

# Cessna-152 Checklist

## Preflight Checklist

### INTERIOR

- Required Documents ..... Check (ARROW)
- Hobbs & Tach Time ..... Check & Record times
- Flight Control Lock ..... Remove
- Radios & Electrical Equipment ..... **OFF** (except rotating beacon)
- Circuit Breakers ..... Check
- Primer ..... Locked
- Magneto Switch ..... **OFF** - Ignition key on dash
- Master Switch ..... **ON**
  - Fuel Gauges ..... Check quantity
  - Flaps ..... Down
  - Lights & Rotating Beacon ..... Check - then **OFF**
- Master Switch ..... **OFF**
- Fuel Selector ..... **ON**
- Trim ..... Set for takeoff
- Loose Articles ..... Secure

### EXTERIOR

- Left Wing Fuel Quick Drain Sump ..... Drain & Sample
- Left Fuselage ..... Check
- Stabilizer, Elevator & Rudder ..... Check
- Tail Tie Down ..... Remove
- Right Fuselage ..... Check
- Right Wing
  - Flap & Aileron ..... Check (rollers, hinges, weights)
  - Wing Tip, Nav Light & Leading Edge ..... Check
  - Tie Down ..... Remove
  - Tire, Brake, & Gear ..... Check - inflation/wear
  - Tire Chock ..... Remove
  - Fuel Quick Drain Sump ..... Drain & Sample
  - Fuel Tank Quality ..... Check - secure fuel cap
- Windshield ..... Clean
- Right Side Nose Strut & Tire ..... Check - inflation/wear
- Fuel Main Sump ..... Drain & Sample
- Oil Level ..... 4 - 6 qts
- Oil Cap & Access Door ..... Secured

### **Preflight Checklist (cont)**

Cowling, Intakes, Prop & Spinner ..... Check  
Alternator Belt ..... Check for tightness  
Engine Compartment ..... Check  
Taxi/Landing Light ..... Check  
Induction Air Filter ..... Check - clear  
Left Side Nose Strut & Tire ..... Check - inflation/wear  
Static Port ..... Check

#### **Left Wing**

Fuel Tank Quality ..... Check - secure fuel cap  
Pitot Tube ..... Check  
Stall Warning ..... Check  
Fuel Vent ..... Check  
Tie Down ..... Remove  
Leading Edge, Nav Light & Wing Tip ..... Check  
Aileron & Flap ..... Check (rollers, hinges, weights)  
Tire, Brake, & Gear ..... Check - inflation/wear  
Tire Chock ..... Remove  
Walk Around Airplane for Final Check

### **Before Starting Engine**

Seats, Belts & Harness ..... Fasten & Adjusted  
Doors ..... Closed  
Radios & Electrical Equipment ..... **OFF**  
Parking Brake ..... Set (if desired)

## Starting Engine

Mixture ..... Full Rich  
Carburetor Heat ..... **OFF**  
Prime ..... As required – then locked  
Throttle ..... Open 1/2 inch  
Rotating Beacon or Strobes ..... **ON**  
Propeller Area ..... **“CLEAR”**  
Brakes ..... Hold  
Master Switch ..... **ON**  
Magneto Switch ..... Start  
    Throttle ..... 1000 - 1200 RPM  
    Oil Pressure ..... Check  
    Ammeter ..... Check  
Flaps ..... Up  
Radios & Electrical Equipment ..... **ON** & Set  
Transponder ..... Standby  
Altimeter ..... Set  
Heading Indicator ..... Set  
Artificial Horizon ..... Set  
Magnetic Compass ..... Check

## Taxi Checks

Radio ..... Transmit for operation  
Flight Controls ..... Position for Wind  
Brakes ..... Test on initial taxi  
Instruments ..... Check for correct movement

## Engine Runup

Nose Wheel .....	Face wind & center nose wheel
Brakes.....	Hold
Doors & Windows.....	Closed & Latched
Trim.....	Takeoff position
Fuel Selector.....	<b>ON</b>
Throttle .....	1700 RPM
Magnetos .....	125 RPM - Max magneto drop
.....	50 RPM - Max differential drop
Carburetor Heat .....	Check for RPM drop
Mixture .....	Lean then Full Rich
Suction .....	Check
Ammeter .....	Check
Engine Instruments.....	Check (Oil Pressure/Temp)
Throttle .....	Idle
Carburetor Heat .....	<b>ON</b> - check for continued
.....	operation then <b>OFF</b>
Throttle .....	1000 - 1200 RPM
Flight Controls.....	Freedom of Movement
Flight Instruments.....	Re-check & set
Attitude Indicator .....	Check
Heading Indicator.....	Check
Altimeter .....	Check
Radios & Nav Aids .....	Set & Checked

## Before Takeoff

Throttle Friction.....	Adjust
Seat belts & Harness .....	Check
Doors & Windows.....	Closed and Latched
Flaps.....	Up (or as required = 10°)
Fuel Selector.....	<b>ON</b>
Carburetor Heat .....	<b>OFF</b>
Transponder.....	Set to (Alt)
Landing Light .....	<b>ON</b> (if desired)
Strobe Light.....	<b>ON</b> (if available)
Radio.....	Broadcast Intentions
Heading Indicator.....	Runway Heading
Flight Controls.....	Position for Wind
Takeoff Time .....	Note & Log

