# Sample Critical Technical Parameters (CTPs)

**Operational Temperature:** -25°C to +135°C

**Camera Sensitivity:**  <50 mK at f/1.0

**Camera Pixel Pitch:** 17 μm

**Radar Cross Section:**

# Identify the CTPs that apply to the COIs (may have to make up some CTPs and adjust some numbers)

1. Can the UAV collect ISR data to support the mission?
   1. Camera sensitivity (NEdT): <50 mK at f/1.0
   2. Camera Pixel Pitch: 17 μm
2. Are the optics capable of seeing up to the line of sight in all weather?
   1. Scene Range (High Gain): -25°C to +135°C
3. Will the susceptibility and vulnerability characteristics of the (UAV Name) allow the successful completion of its mission in its intended operating environment?
   1. Radar cross section:
4. Will the (UAV Name) be safe to operate in a combat environment?

# Identify the function of each COI and the capabilities of each function

|  |  |
| --- | --- |
| **COI/Function** | **Capability** |
| **5. Data Collection** | * **ISR data collection** |
| **6. Sensing** | * **Capture imagery** |
| **7. Reliability** | * **Ability to complete mission** |
| **8. Safety** | * **Ability to avoid detection** * **Ability to evade threats** |

# Identify the Test Objectives for each COI in the Test Objective Matrix (TOM). The rest of the COIs will be Test E-1 to E-8 (E=Effectiveness, S=Suitability).

|  |  |  |
| --- | --- | --- |
| **COI** | **Test Objectives and Sub-Objectives** | **Test** |
| **5. Data Collection** | **To determine the accuracy of the data transfer** | **S-1** |
| **6. Sensing** | **To determine the accuracy of the sensors**   * **Range (E-9a)** * **Speed (E-9b)** | **E-9** |
| **7. Reliability** | **To determine the clarity of the video** | **S-2** |
| **8. Safety** | **To determine the impact of the weapons**   * **Lethality (E-10a)** * **Rate of fire (E-10b)** | **E-10** |