



Aviation Investigation Final Report

Location:	STORM LAKE, Iowa	Accident Number:	CHI94LA309
Date & Time:	September 1, 1994, 19:15 Local	Registration:	N2597S
Aircraft:	Balloon Works FIRE FLY 7-15	Aircraft Damage:	Substantial
Defining Event:		Injuries:	2 Serious
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

According to the pilot, as he approached his destination airport in his hot air balloon, the balloon encountered a downdraft from a dissipating thunderstorm. He intended to bring the hot air balloon down to the ground quickly to avoid the wind from blowing the balloon across the ground. Although he continued burning all the way to the ground, the pilot was unable to stop the balloon's high rate of descent. The gondola impacted the ground hard, rebounded into the air to approximately 100 feet above the ground, and then impacted the ground again. The balloon continued along the ground until it struck power lines where it came to rest.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: the pilot's excessive rate of descent to landing. Factors in the accident were the gusts and downdraft.

Findings

Occurrence #1: HARD LANDING
Phase of Operation: LANDING - FLARE/TOUCHDOWN

Findings

1. (C) DESCENT - EXCESSIVE - PILOT IN COMMAND
2. (F) WEATHER CONDITION - GUSTS
3. (F) WEATHER CONDITION - DOWNDRAFT

Factual Information

On September 1, 1994, at 1915 central daylight time, a Firefly 7- 15 balloon, N2597S, was substantially damaged when it landed hard at Storm Lake Municipal Airport, Storm Lake, Iowa. Both the commercial pilot and passenger received serious injuries. The 14 CFR Part 91 flight originated from a field located eight miles northeast of Storm Lake, Iowa. Visual meteorological conditions prevailed at the time of the flight.

According to the pilot, he inflated the hot air balloon and ascended with one passenger aboard en route to Storm Lake Municipal Airport. He states as the balloon approached the airport, the balloon encountered a downdraft from a dissipating thunderstorm which was several miles away. The pilot believed that he would have to bring the balloon down to the ground quickly to avoid the wind from blowing it across the ground. Although he continued burning all the way to the ground, he was unable not stop the balloon's high rate of decent. The gondola impacted the ground hard and the pilot was thrown from the basket. A fire started near the burner assembly as the balloon rebounded into the air. The passenger was still aboard. The pilot states the balloon climbed to approximately 100 feet above the ground and then started to descend. The balloon impacted the ground for a second time. At this point the passenger was able to crawl out on the gondola. The balloon continued along the ground until it struck power lines where it came to rest.

Pilot Information

Certificate:	Commercial	Age:	61, Male
Airplane Rating(s):	None	Seat Occupied:	Unknown
Other Aircraft Rating(s):	Balloon	Restraint Used:	
Instrument Rating(s):	None	Second Pilot Present:	No
Instructor Rating(s):	None	Toxicology Performed:	No
Medical Certification:	Unknown Unknown	Last FAA Medical Exam:	
Occupational Pilot:	UNK	Last Flight Review or Equivalent:	
Flight Time:	474 hours (Total, all aircraft), 474 hours (Total, this make and model), 464 hours (Pilot In Command, all aircraft), 13 hours (Last 90 days, all aircraft), 7 hours (Last 30 days, all aircraft), 1 hours (Last 24 hours, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	Balloon Works	Registration:	N2597S
Model/Series:	FIRE FLY 7-15 FIRE FLY 7	Aircraft Category:	Balloon
Year of Manufacture:		Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	F7-811
Landing Gear Type:		Seats:	0
Date/Type of Last Inspection:	Annual	Certified Max Gross Wt.:	1750 lbs
Time Since Last Inspection:		Engines:	Unknown
Airframe Total Time:		Engine Manufacturer:	
ELT:		Engine Model/Series:	
Registered Owner:	RICHARD C. SCHICK	Rated Power:	
Operator:	RICHARD C. SCHICK	Operating Certificate(s) Held:	
Operator Does Business As:		Operator Designator Code:	

Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Day
Observation Facility, Elevation:	SLB ,1488 ft msl	Distance from Accident Site:	
Observation Time:	19:00 Local	Direction from Accident Site:	
Lowest Cloud Condition:	4600 ft AGL	Visibility	10 miles
Lowest Ceiling:	Overcast / 5500 ft AGL	Visibility (RVR):	
Wind Speed/Gusts:	11 knots / 14 knots	Turbulence Type Forecast/Actual:	/
Wind Direction:	30°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	30 inches Hg	Temperature/Dew Point:	15°C / 11°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:		Type of Flight Plan Filed:	None
Destination:		Type of Clearance:	None
Departure Time:	00:00 Local	Type of Airspace:	Class G

Airport Information

Airport:	STORM LAKE MUNICIPAL SLB	Runway Surface Type:	Grass/turf
Airport Elevation:	1488 ft msl	Runway Surface Condition:	
Runway Used:	0	IFR Approach:	None
Runway Length/Width:		VFR Approach/Landing:	Full stop

Wreckage and Impact Information

Crew Injuries:	1 Serious	Aircraft Damage:	Substantial
Passenger Injuries:	1 Serious	Aircraft Fire:	In-flight
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	2 Serious	Latitude, Longitude:	42.639087,-95.190673(est)

Administrative Information

Investigator In Charge (IIC):	Corsones, Christine
Additional Participating Persons:	DANNY SHARP; DES MOINES , IA
Original Publish Date:	January 12, 1995
Last Revision Date:	
Investigation Class:	Class
Note:	
Investigation Docket:	https://data.ntsb.gov/Docket?ProjectID=9664

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