

PREFLIGHT OPERATIONS	
Piper PA-44-180/180T	
COCKPIT (D)	
Pitot Probe Cover	RMVD
Cowl Plugs	RMVD
AFM/POH	CHKD
G430 Ref Guide.....	CHKD
Aircraft Discrepancy Log	CHKD
Certificates	CHKD
VOR Log	CHKD
Hobbs/Tach	CHKD
Flight Controls	UNLKD
Parking Brake	TEST/SET
Fire Extinguisher	CHKD
Fuel Selectors	ON
Stabilator/Rudder Trim.....	NEUTRAL
Wing Flaps	40
Cowl Flaps.....	OPEN
Carburetor Heats	OFF
Circuit Breakers	CHKD
Avionics Master Switches	OFF
Avionics	OFF
Throttles/Props/Mixtures	IDLE/MAX/ICO
Landing Gear Lever	DOWN
Cockpit Lights (night)	CHECK
Position Lights	ON
Magneto Switches	OFF
Propeller Areas	CLEAR
Master Battery Switch	ON
Annunciator Lights.....	CHKD
Turn Coordinator.....	CHKD
Fuel Quantity	CHKD
Exterior Lights.....	CHKD
Pitot Heat	CHKD
Landing Gear Indicator Light.....	CHKD
Master Battery Switch	OFF
Alternate Static.....	OFF
Pitot/Static System.....	DRAIN
Emergency Exit	SECURE
Survival Kit.....	CHKD
Fuel Sump Valves (2)	SAMPLE
Wing Flaps.....	CHKD & UP

PREFLIGHT OPERATIONS	
Piper PA-44-180/180T	
RIGHT WING (D)	
Wing Flap.....	CHKD
Aileron	CHKD
Wing Tip	CHKD
Wing Leading Edge	CHKD
Wing Tie-down Rope	RMVD
Fuel Tank Vent	CHKD
Fuel Quantity & Cap	CHKD
Scupper Drain	CHKD
Engine Oil	4-6 QTS (4-5 QTS Turbo)
Fuel Pump.....	CHKD
Propeller & Spinner	CHKD
Engine Compartment	CHKD
Engine Cowl/Cowl Flap	CHKD
Main Landing Gear/Doors/Well.....	CHKD
Wheel Chocks.....	RMVD
Inspection Covers/Fairings	CHKD
NOSE (D)	
Intakes/Vents	CHKD
Nose Landing Gear/Doors/Well.....	CHKD
Wheel Chocks.....	RMVD
Transponder Antenna.....	CHKD
Inspection Covers/Fairings	CHKD
LEFT WING (D)	
Engine Oil	4-6 QTS (4-5 QTS Turbo)
Fuel Pump.....	CHKD
Propeller & Spinner	CHKD
Engine Compartment	CHKD
Engine Cowl/Cowl Flaps.....	CHKD
Main Landing Gear/Doors/Well.....	CHKD
Wheel Chocks.....	RMVD
Fuel Quantity & Cap	CHKD
Scupper Drain	CHKD
Pitot Tube.....	CHKD
Fuel Tank Vent.....	CHKD
Wing Tie-down Rope	RMVD
Stall Warning Tabs	CHKD
Wing Leading Edge	CHKD
Wing Tip	CHKD
Aileron	CHKD
Wing Flap.....	CHKD
Inspection Covers/Fairings	CHKD

