

23/10/2013

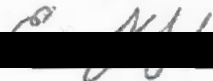
On January 22th of 2013 I arrived at EpicBlue at 5:00 PM and the instructor invited me to go to the class room for some initial instructions . He gave me some instructions about pattern works like speeds on down wind , base and final, This was my introductory flight on Cirrus and as far as I know , I was his first Cirrus transitions student . I've never flown Cirrus before . We left the class room, walking to the airplane then I asked the instructor if doesn't call the "Flightbreff" before the flight. He said " not really, I checked on the computer " So I asked him if he wouldn't mind if I call and check the weather and everything else,like some NOTAMS and reports in our route. He did the weight & balance on his computer but one thing I couldn't understand at that point is , how he did this without looking in the airplane to check for the right amount of fuel he had onboard . By the way , this night was chilly . I was wearing a jacket with hood , gloves , ear protector and long boots , feeling very comfortable for this weather . Also I offered a pair of gloves that I had extra in my car which he declined , After that , the interior checkout where he lowered the flaps ,tested all lights and other things , we went out for exterior preflight, fuel , (we looked in the tank and i saw one finger below tabs . As he showed me He said " we're ok ") fuselage , flight controls, oil, tires, props, belts , flight surface , antennas and all. Before starting the engine he showed me how to set up the amount of fuel into MFD. The instructor put the amount based on what he visually saw on board. Also ,I heard his boss talking to him saying if he need fuel... just call Reliant. Taking-off runway 26, left turn approved i wished to pick up a flight following he said "we don't need " . I always take flight following no matter what , while we're flying he gave some more instruction about the aircraft systems like auto pilot,how to lean the engine based on MFD engine page. The instructor landed the airplane, the KGON tower approved an 180 degree on runway and told us clear for take-off left turn approved. The GPS was set Direct to Danbury Airport right after taking-off then the fuel warning light located on the left side of the PFD appeared , the instructor saw but looked like it didn't meant anything to him , this is base on informations that I've got after the fact that the fuel warning is based on GPS . If I saw fuel warning lights on on ground I would never let him take-off anyway. We flew on left tank to Groton and right tank to Danbury. At Groton when he switched tanks it was showing 5/8 of a tank on Right and below 1/8 on left. This time I asked him to please pick-up flight following , we did. The airplane was set on autopilot at 4500 feet west bound . Again after take-off he showed me the leaning procedure and we kept flying . A Couple minutes later while we were trying to listen to the ATIS of Danbury Airport , Around 20NM East the flight following was canceled then at 17.5 miles East of KDXR I saw the fuel gauges and it was bouncing at half tank (R) , I told him that looks weird and kind of unreliable to me . Based on this circumstance I said " if you want we can land at any airport nearby", could be Oxford or New Haven . Not much I could to say under this circumstance, He said " no , we're fine , based on MFD we have almost one hour of fuel after arrive KDXR " .I

said "ok , but i don't mind if do go , I have all night long ". I wish i knew more about Cirrus at that time . I'm sure , things like that wouldn't happen . In all my cross country flights and local flights also I never got into this situation before in my life. Not even on ground with my airplanes and I never will , fuel is priority . Continuing into the flight , Already contacted with KDXR TWR (wind aloft at 3000 feet MSL 280@23kts) 4500 down to 1700 feet MSL 6 Miles east of Danbury Airport the engine started getting rough and quickly stopped, we lost few hundred of feet : The instructor began the emergency restart procedure ,everything happened very fast ;the airplane started and we climbed 500 feet. After that 4 Miles from Danbury Airport the engine stopped completely ,The instructor said " Danbury tower we're declaring emergency , run out of fuel , i'll pull the parachute " the Tower asked how many souls on board and that was it . I can't remember the exact altitude we were at when the parachute was deployed , but I believe was no more than 1200 MSL and the speed was precise at 65 Knots , I said " we will stall " The airplane glided to the ground , lucky didn't crash into any houses , people or power lines , we walked away from the airplane as fast as we could with no injuries , The impact on the ground wasn't even hard enough to arm the air bags . This is everything I remember from the event happened on 01/22/2013 at 7:51PM local time in Danbury , CT involved Cirrus SR20 N140PG.

