



NATIONAL TRANSPORTATION SAFETY BOARD
Central Region
Denver, Colorado

Investigator's Statement

CEN20LA020

Mobile, Alabama – Continental Aerospace Technologies
February 17 & 18, 2021

Examination Observers:

Jennifer Rodi – NTSB – Denver, Colorado

Philip Grice – Continental Aerospace Technologies – Mobile, Alabama

During the examination the following observations were made:

- Engine was removed from the shipping crate and placed on an examination stand inside of the analytical department
- The NTSB investigator was briefed periodically throughout the day and provided the opportunity to review the engine on the stand and the components as removed via video through a FaceTime connection
- The upper bank of spark plugs were removed from the engine - #1 and #5 spark plug exhibited damage to the electrode, the #5 spark plug exhibited aluminum on the electrode
- The oil sump contained metal debris consistent with bearing material
- The #5 piston head exhibited cleaning and damage consistent with detonation
- The #1 piston head exhibited cleaning and damage consistent with the start or initial phase of detonation
- Both the #5 and #6 rods exhibited play consistent with bearing liberation
- The fuel manifold and fuel injection nozzles were placed on a production flow bench – the fuel manifold and fuel injection nozzles flowed at production specifications
- The magneto timing on the engine measured at 27 – the timing should have been set to 24
- Mr. Grice reports that with this timing and a rich mixture detonation would likely result