



RECORD OF CONVERSATION

Clinton R. Crookshanks
Aerospace Engineer (Structures)
Aviation Engineering Division

Date: August 18, 2021 1000 PDT
Person Contacted: Richard Perrine, CrossPoint Testing and Inspection Services, LLC
NTSB Accident Number: WPR21FA266

Present on the call: Clint Crookshanks – NTSB
John Nelson – USFS
Josh Martin – USFS
Richard Petty – Falcon Aviation Services
Bruce Brown – Falcon Executive Aviation
Johnny Smith – Textron Aviation
Tara Shawn – FAA

Narrative:

Mr. Perrine stated that he first started at Canyon State Inspection in 2007 and worked his way up to being a Level II NDT inspector in all methods. He worked at Canyon State for about 10 years and became office manager after about 5-7 years. He left in early 2017 to join CrossPoint Testing to help them become a Part 145 repair station for NDT. CrossPoint received their repair station license in 2018-2019. He is certified at CrossPoint as a Level II inspector in magnetic particle, dye penetrant, ultrasonic, and eddy current. He attended the Beech SIRM training course at Flight Safety Foundation and received his certificate in August 2019. He estimated he has performed the SIRM inspections on an average of 5 King Airs per year and has looked at many airplanes of this make model over his career. He stated he performed inspections for Hawker Beechcraft when employed at Canyon State.

He stated that the inspections on the E90 airplanes is more detailed on the lower main spar caps than the later airplanes. He does not have any difficulties with the inspections, instructions and has found indications on other airplanes. He could remember at least 2 other airplanes with cracks in the bathtub fittings. The biggest issue he sees is the presence of tooling marks or scoring in the areas inspected.

For the accident airplane he recalled finding an indication at the inboard lower spar cap at BL 29 that was documented. He stated that the indication was obvious. They tried a first oversize that did not remove the crack. He returned later after the hole was oversized even more and verified that the indication was gone. He did not recall having any other indications on the accident airplane.

His typical work flow involved bringing his equipment to the shop and letting the calibration standard acclimate before beginning. The probe would be calibrated to the standard. He would examine each hole visually for cleanliness and anomalies before performing the eddy current inspection. If he finds an indication, he re-calibrates the probe and re-inspects the location. This may be done several times to ensure the indication is valid. He marks the probe with a pen when examining stacked structure to make sure he knows where the probe is depth wise. He does sometimes get indications from tooling marks. He stated he is very comfortable with inspecting stacked structure. After inspecting each location, he marks the location with a red grease pencil. When finished he and the mechanic assigned would go over all the locations to ensure they covered each required location.

The equipment used is a Nortec 600 by Olympus with an Olympus MiniMite automatic rotating probe. The calibration standard is a NRK-3AL Custom Navy Block. His equipment is calibrated yearly. The King Air SIRM inspection typically takes 8-10 hours. He has been inspecting the Falcon King Airs for many years starting at Canyon State. He could not recall inspecting the accident airplane previously but believes he probably had. He stated that the SIRM and AD can be confusing at times but didn't have any specific suggestions for change.