PREFLIGHT OPERATIONS	
Piper PA-44-180/180T	
TAIL (D)	
GPS Antenna.....	CHKD
VHF Com. Antennas.....	CHKD
Marker Beacon Antenna.....	CHKD
Vertical Stabilizer.....	CHKD
VHF Navigation Antennas.....	CHKD
Stabilator & Trim Tab	CHKD
Tail Tie-down Rope.....	RMVD
Tail Tie-down Ring	CHKD
Rudder & Trim Tab	CHKD
ELT Antenna	CHKD
Inspection Covers/Fairings	CHKD
Windshield Sunshades.....	RMVD
Baggage Door	SECURE
"The preflight inspection is complete."	
AIRCRAFT DATA (PA-44-180)	
Vmc	56 KIAS
Vso	55 KIAS
Vs1	57 KIAS
Vx/Vxse	82 KIAS
Vy/Vyse	88 KIAS
Vsse	82 KIAS
Vfe (flaps 10-40)	111 KIAS
Va (3800 lbs.).....	135 KIAS
Va(2700 lbs.).....	112 KIAS
Vno	169 KIAS
Vne	202 KIAS
Vlo/Vle.....	140 KIAS
Vlo(Retract)	109 KIAS
Max. Ramp Wt.....	3816 Lbs.
Max. Takeoff Wt.....	3800 Lbs.
Max. Landing Wt	3800 Lbs.
Max. Baggage total.....	200 Lbs.
Total Fuel.....	110 Gallons
Usable Fuel.....	108 Gallons
Oil Capacity	6 Qts.
Oil Minimum.....	4 Qts.
Max. Dem. Crosswind	17 Kts.
Main Tire Pressure.....	55 PSI
Nose Tire Pressure.....	50 PSI
Maximum Storm Window Open	129 KIAS

PREFLIGHT OPERATIONS	
Piper PA-44-180/180T	
LEGEND	
	Associated standard callout, briefing, or other verbal statement
	Special Attention Item
	Item not required for certain training procedures, but otherwise standard
	Emergency Procedure
	Procedure which may or may not be an emergency, depending on situation
(D)	"Read & Do" checklist, not required to be memorized
(F)	"Flow & Verify" checklist, must be memorized
	Immediate Action Item, must be memorized
AIRCRAFT DATA (PA-44-180T)	
Vmc	57 KIAS
Vso	56 KIAS
Vs1	60 KIAS
Vx/Vxse	82 KIAS
Vy/Vyse	88 KIAS
Vsse	82 KIAS
Vfe (flaps 10-40)	111 KIAS
Va (3925 lbs.).....	137 KIAS
Va(2700 lbs.).....	112 KIAS
Vno	170 KIAS
Vne	202 KIAS
Vlo/Vle.....	140 KIAS
Vlo(Retract)	109 KIAS
Max. Ramp Wt.....	3943 Lbs.
Max. Takeoff Wt.....	3925 Lbs.
Max. Landing Wt	3800 Lbs.
Max. Baggage total.....	200 Lbs.
Total Fuel.....	110 Gallons
Usable Fuel.....	108 Gallons
Oil Capacity	6 Qts.
Oil Minimum.....	4 Qts.
Max. Dem. Crosswind	17 Kts.
Main Tire Pressure	55 PSI
Nose Tire Pressure.....	50 PSI
Maximum Storm Window Open	129 KIAS

NORMAL OPERATIONS	
Piper PA-44-180/180T	
BEFORE STARTING ENGINES(F)	
Preflight Prayer.....	COMPLETE
Passenger Brief.....	COMPLETE
Wheel Chocks.....	REMOVED
Parking Brake.....	SET
Seats/Seatbelts.....	UPRIGHT/SECURE
Fuel Selectors.....	ON
Stabilator/Rudder Trim.....	SET
Cowl Flaps.....	OPEN
Circuit Breakers.....	IN
Cabin Heat/Vents.....	OFF/SET
Cockpit Lights (night).....	ON
Mixtures.....	RICH
Throttles.....	1/4"
Landing Gear Handle.....	DOWN
Avionics Master Switches.....	OFF
Position Lights (sunset to sunrise).....	ON
Master Battery/Alternator Switches.....	ON
<i>"The before starting engine checklist is complete."</i>	
STARTING ENGINES (one at a time)(F)	
Strobe Lights (sunrise to sunset).....	ON
Normal:	
Prime cold engine 8 strokes or warm engine 3 strokes, then lock.	
If engine is flooded:	
-Throttle.....	FULL
-Mixture.....	ICO
Propeller Area.....	CLEAR
Magneto Switches.....	ON
Aux Fuel Pump.....	ON
Starter Switch.....	START
Primer (Turbo).....	PRIME 2 SECONDS
Throttle.....	700 RPM
Oil Pressure.....	STABLE
AFTER STARTING ENGINES (F)	
Aux Fuel Pumps.....	OFF
Throttles.....	1200 RPM
Mixtures.....	LEAN
Throttles.....	1000 RPM
Fuel Selectors.....	CROSSFEED
Heater/Fans.....	AS REQ
Engine Instruments.....	CHKD
Avionics Master Switches.....	OFF
Avionics.....	ON/SET
Flight Instruments.....	CHKD/SET
Flight Controls/Trims.....	CHKD
Departure Brief.....	COMPLETE
Parking Brake.....	OFF
Toe Brakes.....	CHKD
Taxi or Landing Light.....	ON
<i>"The after starting engines checklist is complete."</i>	