KDXR to KGON = 25 minutes

KGON to KDXR = 34 minutes (- 4)

Graciously ; Ernani H. Izidorio 03/10/2013


[Redacted signature]

Inspector Statement concerning the accident involving N140PG

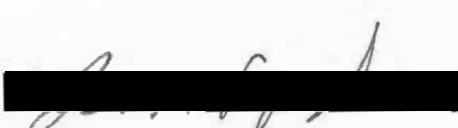
The following is my statement based on the interview with Mr. Ernani Izidorio that took place on January 23, 2013. He was the pilot receiving instruction and was seated the left seat throughout the flight.

Mr. Izidorio stated that he wanted to receive instruction in a cirrus aircraft because he had never flown that type of aircraft before. He was located in the left seat and the flight instructor was in the right seat. He followed the instructor through the interior and exterior pre-flight while using a checklist. Mr. Izidorio stated that the flight instructor did open the fuel caps and shined a flashlight in the tank. He stated that he observed the fuel level at the tabs and also stated three samples were taken to check for contamination. No contamination was present. During the interior pre-flight he observed the fuel gages to be a one-half on the left tank and right tank.

The flight departed Danbury Municipal Airport (DXR) and proceeded to Groton-New London Airport (GON). The flight landed at GON, taxied back on the runway, and departed direct to DXR. The left tank was used on the leg to GON and the right tank was used on the return trip to DXR. The mixture was leaned during cruise and Mr. Izidorio observed on the Multi-Function Display (MFD) that the fuel flow was nine gallons per hour.

During the return trip he stated that approximately 17.5 miles out from DXR the right tank fuel gage indicated one-half and the left tank fuel gage indicated one-eighth inch above empty. The MFD showed 1 hour of flight remaining. Approximately 6 miles out from DXR the engine started running rough and then stopped running. The flight instructor took over the controls and was able to get the engine started. However, at 4 miles out from DXR the engine stopped running again and no restart was attempted. Mr. Izidorio stated that the flight instructor notified DXR Air Traffic Control tower that they may have to use the ballistic parachute.

The following is a follow up statement from Mr. Ernani Izidorio that took place on March 05, 2013. He remembers being shown the fuel totalizer on the MFD, because he had never seen one before. He stated that the flight instructor did change the fuel amount that was there from the previous flight. However, he did not remember if the flight instructor adjusted the gallon amount higher or lower.


Inspector James Sapoznik
EA-FSDO-63

FROM THE DESK OF
NICK RINGROSE

March 7, 2013
James Sapoznik
Aviation Safety Inspector
Federal Aviation Administration
[REDACTED]
[REDACTED]
[REDACTED]

Dear James,

Per our recent phone conversation on 03/05/13, you will find my recollection of events leading up to the incident on January 22nd involving Jordan Greene and the Cirrus Sr20 registered N140PG.

I am the President and founder of Epic Blue Co, and I have been a CFI/CFII for five years, with 2,500 hours of dual-given instructional time.

January 20th

I conducted a short training/rental checkout flight in N140PG (DXR-POU-DXR) for a returning client of mine [REDACTED] on the afternoon of Sunday, January 20th. I was standing by the aircraft (N140PG) with the client as the "Reliant" fuel truck pulled up. Prior to fueling, the fuel was just under "Tabs" on one wing (tank) and just over "Tabs" on the other wing. Both of these are therefore *unknown* amounts. A known amount is either "Tabs" or "Full".

The requested amount (to the fueling man) was "Tabs" plus eight per side. In order to calibrate this properly, by turning an unknown amount into a known amount, the only way to do this is to fill the lower tank to "Tabs" (a known point), add 8 Gallons, then carefully (and with several visual inspections and ensuring the aircraft is on level ground) add enough fuel to the other tank so that the tanks are absolutely level on both sides. "Tabs" is 13 gallons in each tank, so "Tabs plus 8" is an amount of 21 Gallons on each side, for a Total of 42 Gallons.

Upon starting up the aircraft we set the onboard fuel totalizer (a function of the MFD Flight Management System computer) to a (now) known amount of 42 Gallons. I then input a two gallon safety reduction* which is fairly standard (showing the totalizer we now had 40 gallons) and conducted a flight that was 0.7 tach (engine hours) and 1.1 Hobbs hours.

