

# PreFlight Preparation CFR 91.103

## Required Pilot Documents

- Pilot certificate
- Valid government issued ID
- Medical certificate

## Aircraft Documents (ARROW-EC)

- **Airworthiness certificate** (no expiration as long as aircraft remains airworthy)
- **Registration** (valid 7 years)
- **Radio station license** (international flights)
- **Operating limitations** (Airplane Flying Manual)
- **Weight and balance data** (aircraft specific)
- *External data plate*
- *Compass deviation card*

## Aircraft Maintenance (AAV1ATES)

- **Airworthiness Directives** (complied with)
- **Annual Inspection 91.409 (every 12 calendar months** signed by I.A. only)
- **VOR Check 91.171 (every 30 days)**
- **100 Hour Inspection 91.409** (required if flying for hire. Signed by A&P or I.A.)
- **Altimeter 91.411 (every 24 calendar months)**
- **Transponder 91.413 (every 24 calendar months)**
- **ELT 91.207 (every 12 calendar months)**
  - Battery must be replaced after more than **1 hour of cumulative use**; or
  - **If 50 % of the usable battery life is expired**
- **Static System 91.411 (every 24 calendar months)**

## Maintenance Logbooks

- Airframe: 100hr, Annual
- Engine: 100hr, Annual, 50 hour oil change
- Propeller: 100hr, Annual

## PAVE

- **Pilot** – Are you current and proficient, physical and physiological well being.
- **Aircraft** – Airworthy, fuel requirements, required equipment: 91.205, DA-40 KOEL
- **EnVironment** – weather, IFR/mvfr/vfr conditions, day or night, terrain, runway lengths
- **External pressures** – get-there-it is, passengers, goal-completion oriented

## IMSAFE

- **Illness** – symptoms?
- **Medication** – prescription vs over-the-counter
- **Stress** – psychological and physical
- **Alcohol** – drinking alcohol within 8 hours? 24 hours?
- **Fatigue** – adequately rested. tired?
- **Emotions** – upset? Hungry? Thirsty?

## 5-P Approach to Single Pilot Resource Management (SRM)

- **Plan** – destination, route, weather, fuel, NOTAMs, runway lengths, alternates, HAZARDS
- **Plane** – weight and balance, T/O and LDG distances, systems and avionics familiarity
- **Pilot** – IMSAFE checklist
- **Passengers** – get them to help scan for traffic, but also watch for anxiety or discomfort
- **Programming** – G1000, GPS, ForeFlight (iPad), autopilot to reduce workload