NORMAL OPERATIONS	
Piper PA-44-180/180T	
TAXI (F)	
Flight Instruments (IFR ops).....	CHKD
Nose Wheel Steering.....	CHKD
Toe Brakes.....	CHKD
<i>"The taxi checklist is complete."</i>	
BEFORE TAKEOFF (D)	
Parking Brake.....	SET
Fuel Selectors.....	ON
Mixtures.....	RICH
Throttles.....	1500 RPM
Propeller Feathering.....	CHKD
Throttles.....	2000 RPM
Engine Instruments.....	NORMAL
Carburetor Heats.....	CHKD
Propeller Governors.....	CHKD
Magnetos (175/50).....	CHKD
Alternators.....	CHKD
Engine Idle.....	CHKD
Fuel Quantity.....	CHKD
Takeoff Brief.....	COMPLETED
Doors/Windows.....	SECURED
Wing Flaps.....	SET
Runway Markings.....	CONFIRMED
5P Check.....	COMPLETE
<i>"The before takeoff checklist is complete."</i>	
RUNWAY (F)	
Cabin Fans.....	OFF
Transponder.....	ALT
Compass/HI.....	CHKD
Aux Fuel Pumps.....	ON
Strobe Lights.....	ON
Landing Light.....	ON
Pitot Heat.....	AS REQ
Runway Markings.....	CONFIRMED
<i>"The runway checklist is complete."</i>	
AFTER TAKEOFF (F)	
Landing Gear.....	UP
Wing Flaps.....	UP
Power (25/2500, 31/2400 for Turbo).....	SET
Engine Instruments.....	NORMAL
<i>"The after takeoff checklist is complete."</i>	
CRUISE (F)	
Cowl Flaps.....	AS REQ
Throttles/Props.....	55-75% POWER
Mixtures.....	BEST POWER
Engine Instruments.....	NORMAL
Taxi/Landing Lights.....	OFF
Aux Fuel Pumps.....	OFF
Flight Instruments.....	MONITOR
5P Check.....	COMPLETE
<i>"The cruise checklist is complete."</i>	

NORMAL OPERATIONS	
Piper PA-44-180/180T	
DESCENT (F)	
Fuel Selectors.....	ON
Cowl Flaps.....	CLOSED
Throttles/Props/Mixtures.....	AS REQ
Taxi/Landing Lights.....	ON
Toe Brakes.....	CHKD
Seats/Seatbelts.....	UPRIGHT/SECURE
Approach Brief.....	COMPLETE
5P Check.....	COMPLETE
<i>"The descent checklist is complete."</i>	
PRELIMINARY LANDING (F)	
Throttles/Props (20"/MAX).....	SET
Wing Flaps.....	10
Cowl Flaps.....	CLOSED
Carburetor Heats.....	ON
Mixtures.....	RICH
Landing Gear.....	DOWN/CONFIRMED
Aux Fuel Pumps.....	ON
5P Check.....	COMPLETE
<i>"The preliminary landing checklist is complete."</i>	
LANDING (F)	
Wing Flaps.....	AS REQ
Autopilot.....	OFF
Landing Gear.....	DOWN/CONFIRMED
Runway Markings.....	CONFIRMED
<i>"The landing checklist is complete."</i>	
AFTER LANDING (F)	
*Keep engine RPM below 1000 for minimum of 2 minutes during taxi & parking	
Wing Flaps.....	UP
Cowl Flaps.....	OPEN
Carburetor Heats.....	OFF
Mixtures.....	LEAN
Heater/Cabin Fans.....	AS REQ
*Heater to FAN for minimum 2 minutes before turning OFF	
Transponder.....	STBY
Aux Fuel Pumps.....	OFF
Strobe Lights (sunset to sunrise).....	OFF
Taxi or Landing Light.....	OFF
Pitot Heat.....	OFF
<i>"The after landing checklist is complete."</i>	

