

# **POWER-OFF STALLS**

**2,500' AGL MINIMUM ALTITUDE**

## **Goals:**

Simulate an inadvertent stall during final approach.

Learn to recognize aircraft “feel”, sounds and other hints of an incipient stall.

Learn the control inputs required for effective recovery.

## **Procedure:**

Select an entry altitude per Airman Certification Standards (ACS)

Perform clearing turns

Configure the aircraft – mixture rich

Apply carburetor heat

Reduce power to a normal approach setting (approx. 1500 rpm to reduce speed)

Lower flaps incrementally to approach setting

Establish a descent at normal approach speed

Pull the nose up to a landing pitch attitude and hold it there

Be alert to indications of a stall (warning horn/light, buffeting, and loss of control effectiveness)

Recover by simultaneously:

- Decrease angle of attack – nail horizon, level flight attitude

- Add full power, carb heat off, and raise flaps to 20°

- Check speed and flap condition

- Using rudder to maintain coordination

Transition to a shallow climb attitude, establish positive rate of climb and continue retracting flaps slowly, one notch at a time at  $V_y$  (80 MPH)

Resume normal cruise flight

## **Common Mistakes:**

Reacting too slowly, allowing the stall to develop further than intended

Attempting to keep the airplane from “falling off” by using ailerons, rather than rudder

Applying too much back pressure during the initial recovery and causing a secondary stall

Failing to maintain coordinated flight before and during the stall

Losing an excessive amount of altitude during the stall and recovery