



RECORD OF CONVERSATION

All persons listed were interviewed by Zoë Keliher (NTSB Regional Duty Officer)

The following is a summary of conversation:

Tom Talbott [REDACTED]

Mr. Talbott was the parachute team-lead and the owner of the airplane that had collided with a house earlier in the evening. He stated that they were planning to do the dropped from an altitude of 3500 feet above ground level (agl). The airplane was equipped with a pyrotechnic box that was mounted to the airframe step on the left side of the fuselage (attached with screws). They turned the pyrotechnic box on at night for a visual effect on the ground. Mr. Talbott clarified that the box was the same type as what the parachute jumpers wear on their ankles during nighttime jump operations. After completing a normal takeoff, the pilot maneuvered the airplane in a climb configuration to reach the desired altitude. While climbing, he heard a loud "pop" and saw there was a hole in the left wing located about 2 to 3 feet outboard from the wing root. He observed fuel pouring out of the wing into the pyrotechnic box creating a larger flame. The pilot elected to attempt a landing at Chandler. The other jumpers had left the airplane and the heat was getting more intense in the cockpit. He jumped out low as the pilot continued and later jumped out. The pilot sustained burns on the shoulders and was sent to the hospital to get treated.

Mr. Talbott stated that they had never had problems with the pyrotechnic box prior. He thought that it possibly had caused the puncture in the wing and resulting fire.

Zoë Keliher
Air Safety Investigator
Western Pacific Region



RECORD OF CONVERSATION

Albert P. Nixon
Aviation Accident Investigator
Western Pacific Region

Date: Sep 18, 2016
Person Contacted: Michael Scruggs (Witness)
NTSB Accident Number: WPR16FA183

Narrative:

During a conversation with Michael Scruggs, the following is a summary of what he stated:

- He lives in Gilbert, Arizona, and from 1915-1920 time, he looked westward from his home.
- He was aware of the parachute jump that night.
- He saw an amber glow in the air and it rapidly turned to the south.
- He noticed smoke trailing the glow and then saw 4 parachutes.
- The parachutist had sparks trailing from them.
- It was in a very steep descent of about 70-80 degrees.
- The total time he observed the glow was about 10-15 seconds.



RECORD OF CONVERSATION

Albert P. Nixon
Aviation Accident Investigator
Western Pacific Region

Date: September 17, 2016
Person Contacted: Ryan Kilgore (Accident Pilot)
NTSB Accident Number: WPR16FA183

Narrative:

During an interview with Ryan Kilgore by Detective TJ Roberts (Gilbert Police Department) at the hospital, the following is a summary of what Ryan stated:

- There were pyrotechnics on the plane.
- The people jumping had pyrotechnics.
- When the pyrotechnics was lit off, to start, it sounded like a “gun shot” went off.
- He looked back and fire was going out the tail.
- Something punctured the wing and it started to catch fire.
- Jumpers were just getting ready to go.
- Left wing was on fire.
- He turned off the fuel to that side.
- He tried to get to an airport to land.
- He was trying to get out of plane.
- He tumbled out of the crew door.
- He landed in someone’s yard.
- He landed on grass.
- He made a phone call to one of the jumper’s wife.
- This was not an airplane issue.
- It was the Sky Diving Demo Team gear, pyro on the airplane and jumpers.



RECORD OF CONVERSATION

Albert P. Nixon
Aviation Accident Investigator
Western Pacific Region

Date: October 25, 2016
Person Contacted: Thomas N. Talbott (Airplane Owner)
NTSB Accident Number: WPR16FA183

Narrative:

During a conversation with Thomas N. Talbott, the following is a summary of what he stated:

- He has been sky diving for 27 years.
- Master Jumper – professionally rated for 20 years.
- About 16,000 jumps and 1,000 demonstration jumps.
- Last 6 months accomplished 28 demonstration jumps.

- Airplane bought about 3 years ago.
- Only needed annuals.
- Only minor repairs on tires, brakes, and light bulbs.
- Nothing needed to be repaired except a static wick by the next annual.
- Had performed at the Gilbert jump event for 12 years.
- Were to jump at night and land by crowd.
- Suppose to jump at 1930 but went about 10 mins earlier.
- Drones were flying in the area but were low (below 200 ft and most of them lower) and would have only possibly interfered with the jumpers.