NORMAL OPERATIONS	
Piper PA-44-180/180T	
PARKING (D)	
Parking Brake.....	AS REQ
Taxi/Landing Lights.....	OFF
ELT.....	CHKD
Cabin Fans.....	OFF
Mixtures.....	ICO
Magneto Switches.....	OFF
Times In.....	TRANSMIT
<i>"The parking checklist is complete."</i>	
SECURING (D)	
Avionics.....	OFF
Avionics Master Switches.....	OFF
Master Battery/Alternator Switches.....	OFF
Hobbs/Tach/Fuel.....	RECORD
Flight Controls.....	LOCK
Wheel Chocks.....	INSTALL
Pitot Probe Cover.....	INSTALL
Cowl Plugs.....	INSTALL
Windshield Sunshades.....	INSTALL
Parking Brake.....	OFF
Tie-down Ropes.....	AS REQ
Discrepancies.....	RECORD
Trash & Personal Items.....	REMOVE
Post Flight Inspection.....	COMPLETE
<i>"The securing checklist is complete."</i>	

EMERGENCY OPERATIONS	
Piper PA-44-180/180T	
ENGINE FIRE –STARTUP	
Cranking	CONTINUE
If Engine Starts:	
(Affected Engine) Throttle. ...	1700RPM/3 MIN
Engine(s)	SHUTDOWN
If Engine Does Not Start:	
(Affected Engine) Throttle.	MAX
Mixtures	ICO
(Affected Engine) Starter Switch	START
Fuel Selectors.....	OFF
Auxiliary Fuel Pumps	OFF
Magneto Switches.....	OFF
Master Battery/Alternator Switches	OFF
Fire Extinguisher	REMOVE
Evacuate Aircraft	
ENGINE FAILURE-TAKEOFF ROLL	
Throttles	IDLE
Toe Brakes	AS REQ
Wing Flaps	UP
Mixtures	ICO
Magneto Switches	OFF
Master Battery Switch	OFF
If possible, contact ATC and request assistance	
ENGINE FAILURE-INFLIGHT	
Airspeed	88 KIAS
Obstacle clearance is 82 KIAS.	
Mixtures	RICH
Propellers	MAX
Throttles	MAX
Wing Flaps	UP
Landing Gear Lever	UP
Confirm inoperative engine.	
Troubleshoot if time and altitude permit:	
-Fuel Selectors	ON
-Primers	ON
-Carburetor Heats.....	ON
-Mixtures	AS REQ
-Magnetos	L/R
-Aux Fuel Pumps.....	ON
If no restart, secure inoperative engine:	
(Inoperative Engine) Propeller	FEATHER
(Inoperative Engine) Mixture.....	ICO
(Inoperative Engine) Fuel Selector	OFF
(Inoperative Engine) Cowl Flap	CLSD
(Inoperative Engine) Magnetos.....	OFF
(Inoperative Engine) Aux Fuel Pump.....	OFF
(Inoperative Engine) Alternator	OFF
Crossfeed fuel as required.	

EMERGENCY OPERATIONS	
Piper PA-44-180/180T	
ENGINE RESTART	
(Inoperative Engine) Fuel Selector.....	ON
(Inoperative Engine) Mixture.....	RICH
Pump (Inoperative Engine) throttle 2 strokes.	
(Inoperative Engine) Throttle.....	1/4"
(Inoperative Engine) Propeller	MAX
(Inoperative Engine) Magnetos	ON
(Inoperative Engine) Aux Fuel Pump.....	ON
Airspeed	AS REQ
(Inoperative Engine) Starter Switch	START
(Inoperative Engine) Alternator	ON
Maintain power @ 15" until CHT stabilizes.	
OEI APPROACH & LANDING	
Seats/Seatbelts.....	UPRGT/SECURE
(Operating Engine) Fuel Selector	ON
(Operating Engine) Mixture	RICH
(Operating Engine) Aux Fuel Pump.....	ON
When landing on the runway is certain:	
Landing Gear	DOWN/CONFIRMED
Wing Flaps	25
Airspeed	90 KIAS
Runway Markings	CONFIRMED
WING FIRE	
Lights/Pitot Heat	OFF
Sideslip.....	AS REQ
If necessary:	
-Declare emergency with ATC or on 121.50	
-Activate ELT	
-Squawk 7700	
ENGINE FIRE-INFLIGHT	
Confirm affected engine.	
(Affected Engine) Fuel Selector	OFF
(Affected Engine) Throttle.....	IDLE
(Affected Engine) Propeller	FEATHER
(Affected Engine) Mixture	ICO
(Affected Engine) Cowl Flap	OPEN
If necessary:	
-Declare emergency with ATC or on 121.50	
-Activate ELT	
-Squawk 7700	