## **Normal Takeoff & Climb**

Trim..... Takeoff position  
Flaps.....Up (or as required = 10°)  
Carburetor Heat ..... **OFF**  
Mixture ..... Full Rich  
Throttle ..... Full Open  
Elevator Control ..... Lift Nose @ 50 KIAS  
Climb Airspeed ..... 70 KIAS (65 - 75 KIAS)

## **Short Field Takeoff**

Flaps..... 10 degree  
Brakes..... Apply  
Mixture ..... Full Rich  
Throttle ..... Full Open  
Brakes..... Release  
Elevator Control ..... Lift Nose @ 50 KIAS  
Climb Airspeed .....55 KIAS until obstacle cleared  
Flaps..... Retract slowly

## **Soft Field Takeoff**

Flaps..... 10 degree  
Mixture ..... Full Rich  
Elevator.....Full back position  
Breaks.....None - rolling from taxi  
Throttle ..... Full Open  
Ground Roll .....Hold nose wheel off runway  
Elevator Control ..... Remain in ground effect until V<sub>x</sub>  
Climb Airspeed ..... (54 KIAS) until obstacle cleared  
..... then V<sub>y</sub> (67 KIAS) or normal climb  
Flaps..... Retract slowly

## **Enroute Climb**

Airspeed .....75 KIAS (70 - 80 KIAS)  
Throttle ..... Full Open  
Landing Light ..... **OFF**

## Cruise Checklist

Engine Instruments..... Check  
Throttle ..... 2300 - 2400 RPM  
Mixture ..... Rich below 3000 ft  
..... Lean above 3000 ft  
Elevator Trim..... Adjust

## Decent Checklist

Engine Instruments..... Check  
Mixture ..... Full Rich  
Throttle ..... 2000 - 2200 RPM  
Carburetor Heat ..... ON - below green RPM arc

## Landing Checklist

Seats, Belts & Harness ..... Fasten & Adjusted  
Landing Light ..... On  
Fuel Selector ..... ON  
Mixture ..... Full Rich  
Carburetor Heat ..... ON - below green RPM arc  
Flaps ..... As required  
Airspeed - No Flap..... 60 - 70 KIAS  
Full Flap..... 55 - 65 KIAS  
Touchdown ..... Main wheels first  
Brakes..... Minimum required

## Short Field Landing

Final Approach Airspeed..... 54 KIAS  
Flaps ..... Full Down  
Power ..... Idle after over obstacle  
Touchdown ..... Main wheels first  
Brakes ..... Apply heavily  
Flaps ..... Retract immediately

## Soft Field Landing

Final Approach Airspeed..... 54 KIAS  
Flaps ..... Full Down  
Power ..... 1200 - 1500 RPM  
Touchdown ..... Smoothly at minimum descent rate  
Landing Ground Roll ..... Hold nose wheel off runway  
Taxi ..... Power and full back elevator

## **Balked Landing (go around)**

Throttle .....	Full Open
Flaps .....	Retract to 20 degree
Carburetor Heat .....	<b>OFF</b>
Climb Airspeed .....	55 KIAS (V <sub>x</sub> ) or 67 KIAS (V <sub>y</sub> )
Flaps .....	Slowly retract after safe airspeed

## **After Landing Checklist**

Flaps .....	Up
Carburetor Heat .....	<b>OFF</b>
Nonessential Electrical Equip.....	<b>OFF</b>
Transponder.....	<b>OFF</b>
Landing Light .....	<b>OFF</b>
Trim.....	Take-off position
Flight Controls.....	Position for wind

## **Shutdown Checklist**

Parking Brake .....	If required
Throttle .....	Idle - Mag grounding check
Throttle .....	1200 RPM
Electrical Equipment.....	<b>OFF</b> (except beacon)
Mixture .....	Idle - Cut-off
Magneto Switch.....	<b>OFF</b> - Key on dash
Master Switch .....	<b>OFF</b>
Fuel Selector.....	<b>OFF</b>

## **Securing Aircraft**

Flight Control Wheel .....	Installed
Main Wheels .....	Chocked
Wing & Tail Tie Downs.....	Attached
Engine Plug Covers .....	Installed
Pitot Cover .....	Installed
Hobbs & Tach Times.....	Recorded
Fuel & Oil Servicing.....	Recorded
Seat belts & Harness .....	Stowed
Door & Window .....	Locked

# Cessna 152 Aircraft Information

(All speeds in KIAS)

Rotate ( $V_r$ ) .....	50 - 60
Best Rate of Climb ( $V_y$ ).....	67
Best Angle of Climb ( $V_x$ )	
10° Flaps .....	54
Maneuvering Speed ( $V_a$ )	
At 1670 lbs .....	104
At 1500 lbs .....	98
At 1350 lbs .....	93
Best Glide Speed .....	60
Stall Speed	
Power Off, Flaps Up ( $V_{s1}$ ) .....	48
Power Off, Flaps 30° ( $V_{s0}$ ) .....	43
Approach Speed (Normal Landing)	
Flaps Up .....	60 - 70
Flaps 30° .....	55 - 65
Maximum Flaps Extended Speed ( $V_{fe}$ ) .....	85
Maximum Structural Speed ( $V_{no}$ ) .....	111
Never Exceed Speed ( $V_{ne}$ ) .....	149
Maximum Takeoff Weight .....	1670 lbs
Full Oil .....	6 qts
Fuel	
Full .....	26 gal
Useable .....	24.5 gal
Maximum Gross Weight (MGW) .....	1670 lbs
HP .....	110 HP
Maximum Crosswind .....	12