- Airplane jump door.
 - Standard jump door– hinges upward.
 - Extended step on right side.
- Right yoke, right pilot seat, and rear seats removed.
- Sparkler fountain box installed on pilot's side step.
- Normal step and box sat on top of it.
- Box was about 14 inches long, 8 inches wide, and 4-5 inches tall.
- Box was made from aircraft aluminum, rivets, and nuts.

- Box had a lid on it.
- The lid shuts.
- Constructed by 3 different people. Aircraft fabricator, Master Fabricator/engineer who does machine work, and also a fireworks shooter for 40 years.
- Back of box is open.

- 2 stage fountain – sparkler.
- About 8 inches long and 2 ½ inches round.
- Average between 22-30 seconds duration.
- Purchase from Firework Productions, a local vendor.

- Double redundancy boxes (box on plane and those on jumpers).
- The Battery source was in the switch box used to ignite them is separate from the fountains/sparklers.
- Double safety switch on them.
- Switch box on floor of airplane behind the pilot's seat.
 - Guarded, grounded, and energized, by the number 4 jumper.
- Individual sparklers are manually controlled by the jumpers.

- Night of event.
- No issues with the airplane.
- Preflight was fine.
- Roped off landing area for jumpers.
- Area was 220 ft long by 40 ft wide.
- Brief exit, altitude, jumper timing, winds, and discussed safety of exit (the position jumpers leave the aircraft).
- Parachute checks and pilot briefing.
- Winds were zero on the deck.

- Circled about 10 minutes at exit altitude.
- Ground crew gave them the 2-minute warning.
- Safety Checks.
- Jumper on knees, light suits on, strobes on, and camera's-go-pros ready.
- At 1-minute mark, sparkler box in airplane on.
- Plug in into switch box.
- Open switch box.
- Turn on master power for switch box.
- One red light for power, and two green lights, showed good connection to sparklers.
- Again, designed by a fireworks guy.

- At 1-minute call, notified ATC.
- Called ground to confirm.
- Prep airplane for exit.
- Pilot's permission to open door.
- 30 seconds – airplane sparklers on (ignited).
- Usually just as sparklers burn out, jumpers will exit the airplane.

- About 8 seconds after turning on sparklers – heard ping and then a boom.
 - Plexiglass blew in – pilot’s window cracked.
 - Plexiglass hit jumpers in the helmet.
 - Another jumper yelled “fire.”
 - Another jumper opened the door.
 - He yelled “go-go-go.”
 - He moved towards the pilot and looked at wing.
 - Observed a big “exit wound” in wing.
 - Metal was protruding out; jagged and bent towards pilot’s window.
 - About two ft from pilot’s window- by where the courtesy light is.
 - Fuel pouring out of hole and was on fire – going straight back to over the top of tail.
 - Pilot was side slipping plane trying to blow it out.
 - Pilot cut fuel from the left side.
 - Airplane started descending with pilot cutting power.
 - One jumper got out and he was in plane about another 12 seconds.
 - Told pilot to make CHD.
 - If not, told pilot to pick a spot.
 - We saw dark fields and the pilot adjusted that way.
 - He thought fire came up and he had to go.
 - This started about 4,200 feet agl.
 - He exited about 2,800 feet agl.
 - Opened chute and watched the plane.
 - Pilot kept flying – saw flames in cockpit coming from back window.
 - Flames on wing and cockpit.
 - Nothing on sparkler box.
 - Plane stayed on heading and descended.
 - 1,000-1,200 ft agl – pilot got out.
 - Plane turned left and did two rotations and went straight down.
 - From my angle, was aiming for dirt field but landed just short of a dirt field.
 - All four jumpers made it to the landing area without incident.
 - Once on the ground, we all and the ground crew knew about burning airplane crashing.
 - Law enforcement asked them if they all got out and about the pilot.
 - The pilot called a few minutes later to say he was down on the ground and was burnt.
 - Gathered all our ground equipment.
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- The airplane’s fuel load was about 20 pounds a side.
 - Airplane burns about 14 gallons/hour.
 - Pilot does weight and balance on iPad, which was destroyed in the fire.
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- Sparkler box installed with 3 nuts on the bolts.
 - Installed box for night shows and then removed it.
 - Installed fountain box that night.
 - No field approval yet.
 - The FAA was unaware.
 - Working on approval but were doing the test flights for it.