EMERGENCY OPERATIONS	
Piper PA-44-180/180T	
SMOKE/CABIN FIRE	
Master Battery/Alternator Switches	OFF
Cabin Heat/Vents.....	OFF
Fire Extinguisher.....	AS REQ
Avionics Master Switches	OFF
Lights/Pitot Heat	OFF
When fire is extinguished:	
Cabin Heat/Vents	AS REQ
Master Battery/Alternator Switches.....	ON
Circuit Breakers	CHECK
Avionics	OFF
Avionics Master Switch.....	ON
Avionics	ON ONE AT A TIME
If necessary:	
-Declare emergency with ATC or on 121.50	
-Activate ELT	
-Squawk 7700	
SPIN RECOVERY	
Throttles	IDLE
Ailerons	NEUTRAL
Rudder	OPPOSITE
Stabilator	FORWARD
AIRFRAME ICE	
Climb, Descend, or Turn to Exit	
Carburetor Heats.....	ON
Cabin Heat/Defrost	ON
Pitot Heat	ON
Alternate Static	ON
If necessary:	
-Declare emergency with ATC or on 121.50	
-Activate ELT	
-Squawk 7700	
Throttles/Props/Mixtures.....	AS REQ
Window	OPEN AS REQ
Wing Flaps.....	UP FOR LNDNG
OVERVOLTAGE	
Electrical Load	REDUCE
Master Battery Switch	OFF
If loads not reduced:	
Master Battery Switch	ON
Alternator Switches	OFF
If necessary:	
-Declare emergency with ATC or on 121.50	
-Activate ELT	
-Squawk 7700	

EMERGENCY OPERATIONS	
Piper PA-44-180/180T	
ALTERNATOR FAILURE-DUAL	
Alternator Switches	OFF
Alternator Circuit Breakers.....	IN
Alternator Switches	ON
If outputs are restored:	
-Determine alternator showing least (not zero) amps.	
-Turn other alternator off.	
-Maintain electrical load @ 60 amps or less.	
If outputs are not restored:	
Master Battery Switch.....	OFF
Alternator Switches	ON
If outputs still not restored:	
Alternator Switches	OFF
If necessary:	
-Declare emergency with ATC or on 121.50	
-Activate ELT	
-Squawk 7700	
LANDING GEAR-WILL NOT EXTEND (D)	
Master Battery Switch.....	ON
Position Lights.....	OFF
Landing Gear Lever.....	DOWN
Landing Gear/Pump Circuit Breakers.....	IN
Emergency Knob.....	PULL
Landing Gear.....	DOWN/CONFIRMED
If unable to confirm gear down:	
-Declare emergency with ATC or on 121.50	
-Activate ELT	
-Squawk 7700	
PROPELLER OVERSPEED (F)	
Confirm affected propeller.	
(Affected Engine) Throttle.....	IDLE
(Affected Engine) Oil Pressure.....	CHECK
(Affected Engine) Propeller.....	MIN
Adjust throttle, propeller, and airspeed as required to maintain 2700 RPM or less.	
EMERGENCY DESCENT (F)	
Cowl Flaps.....	CLOSED
Throttles.....	IDLE
Propellers.....	MAX
Mixtures.....	AS REQ
Landing Gear.....	DOWN
Airspeed.....	140 KIAS
If necessary:	
-Declare emergency with ATC or on 121.50	
-Activate ELT	
-Squawk 7700	
Close side latch first if both are open	