



Aviation Investigation Final Report

Location:	Waukesha, Wisconsin	Accident Number:	CEN23LA104
Date & Time:	February 8, 2023, 10:00 Local	Registration:	N426SJ
Aircraft:	CIRRUS DESIGN CORP SF50	Aircraft Damage:	Substantial
Defining Event:	Preflight or dispatch event	Injuries:	2 None
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

The pilot reported that during takeoff, he heard a noise that sounded like “gravel hitting the gear,” which continued after landing gear retraction, and prompted a return to the departure airport for a precautionary landing. He stated that while on the downwind leg, the stall warning aural alert sounded, and the stick shaker activated; the pilot used the autopilot disconnect button to regain control of the airplane.

During touchdown, the airplane bounced and exited the runway, which resulted in substantial damage to the lower forward fuselage. Following the accident, the pilot discovered that he had failed to remove the angle of attack vane cover. The pilot reported that there were no preaccident mechanical malfunctions or failures with the airplane that would have precluded normal operation.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be:

The pilot’s failure to maintain aircraft control during landing. Contributing to the accident was the pilot’s inadequate preflight inspection removal of the angle of attack vane cover.

Findings

Personnel issues	Aircraft control - Pilot
Aircraft	Directional control - Not attained/maintained
Personnel issues	Preflight inspection - Pilot

Factual Information

History of Flight

Prior to flight	Preflight or dispatch event (Defining event)
Approach	Stall warn/stick-shaker/pusher
Landing-flare/touchdown	Loss of control in flight
Landing-flare/touchdown	Runway excursion

Pilot Information

Certificate:	Private	Age:	59,Male
Airplane Rating(s):	Single-engine land	Seat Occupied:	Left
Other Aircraft Rating(s):	None	Restraint Used:	3-point
Instrument Rating(s):	Airplane	Second Pilot Present:	
Instructor Rating(s):	None	Toxicology Performed:	
Medical Certification:	Class 3 With waivers/limitations	Last FAA Medical Exam:	February 1, 2023
Occupational Pilot:	No	Last Flight Review or Equivalent:	January 27, 2023
Flight Time:	(Estimated) 396 hours (Total, all aircraft), 51 hours (Total, this make and model), 204 hours (Pilot In Command, all aircraft), 57 hours (Last 90 days, all aircraft), 57 hours (Last 30 days, all aircraft), 4 hours (Last 24 hours, all aircraft)		

Passenger Information

Certificate:	Age:
Airplane Rating(s):	Seat Occupied: Right
Other Aircraft Rating(s):	Restraint Used: Unknown
Instrument Rating(s):	Second Pilot Present:
Instructor Rating(s):	Toxicology Performed:
Medical Certification:	Last FAA Medical Exam:
Occupational Pilot:	Last Flight Review or Equivalent:
Flight Time:	

Aircraft and Owner/Operator Information

Aircraft Make:	CIRRUS DESIGN CORP	Registration:	N426SJ
Model/Series:	SF50	Aircraft Category:	Airplane
Year of Manufacture:	2019	Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	0148
Landing Gear Type:	Retractable - Tricycle	Seats:	7
Date/Type of Last Inspection:		Certified Max Gross Wt.:	6000 lbs
Time Since Last Inspection:		Engines:	1 Turbo fan
Airframe Total Time:	680.6 Hrs at time of accident	Engine Manufacturer:	Williams International
ELT:	Installed	Engine Model/Series:	FJ33-5A
Registered Owner:	MAG Aviation, LLC	Rated Power:	1846 Lbs thrust
Operator:	On file	Operating Certificate(s) Held:	None

Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Day
Observation Facility, Elevation:	KUES, 911 ft msl	Distance from Accident Site:	0 Nautical Miles
Observation Time:	09:45 Local	Direction from Accident Site:	249°
Lowest Cloud Condition:	Clear	Visibility	10 miles
Lowest Ceiling:	None	Visibility (RVR):	
Wind Speed/Gusts:	/	Turbulence Type Forecast/Actual:	Unknown / Unknown
Wind Direction:		Turbulence Severity Forecast/Actual:	N/A / N/A
Altimeter Setting:	30.24 inches Hg	Temperature/Dew Point:	1°C / -4°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	Waukesha, WI	Type of Flight Plan Filed:	IFR
Destination:	Waukesha, WI	Type of Clearance:	IFR
Departure Time:		Type of Airspace:	Class D

Airport Information

Airport:	Waukesha County Airport UES	Runway Surface Type:	Concrete
Airport Elevation:	911 ft msl	Runway Surface Condition:	Dry
Runway Used:	28	IFR Approach:	None
Runway Length/Width:	5849 ft / 100 ft	VFR Approach/Landing:	Precautionary landing

Wreckage and Impact Information

Crew Injuries:	1 None	Aircraft Damage:	Substantial
Passenger Injuries:	1 None	Aircraft Fire:	None
Ground Injuries:		Aircraft Explosion:	None
Total Injuries:	2 None	Latitude, Longitude:	43.04163,-88.234731(est)

Administrative Information

Investigator In Charge (IIC):	Finne, Andrew
Additional Participating Persons:	Dziengel, Michael; FAA-FSDO; Milwaukee, MN
Original Publish Date:	April 6, 2023
Last Revision Date:	
Investigation Class:	Class 4
Note:	The NTSB did not travel to the scene of this accident.
Investigation Docket:	https://data.nts.gov/Docket?ProjectID=106702

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The NTSB does not assign fault or blame for an accident or incident; rather, as specified by NTSB regulation, “accident/incident investigations are fact-finding proceedings with no formal issues and no adverse parties ... and are not conducted for the purpose of determining the rights or liabilities of any person” (Title 49 *Code of Federal Regulations* section 831.4). Assignment of fault or legal liability is not relevant to the NTSB’s statutory mission to improve transportation safety by investigating accidents and incidents and issuing safety recommendations. In addition, statutory language prohibits the admission into evidence or use of any part of an NTSB report related to an accident in a civil action for damages resulting from a matter mentioned in the report (Title 49 *United States Code* section 1154(b)). A factual report that may be admissible under 49 *United States Code* section 1154(b) is available [here](#).