- The intent was to get a 337 for it.
- This was the second flight for this box.
- Previously, usually would use a jumper's right leg hanging out the door, with a sparkler attached.
- Also had a smaller box attached to the same area as the current box.
- Worked fine on one flight but wanted a bigger box for two fountains/sparklers.
- I think we called in NOTAM but on previous night flights, they told us not required because you're in class B airspace. Don't recall if they said this on the accident flight.

Follow up questions:

- Fuel was pouring out of about a 6-inch hole.
- Most of the fire was the fuel coming out of the hole, but the fuel running along the skin of the aircraft was on fire.
- Hole looked close to the size of an inspection plate cover.
- It was jagged and bent down and out.
- Piece was white.
- Bent towards pilot's window.
- Behind that piece of metal was where the fuel was pouring out.
- Bing sound "sounded like a marble being throw against a car door."
- Time from ping sound to the boom was about 2 seconds from left side.
- Pilot's side window blew out.
- Plexiglass struck him in the helmet.
- No issues activating switch box.
- Airplane control was good prior to him exiting.
- He thinks gas tank blew up.
- Nobody got go-pros cameras on.
- Get blue light to let you know camera is ready to go, but must press record, exiting.
- No jumpers recorded their jump that night.
- They weren't thinking about turning on cameras but getting out of aircraft.
- Jumpers did set off their individual sparklers (for visibility of other jumpers).
- Once pilot exited, airplane nosed over.
- Female jumper located on left side of aircraft knew there was an explosion since she sustained a percussion injury to her ear.
- She is ok now.
- Pilot was wearing a different type of parachute.
- Refueled airplane a week prior.
- Flew a jump flight since the refueling.
- Fly less than an hour for most shows.
- Pilot said about twenty gallons a side before flight.
- Fountain/Sparkler Box was attached by 3 lockable nuts.
- Step has a rubber mount for pilot's step.
- The rubber mount on the step, we use the same holes to for it.

- Box fits perfectly on foot rest.
- The sparklers set on cradle in box.
- The wire runs on the inside of the landing gear.
- Inspection plate had hole in it and ran the wire through it.
- No drilling was necessary.
- Looks like a metal shoe box.
- This was a test flight to see if it whistled, made a noise or caused drag-nothing.
- Sparklers do not stick out, about ½ inch inside from back of box.
- Nothing can get to the sparklers (wind, fuel, nothing can get to it) because their enclosed in there.

- Company is trying to stay active in flying.
- As a contingency for them buying aircraft, they had the left fuel tank bladder replaced because it was leaking.
- We just found out by researching that other C-182s have had wing fuel tank bladder leaks, fires, and problems.

- Other jumpers did not see anything different.
- One didn't see a thing, another saw fire and jumped.

- No other concerns or comments.



RECORD OF CONVERSATION

Albert P. Nixon
Aviation Accident Investigator
Western Pacific Region

Date: October 25, 2016
Person Contacted: Paula Talbott (Airplane Co-Owner/Ground Crew)
NTSB Accident Number: WPR16FA183

Narrative:

During a conversation with Paula Talbott, the following is a summary of what she stated:

- She was the co-owner of P & T Aerial Services.
- She was performing as ground crew for the jump on the accident night.
- Jump was ten minutes early.
- Called airplane and cleared them for jump run.
- Saw airplane sparklers went off just fine.
- Then airplane was a ball of red/orange.
- Knew it was not part of show.
- Continued to follow red/orange glow that was airplane.
- Ran towards where the airplane was going.
- Made it to the crash site before emergency crews did.
- Ground crew is supposed to look in vicinity of where equipment goes.
- I knew it was on fire and ran toward it.
- Initially, thought everyone on board was onboard.
- Was in front of the house that airplane impacted.
- Time frame of when sparklers activated and then something happened same as Thomas.
- No issues with airplane since fuel bladder replaced.
- Well maintained airplane.
- No other concerns.



RECORD OF CONVERSATION

Albert P. Nixon
Aviation Accident Investigator
Western Pacific Region

Date: Dec 6, 2016
Person Contacted: Ryan Kilgore (Pilot)
NTSB Accident Number: WPR16FA183

Narrative:

During a conversation with Ryan Kilgore, the following is a summary of what he stated:

- He has been a pilot for 11 years.
- Commercial Pilot in October 2015, and Instrument and Multi-engine ratings in May of 2016.
- He was not qualified as a jumper but had a total of 8 jumps.
- His total time was about 875 hours and about 350-400 in the Cessna 182.

