



DA40 with G1000 Normal Procedures (Incl high altitude)

PRE-START

Documents/Preflight Inspection – CHECK
Weight/Balance/Dens. Alt – CHECK
Hobbs Time – Logged
Baggage – STOWED
Rudder Pedals – ADJUSTED/LOCKED
Passenger Briefing – PERFORMED
Rear Door – CLOSED and LOCKED
Harness – FASTENED AND ADJUSTED
Parking Brake – SET
Flight Controls – FREE & CORRECT
Fuel Valve – EMPTIEST TANK
Trim Wheel – T/O
Mixture – IDLE CUT-OFF
Prop Control – FULL FORWARD
Throttle - FREE & IDLE POSITION
Cabin Heat – OFF
Circuit Breakers – CHECK IN
Alternate Air - CLOSED
Alternate Static Valve - CLOSED
Avionics Master – OFF
Ess. Bus Switch - OFF
Electrics – OFF
ALT/BAT Master Switch – ON
Canopy – CLOSED and SECURE
Strobes – ON

STARTING ENGINE

(engage starter 10 sec MAX; 20 Sec to cool)

Cold Start

Throttle – SET 1 Inch
Propeller – FULL FORWARD
Mixture – IDLE CUT-OFF
Brakes – HOLD
Propeller Area – CLEAR
Fuel Pump - ON
Mixture – FULL RICH
(3 - 5 Sec.) IDLE CUT-OFF
Fuel Pump - OFF
Throttle – SET TO ½ INCH
Ignition – START POSITION
Mixture – ADVANCE

Warm Start

Propeller – FULL FORWARD
Mixture – IDLE CUT-OFF
Brakes – HOLD
Propeller Area – CLEAR
Fuel Pump - ON
Mixture – IDLE CUT-OFF
Throttle – ½ inch OPEN
Ignition – START POSITION
Mixture – ADVANCE

Upon Engine Start

Throttle – min 1000 PRM
Fuel Pump – OFF
Oil Pressure – CHECK GREEN
Ammeter – CHECK GREEN

Oil Pressure – GREEN IN 15 SEC.
If not shutdown

Alerts lower right PFD – CHECK CLEAR
Engine Gauges – GREEN
Mixture – LEAN 1”+
Fuel Pump – OFF
Fuel Computer – UPDATE
Pilot Profile – LOAD
Headset Battery Pack – ON

BEFORE TAXIING

Avionics Master Switch – ON
Aircraft Lighting – AS REQUIRED
ATIS – COPY
Flight Instruments - SET
HSI – TO COMPASS
Radios/GPS - SET
Transponder – GND /1200
Engine Gauges – CHECK GREEN
Annunciator Panel – CHECK CLEAR
Autopilot – ON, OVERPOWER
Autopilot – ON, Stick Button Disc.
Fuel Valve – SWITCH TANKS
Taxi Clearance -- OBTAIN
Parking Brake – RELEASE

TAXIING

Brakes – Check
Flight Instruments – TAXI CHECK

RUN UP

Line Up Into Wind
Nose Wheel – STRAIGHT
Parking Brake – SET
Brakes – HOLD
Oil Temp. – CHECK GREEN
Oil Pressure – CHECK GREEN
Propeller – FULL FORWARD
Mixture – MAX POWER GUESS
Throttle – 2000 RPM
Check Ignition
LEFT/BOTH/RIGHT/BOTH
MAX DROP 175 RPM
MAX DIFF 50 RPM
Propeller – CYCLE 3 TIMES
Max Drop 500 RPM
Alternator Load – CHECK (1/day)
Mixture – MAX POWER + 1”
Engine Gauges – CHECK GREEN
Throttle – 1500 RPM
Alternate Air – TEST
Throttle – IDLE TEST
Throttle – 1000 RPM
Alerts lower right PFD – CHECK CLEAR

BEFORE TAKE – OFF

Safety Belts – FASTENED
Canopies – F LOCK, R LOCK, LIGHT
Fuel Valve – CHECK
Fuel Quantity – CHECK
Mixture – MAX POWER+
Propeller – FULL FORWARD
ALT/BAT Master Switch – ON
Ignition Switch – BOTH
Engine Instruments – CHECK
Flight Instruments – SET
Flaps – VERIFY T/O POSITION
Trim – SET FOR T/O
Autopilot – OFF
Alerts lower right PFD – CHECK CLEAR
Flight Controls – FREE/CORRECT
Fuel Pump – ON
Landing Light - ON
Transponder – 1200/GND
Strobes – ON
Parking Break – RELEASE

TAKE-OFF

Throttle – FULL POWER
(min 2660 RPM)

Engine Temp/Pressure - CHECK
Rotate – 59 kts
Climb Speed – 66 Kts (60 solo)

AFTER TAKE-OFF (500’ AGL)

Prop – 2400 RPM (MT Prop only)
Flaps – UP
Climb Speed -- 73 Kts (68 solo)

1000’ AGL

Fuel Pump – OFF
Landing Light – OFF

CRUISE

Throttle – SET AS DESIRED (22”)
Propeller – 1800-2400 RPM (MT)
Mixture – LEAN (as required)
Fuel Valve – FULLEST TANK
Annunciator Panel – CHECK CLEAR

BEFORE LANDING

GEN/BAT Master Switch – ON
Ignition – BOTH
Gauges – GREEN
Breakers – CHECK IN
Landing light – ON
GUMPS
Fuel Valve – FULLEST TANK
Fuel Pump – ON
Mixture – RICH
Prop – 2400 RPM
Seatbelts – FASTENED

FINAL APPROACH

Flaps – LANDING
Airspeed – 67 (63 solo)
Mixture – RICH
Propeller – FULL FORWARD

GO-AROUND

Throttle – FULL
Flaps – T/O
Airspeed – 66 (60 solo)

CLEAR OF RUNWAY

Throttle – 1000 RPM
Flaps – UP
Landing Light – OFF
Fuel Pump – OFF
Mixture – Lean 1”+