NATIONAL TRANSPORTATION SAFETY BOARD

Vehicle Recorder Division Washington, D.C. 20594

January 23, 2017

Personal Electronic Device

Specialist's Factual Report By Bill Tuccio, Ph.D.

1. EVENT SUMMARY

Location: Wikieup, Arizona
Date: June 23, 2016
Aircraft: Robinson R66

Registration: N117TW

Operator: Guidance Aviation NTSB Number: WPR16FA130

2. GROUP

A group was not convened.

3. DETAILS OF INVESTIGATION

The National Transportation Safety Board (NTSB) Vehicle Recorder Division received the following device:

Device Manufacturer/Model: Apple iPad Mini Serial Number: F7RLWQBNF196

3.1. Device Description

The Apple iPad Mini is a tablet computer with a high-resolution color touch-screen interface. All iPad devices support WiFi and Bluetooth connectivity, and use varying amounts of non-volatile memory¹ for storage (depending on model). Some devices also support data connectivity via existing cell-phone networks. The iPad Mini includes front and back cameras. The iPad implements its functionality by running programs called "Apps" capable of supporting web-browsing, email, audio/video playback, contact and calendar management, and numerous other specialized functions. User-installed Apps can be used to support functionality for electronic flight bags, flight planning and filing, aviation weather depiction, and electronic flight charts. Application data is stored in non-volatile memory and may include image, video, and position location information. Specialized application data may be stored in a proprietary file structure using numerous

¹ Non-volatile memory is memory that does not require battery power to retain information.

proprietary file formats. The amount and type of data stored varies based on the software version and configuration of the specific device.

3.2. Device Condition

Upon arrival at the Vehicle Recorder Laboratory, an examination revealed the unit had not sustained any damage and started normally.

3.3. Data Description

This device is capable of storing data in the non-volatile memory. There is an optional security feature that requires a user-password to unlock the device and access functions and stored data.

Power was applied to the device and it was evident that the user-password security feature was enabled. According to the Investigator-in-charge, the password was not obtainable so the device's functions and any stored data were not accessible. It is unknown whether there were any stored data pertinent to the event. No further attempts were made to access the data.