- He said the accident airplane was an older model whose trim setting was different.
- He mentioned no system or major maintenance problems with the airplane.
- He has flown mostly day flights with the company and the accident flight was his second night flight flown with them.
- Night flying had less traffic and smoother air.
- Usually would take up 3 to 4 jumpers on the flights.
- The night flight was basically the same with the exception of LED lights on the jumpers, the jumpers had sparklers on their legs, and the airplane had sparklers.

- 1 hours before the flight, he would check on jumpers, Sky Harbor Tracon, and the winds.
- P & T Aerial Corp would coordinate for the NOTAM.
- When discussing the event with Sky Harbor Tracon, they would ask where jumping, altitude, times, and would acknowledge NOTAM if they were in receipt of it.

- He was not able to give a gross weight for takeoff but mentioned that he would try to provide it later.
- Fuel was about 50 gallons for takeoff.
- His weight was about 215 lbs. with the parachute included.

- The accident flight was the first flight of the day for him.
- He checked the security of the pyro box attached to the left step, by trying to move it.
- He does not recall the security of the top of the box.
- He mentioned that the box was not painted and silver aluminum in color.
- The box was previously mounted by the owner and used for night flights.

- The flight took off at 1904, and he had to adjust the airplane's interior lights during climbout.
- He climbed to a cruise altitude of 5,000 feet mean sea level (msl).
- Set up in a race track with right turns.
- He had the airplane on station and ready to go.
- He called Sky Harbor Tracon to update them.
- At 1920, he turned right to align for the drop.
- The airplane was straight and level and about at 80 knots (probably 15 seconds from jump).
- Usually the airplane pyro/sparklers are set off about 15-20 seconds from the jump.
- Call received that they would good to jump.
- He was visually checking drop zone by looking off to the right.
- Just as he was opening the door, he heard a loud bang, like an explosion, to the left and behind him.
- He was looking right but turned toward the bang and noticed flames through the back window.
- He noticed a hole in the left wing about 2 feet left from him with fuel pouring out.
 - The hole had jagged edges about ½ inch downward.
- He could not recall the condition of the pyro box.
- He said he noticed the flames starting at the tail of the airplane and making its way forward to the hole in the left wing.
- He told everyone to get out.
- He called Sky Harbor tracon.
- He initially tried to turn back toward Chandler Municipal Airport.
- He shut the fuel off to that side and maneuvered the airplane in a slip trying to put out the fire.
- He looked back at the wing and the fire was getting worse.
- He believed the back window was blown out.
- The flames were hitting the left window and then spreading in all directions.
- The airplane was losing altitude.
- He determined he would not make the airport and the fire would not go out, so he took off his seat belt and used the right door to egress.
- He pulled the ripcord once clear of the airplane.
- He did not see the airplane again, once he cleared it.
- He was worried about where the airplane would go.
- He mentioned near the end the plane was not flyable; he burnt his hand trying to fly it.
- He could not make the jump zone the other jumpers were scheduled to land in.
- He performed a PLF, in the backyard of a home.
- Someone jumped the fence and assisted him, and the homeowner did as well.
- The first responders arrived and transported him to the burn unit.
- There was no fire extinguisher aboard the airplane.
- He described the fuel spraying out of the left wing; flowing aft and ending up about 1 to 2 feet behind the rear of the pyro/sparkler box.
- He said there was no mechanical issues with the airplane prior to the bang/explosion.



RECORD OF CONVERSATION

Albert P. Nixon
Senior Aviation Accident Investigator
Western Pacific Region

Date: March 13, 2019
Person Contacted: Peteris Berzins (Witness and Photographer)
NTSB Accident Number: WPR16FA183

Narrative:

During a conversation with Peteris Berzins, the following is a summary of what he stated:

- He was taking pictures at an outdoor soccer game a few miles away.
- He heard an explosion in the sky.
- He turned his camera towards the “boom” noise and took pictures.
- He initially thought it might be a radio-controlled model airplane.
- After enlarging the pictures, he realized what he had captured.