## **ACCIDENT**

Aircraft Type and Registration: Falcon 8 Trinity Asctec, (UAS) BAS-02

No & Type of Engines: 8 x electrical motors

Year of Manufacture: 2016

**Date & Time (UTC):** 17 April 2017 at 11:55 hrs

**Location:** North Sea

Type of Flight: Commercial

**Persons on Board:** Crew - None Passengers - None

Injuries: Crew - N/A Passengers - N/A

Nature of Damage: Submerged in sea water

Commander's Licence: CAA UAS Permission

Commander's Age: 27 years

**Commander's Flying Experience:** 202 hours (of which 200 were on type)

Last 90 days - 7 hours Last 28 days - 7 hours

Information Source: Aircraft Accident Report Form submitted by the

pilot

The Unmanned Air System (UAS) was operating from a ship in the North Sea to carry out inspection work. After takeoff, when the Unmanned Air Vehicle (UAV) was approximately 20 m away from the ship and at a height of approximately 20 m, the pilot successfully carried out hover checks, in accordance with the operator's standard operating procedures. He then switched the UAS into GPS mode and the UAV held position, indicating to the pilot the system was functioning correctly. He started flying the UAV onto task, but when it was about 30 m from the ship, the UAV appeared to enter its emergency 'Come Home High' mode, indicating a loss of link. The pilot attempted to regain control by switching first to height mode and then to manual mode, but the UAV remained uncontrollable and descended into the sea.

The UAV floated for a few seconds before sinking, although the operator was able to recover it back to the ship.

The UAS was returned to the manufacturer to try to establish the cause of the lost link. Tests on the software, UAV and ground station were unable to identify any faults.

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