January 21st

The next day I conducted another training flight in N140PG (the next and penultimate flight for this aircraft), without adding additional fuel, with a client (Paul McGhee) and we flew a "cross country" (straight line both ways) to MVY (Martha's Vineyard). I don't re-

FROM THE DESK OF
NICK RINGROSE

call the exact amount the fuel totalizer said on it as we conducted the preflight inspection, but I remember it was around the "low to mid thirties" gallons range. I (at that time) determined this was plenty enough fuel to fly direct to MVY, land, and return (to DXR) with more than the required 30 minute VFR fuel reserve. DXR to MVY is about 40 minutes (in cruise), and the return journey is about 46 minutes (in cruise). The Cirrus Sr20 averages about 9-10 Gallons per hour (leaned) in cruise. Records indicate this flight was 2 "Tach" engine hours, and 3.1 on the Hobbs meter. Effectively, the 1.1 hours on the Hobbs meter that doesn't align with the Tach is no surprise, as very often in a lesson a considerable amount of time is spent sitting on the ground with the engine on, burning very little fuel at 1000 RPMs or less.

As we were passing OXC on our return journey, we could see that the weather was beginning to close in on DXR, so I consulted with my student as we discussed whether to ask for a "Special VFR" or a popup "IFR" clearance to get back to Danbury, unsure as to how long the diminishing conditions would remain VFR. By the time we elected to request a special VFR clearance we were just outside the eastern edge of DXR's class D airspace, lined up for a straight-in approach to runway 26, about 7 miles from landing. So we checked the fuel totalizer, and we both remember it stating "16 Gallons remaining", and beginning to indicate in yellow (an early-warning color coding used by Cirrus on the Avidyne system, not to be confused with the low fuel annunciator light, which was not illuminated). We were granted the "Special VFR" clearance we sought, and within a few minutes we safely landed and were on the ground at DXR. Upon taxiing to the tie-down spot at Epic Blue, I do not remember checking the fuel totalizer again, but it would have either still said 16 gallons remaining or it could possibly have rolled over to say 15 gallons remaining. It might even have been 14 gallons. It didn't matter. We were on the ground and done for the day.

January 22nd

The next day Jordan Greene embarked on the flight that ended up in the loss of the aircraft N140PG. He dispatched (from the Epic Blue office) the aircraft, stating on the Weight & Balance Sheet which was filed as part of the dispatch process, that there were 26 gallons of fuel on board (see attached Exhibit 1). Immediately after the accident, upon consultation with Jordan, he furthered, "There was slightly under tabs on one side, and a bit more than that (under the tabs) on the other side" when referring to the amount of fuel present at the time of his preflight visual inspection. As I have already noted; **fuel levels at anything other than full or tabs reflect an unknown value-** essentially guess work. He therefore could not know the exact amount of fuel on board. He also stated that he "reset the fuel totalizer to say tabs, then subtracted a couple of gallons to create a safety* window." This would mean that the fuel totalizer now stated there were 24 gallons on board (2 gallons less than tabs accounting for the "safety"), and so he embarked on the flight which was planned to be DXR-GON-DXR. He told me that he switched fuel tanks in GON, then turned around and flew back to DXR, losing the engine a couple of minutes before landing. His final declarations (to me) were that the low fuel annunciator light went off (illuminated) a minute or so before losing the engine (after having passed OXC), and that the fuel totalizer stated there were 40 minutes of fuel remaining at that time of the engine loss. I understand the regulation night-time VFR fuel reserve to be 45 minutes, not 40, so he was under-fueled anyway according to his management of the 'erroneous' totalizer. Lastly, I understand (from the P.O.H. for that aircraft) that the low fuel annunciator is supposed to illuminate when there are less than 8.5 gallons in a tank; not one minute before total power loss.

NICK RINGROSE

**often pilots will set the fuel totalizer to a known amount and then subtract two to three gallons thereby building a safety net where there will be more fuel in the tanks than it states.*

Conclusion

From Jordan's statements (immediately after the accident and more discussions with him the next day) I am left to conclude that:

1. He falsified the weight and balance document (Exhibit A) by declaring there were 26 gallons on board when he visually saw less than tabs on both sides.
2. He was able to 'determine' an amount of fuel despite knowing that if the tanks reveal anything other than tabs or full it is an unknown amount (unless matching/cross referencing to a known amount on one side and the aircraft is sitting on level ground).
3. He ignored the factual evidence of the fuel totalizer when starting-up the airplane, resetting it from the 15 or 16 gallons it would have stated, to his 'invented' amount of 24 gallons. From this point on, any minutes-remaining (available flight time) or gallons-remaining would be erroneous.
4. His testimony that the fuel annunciator illuminated about a minute before losing the engine (near to OXC airport) is not consistent with the P.O.H. which states the annunciator will come on when there is less than 8.5 gallons in each tank.

Sincerely yours,


Nick Ringrose

President, Epic Blue Co.