



# **Aviation Investigation Final Report**

Location: Rio Rancho, New Mexico Accident Number: CEN14LA007

Date & Time: October 9, 2013, 08:45 Local Registration: N9528A

Aircraft: CAMERON BALLOONS US V 77 Aircraft Damage: Substantial

**Defining Event:** Controlled flight into terr/obj (CFIT) **Injuries:** 2 Serious

Flight Conducted Under: Part 91: General aviation - Personal

### **Analysis**

The pilot and passenger departed on a balloon flight and had been airborne for a little over an hour before making three attempts to land. The wind was too strong on the first attempt; on the next attempt, they found themselves over a residential subdivision that prevented them from landing. The pilot then saw an open area on the other side of a street with power lines running along it. His intent was to get over the power lines and then drop the balloon down to the ground. They were over the road and a couple of feet over the power lines when the balloon dropped and struck the power lines. The pilot engaged the burner and the basket slid off the first two wires, but when the basket touched the third wire there was an electrical short and then an explosion. The pilot reported the explosion was the last thing he remembered until he found himself on the ground with the envelope going down.

### **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 adequate clearance from power lines on approach to land, resulting in a collision with the wires, a spark, and a subsequent explosion and on-board fire.

### **Findings**

Personnel issues Incorrect action selection - Pilot

Environmental issues Wire - Response/compensation

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#### **Factual Information**

#### **History of Flight**

Approach	Controlled flight into terr/obj (CFIT) (Defining event)
Post-impact	Explosion (post-impact)

On October 9, 2013, about 0845 mountain daylight time, a Cameron V-77 hot air balloon, N9528A, impacted a power line while on approach to land in a field near Rio Ranch, New Mexico. The commercial pilot and passenger on board received serious injuries and the balloon was substantially damaged. The balloon was registered to and being operated by a private individual as a 14 Code of Federal Regulations Part 91 personal flight. Visual meteorological conditions prevailed for the flight, which operated without a flight plan. The flight originated at Fiesta Field, Albuquerque, New Mexico, at 0730.

The pilot reported they took off from Fiesta Field and had been in the air for a little over an hour when the accident occurred. The pilot made three attempts to land. The wind was "too hard" on the first attempt. The next attempt, they found themselves over a residential subdivision and as they got close to the ground there were cars and other obstacles that prevented them from landing. The pilot then saw an open area on the other side of a street with power lines running along it. His intent was to get over the power lines and then drop the balloon down on the ground.

The pilot reported they were over the road and a couple of feet above where the tops of the power lines were, when the balloon dropped and struck the power lines. He engaged the burner to get off and over them. The basket slid off the first two wires, but touched the third wire. There was an electrical short and then an explosion. The passenger was in the part of the basket where the explosion occurred. The pilot reported the explosion was the last thing he remembered until he found himself on the ground with the envelope going down. He tried to assist the passenger out of the basket and put out the fire that was burning the basket.

The pilot received burns to his arms and face. The passenger received severe burns along his arm, such that the arm had to later be amputated.

At 0852, the weather conditions at the Albuquerque International Airport, 15 miles south-southeast of Rio Rancho, were wind calm, visibility 10 statute miles, few clouds at 20,000 feet, temperature 55 degrees Fahrenheit (F), dew point, 34 degrees F, and altimeter 30.02 inches of Mercury.

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### **Pilot Information**

Certificate:	Commercial	Age:	59
Airplane Rating(s):	Single-engine land	Seat Occupied:	Center
Other Aircraft Rating(s):	Balloon	Restraint Used:	None
Instrument Rating(s):	None	Second Pilot Present:	No
Instructor Rating(s):	None	Toxicology Performed:	No
Medical Certification:	None None	Last FAA Medical Exam:	
Occupational Pilot:	No	Last Flight Review or Equivalent:	April 30, 2013
Flight Time:	(Estimated) 290 hours (Total, all aircraft), 105 hours (Total, this make and model), 220 hours (Pilot In Command, all aircraft), 8 hours (Last 90 days, all aircraft), 6 hours (Last 30 days, all aircraft), 2 hours (Last 24 hours, all aircraft)		

## Passenger Information

Certificate:		Age:	
Certificate.		Age:	
Airplane Rating(s):		Seat Occupied:	Unknown
Other Aircraft Rating(s):		Restraint Used:	None
Instrument Rating(s):		Second Pilot Present:	No
Instructor Rating(s):		Toxicology Performed:	No
Medical Certification:		Last FAA Medical Exam:	
Occupational Pilot:	UNK	Last Flight Review or Equivalent:	
Flight Time:			

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## **Aircraft and Owner/Operator Information**

Aircraft Make:	CAMERON BALLOONS US	Registration:	N9528A
Model/Series:	V 77 NO SERIES	Aircraft Category:	Balloon
Year of Manufacture:	1990	Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	5649
Landing Gear Type:	N/A; Skid	Seats:	
Date/Type of Last Inspection:		Certified Max Gross Wt.:	
Time Since Last Inspection:		Engines:	
Airframe Total Time:		Engine Manufacturer:	
ELT:		Engine Model/Series:	
Registered Owner:	KILGORE MARK A	Rated Power:	
Operator:	KILGORE MARK A	Operating Certificate(s) Held:	None

## Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Day
Observation Facility, Elevation:	ABQ	Distance from Accident Site:	15 Nautical Miles
Observation Time:	08:52 Local	Direction from Accident Site:	135°
<b>Lowest Cloud Condition:</b>	Few / 20000 ft AGL	Visibility	10 miles
Lowest Ceiling:	None	Visibility (RVR):	
Wind Speed/Gusts:	/	Turbulence Type Forecast/Actual:	/ None
Wind Direction:		Turbulence Severity Forecast/Actual:	/ N/A
Altimeter Setting:	30.02 inches Hg	Temperature/Dew Point:	13°C / 1°C
Precipitation and Obscuration:			
Departure Point:	Albuquerque, NM	Type of Flight Plan Filed:	None
Destination:	Rio Rancho, NM	Type of Clearance:	None
Departure Time:	07:30 Local	Type of Airspace:	Class G

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## **Wreckage and Impact Information**

Crew Injuries:	1 Serious	Aircraft Damage:	Substantial
Passenger Injuries:	1 Serious	Aircraft Fire:	Both in-flight and on-ground
Ground Injuries:	N/A	Aircraft Explosion:	In-flight
Total Injuries:	2 Serious	Latitude, Longitude:	35.314723,-106.648612(est)

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#### **Administrative Information**

Investigator In Charge (IIC):

Additional Participating
Persons:

Original Publish Date:

February 3, 2014

Last Revision Date:

Investigation Class:

Class

Note:

Investigation Docket:

https://data.ntsb.gov/Docket?ProjectID=88188

The National Transportation Safety Board (NTSB) is an independent federal agency charged by Congress with investigating every civil aviation accident in the United States and significant events in other modes of transportation—railroad, transit, highway, marine, pipeline, and commercial space. We determine the probable causes of the accidents and events we investigate, and issue safety recommendations aimed at preventing future occurrences. In addition, we conduct transportation safety research studies and offer information and other assistance to family members and survivors for each accident or event we investigate. We also serve as the appellate authority for enforcement actions involving aviation and mariner certificates issued by the Federal Aviation Administration (FAA) and US Coast Guard, and we adjudicate appeals of civil penalty actions taken by the FAA.

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.

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