Engine AE300 Jet Fuel Piston Engines
- FADEC single lever power controls
- 2 x MT 3-blade constant speed propeller
- All carbon airframe structure
- Multi-path lightning protection system
- Hydraulic retractable landing gear
- Gear warning horn muting system
- Stick limiter
- 26g cabin and seats, leather interior
- Reclining pilot & co-pilot seats, adjustable lumbar support
- 3-point automatic reel seat belts (all seats)
- Adjustable rudder pedals
- Xenon landing and taxi lights
- LED position and strobe lights
- Rear baggage extension
- Left and right nose baggage compartments

Airframe Options

- Electric Air Conditioning, 90 lbs
- TKS Ice Protection system (FIKI), 55 lbs
- Integrated Oxygen System, 31 lbs
- Electrically adjustable rudder pedals, 4lbs
- Premium leather interior, 5lbs
- AmSafe Airbag Seatbelts, 5lbs
- Double Bubble Canopy, 11lbs

Fuel & Capacity

Approved Fuels: JET A-1, JET A, JP-8, others per AFM

Fuel Capacity: 79.4 USG, Unusable: 3.0 USG

Weights

- Max Take-off Weight: 4,407 lbs
- Max Zero Fuel Weight: 4,045 lbs
- Max Landing Weight: 4,407 lbs
- Standard Empty Weight¹: 3,109 lbs
- Useful Load¹: 1,298 lbs
- Max Fuel Weight^{1, 2}: 536 lbs
- Full Fuel Payload^{1, 2}: 762 lbs

^{1, 2} Weights and Loads shown are for standard configuration. Selection of optional features may affect these weights. S/N specific Production variances can occur. ² Fuel density assumed at 7.01 lbs / USG

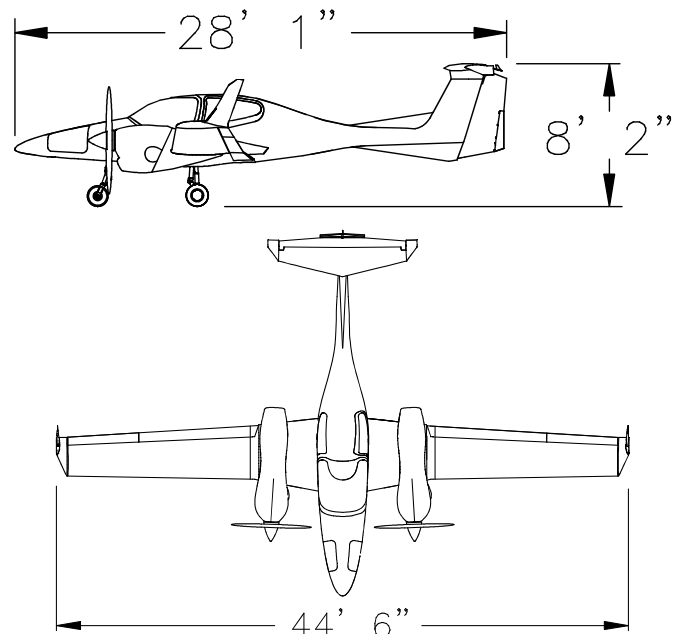
Avionics

GARMIN G1000 glass cockpit with:

- 10-inch Primary Flight and Multifunction Displays
 - GEA 71 airframe/engine interface unit
 - Dual GIA 63W COM/NAV/SBAS-GPS/GS/LOC
 - GMA 1347 digital audio system
 - GTX 345R Mode S Transponder (ADS-B In and Out)
 - GRS 79 AHRS
 - GDC 72 digital air data computer
 - GMU 44 magnetometer
 - GFC 700 3 axis AFCS with yaw damper
 - ELT 406 MHz
- Standby Instruments (Compass, Attitude Indicator, Air Speed Indicator (kts), Altitude Indicator (ft))

Avionics Options

- WX 500 Stormscope, 7 lbs
- Garmin Synthetic Vision Technology (SVT), 0 lbs
- Avidyne TAS 605 traffic advisory system, 15 lbs
- Garmin GWX 70 weather radar, 20 lbs
- Garmin GSR 56 iridium satellite datalink (sub req), 2 lbs
- Becker 3500 ADF, remote mounted, 9 lbs
- Honeywell KN63 DME, remote mounted, 7lbs
- Garmin GDL69A satlink-XM weather & radio (sub req), 7 lbs
- Jeppesen ChartView approach plates (sub req), 0 lbs



PERFORMANCE

Speeds

V _{ne}	188 KIAS
V _{mc}	68 KIAS (Flaps T/O)
V _r	76 KIAS (Flaps T/O)

Landing Gear Speed Limits

Extension V _{loe}	188 KIAS
Retraction V _{lor}	152 KIAS

Flap Speed Limits

V _{f1} (T/O)	133 KIAS
V _{f2} (LDG)	113 KIAS

Max Demonstrated Cross Wind 25 kts

Cruise Performance

High Speed Cruise:	190 ktas @ 92% Power / 16.8 gph (16,000 ft, ISA)
Economy Cruise:	152 ktas @ 60% Power / 10.3 gph (12,000 ft, ISA)
Max Endurance ¹ :	11.75 hrs @ 35% Power / 6.5 gph (18,000 ft, ISA)
Max Range ¹ :	1273nm @ 50% Power / 9.7gph (18,000 ft, ISA)

Notes:

¹ No reserve

Runway Performance

T/O Dist @ 3,748 lbs (grnd roll / over 50 ft obst)

1148 ft / 2011 ft

T/O Dist @ MTOW (grnd roll / over 50 ft obst)

1391 ft / 2546 ft

LDG Dist @ 3,748 lbs (grnd roll / over 50 ft obst)

1099 ft / 1893 ft

LDG Dist @ MTOW (grnd roll / over 50 ft obst)

1220 ft / 2034 ft

Ceiling

Certified Ceiling, Normal Ops:	18,000 ft
Certified Ceiling, Single Engine:	18,000 ft

Climb Performance

1,169 fpm @ 92% power ¹	6,000' Density Altitude, ISA
1,337 fpm @ 100% power ¹	Sea Level, ISA

Note: ¹ @ 4,200lbs

CONTACT US TODAY



Diamond Aircraft Industries Inc.

1560 Crumlin Sideroad, London, ON, Canada N5V 1S2

1-888-359-3220 • sales@diamondair.com • www.diamondaircraft.com