

# **Sport Aviation Association SA2022 Ultra-light Vehicle Occurrence Investigation**

## **Executive Summary**

On August 3, 2024, a Sport Aviation Association Sling LSA ultra-light vehicle, control number SA2022, took off from runway 26 of the Jiehao activity field in Gaoshu Township, Pingtung County at 1426L, with 1 operator and 1 occupant. The vehicle crashed into a betel nut garden on the west side of runway 08 at 1427L. The vehicle suffered substantial damage, but no one on board was injured.

### **The findings related to probable causes are as follows:**

1. The engine intake cover of the occurrence vehicle was not removed before flight, which resulted in insufficient airflow to the engine and reduced power output.
2. During takeoff, the vehicle experienced abnormal acceleration, and the operator failed to perform a rejected takeoff. After liftoff, the airspeed nearly reached stall speed, but the operator did not have adequate awareness of the stall or the skills necessary for recovery. This led the aircraft into an abnormal attitude that was not corrected effectively, ultimately resulting in a crash.

### **The findings related to risk are as follows:**

1. The discrepancy between the vehicle flight manual and the owner's self-made checklists may cause the pilot to overlook potential flight risks if relying solely on the self-made checklists.

### **The other findings are as follows:**

1. The weight and balance of the occurrence vehicle were within the limits, and there were no abnormalities in the airworthiness information before the flight. The engine was operating normally during the flight.

## **Transportation Safety Recommendations**

### **To Sport Aviation Association**

1. Revise the onboard document update procedures to ensure consistency between the self-made checklists and the manufacturer's flight manual.
2. Review and revise the training curriculum regarding the identification and handling of abnormal conditions during the takeoff phase, as well as the recognition and recovery procedures for stall conditions to reduce the risk associated with vehicle operation.

### **To Civil Aeronautics Administration, Taiwan**

1. Supervise the Sport Aviation Association to review and revise the onboard document update procedures and the training programs for abnormal conditions during takeoff and vehicle stalls.

The final report is in Chinese only and available for download at <https://www.ttsb.gov.tw>