

NATIONAL TRANSPORTATION SAFETY BOARD

Vehicle Recorder Division
Washington, D.C. 20594

June 2, 2020

Personal Electronic Devices

Specialist's Factual Report By Gerald Kawamoto

1. EVENT SUMMARY

Location: Lafayette, LA
Date: December 28, 2019
Aircraft: Piper PA-31T
Registration: N42CV
Operator: Private
NTSB Number: CEN20MA044

On December 28, 2019, about 0921 central standard time, a Piper PA-31T airplane, N42CV, impacted terrain shortly after takeoff from the Lafayette Regional Airport/Paul Fournet Field (LFT), Lafayette, Louisiana. The commercial pilot and four passengers were fatally injured; one passenger sustained serious injuries. Two individuals inside a nearby building sustained minor injuries and one individual in a car sustained serious injuries. The airplane was destroyed by impact forces and a postimpact fire. The airplane was owned by Cheyenne Partners LLC and was piloted by an employee of Global Data Systems. The personal flight was conducted under the provisions of Title 14 *Code of Federal Regulations* Part 91. Instrument meteorological conditions prevailed and a Federal Aviation Administration (FAA) instrument flight rules (IFR) flight plan was filed for the flight. The flight was originating at the time of the accident and was en route to the Dekalb-Peachtree Airport (PDK), Atlanta, Georgia.

2. GROUP

A personal electronic device group was not convened.

3. DETAILS OF INVESTIGATION

The National Transportation Safety Board (NTSB) Vehicle Recorder Division received the following personal electronic devices (PEDs):

Device Manufacturer/Model:	iPhone XS
Serial Number:	357202098359699
Device Manufacturer/Model:	iPhone 6
Serial Number:	352022076956075

3.1. Device Description

PEDs are a category of devices comprised primarily of portable computing devices and mobile phones. Portable computing devices are typically capable of taking photos and videos, internet access, email, messaging services, and can run user-installed applications to perform specific tasks. PED user and system data is typically stored on non-volatile memory¹ and can be accessed through manufacturer-provided interfaces.

3.2. Data Recovery

Upon arrival at the Vehicle Recorder Laboratory, external examinations revealed the devices had sustained impact damage, as shown in Figures 1 and 2, rendering them inoperable. The logic boards were removed and tested in surrogate devices. The iPhone XS turned on normally and was passcode protected. Potential passcodes obtained were unable to unlock the device. The Investigator-In-Charge (IIC) determined that further data recovery for this device would not be pursued. The iPhone 6 was unable to power on normally using surrogate parts and additional attempts at yielding data were unsuccessful, thus no data were recovered.



Figure 1. Front and back of the iPhone XS as received.



Figure 2. Front and back of the iPhone 6 as received.

¹ Non-volatile memory is semiconductor memory that does not require external power for data retention.