

Safety Recommendation 2015-006

It is recommended that the European Aviation Safety Agency review the requirement for the placarding of aircraft fitted with a Ballistic Parachute Recovery System so that the warning placards contain information on the location of the rocket launcher and the actuating device, and can be read from a safe distance regardless of the stationary attitude of the aircraft.

Date Safety Recommendation made:

14 May 2015

LATEST RESPONSE

Response received:

8 July 2015

Ballistic Parachute Recovery Systems (BPRS) for EASA certified aircraft are regulated in the Certification Specifications for Light Sport Aeroplanes, CS-LSA, which refers to the ASTM F2316-12 international standard in its Subpart K.

The same reference standard can be applied to other small aeroplanes category certified by EASA through a Special Condition.

This ASTM standard requires providing three different types of placard or label ("danger", "identifying" and "warning" placards) in order to alert rescue or other personnel at the scene of an accident or incident. The minimum sizes of the labels and the colours to be used are addressed by this standard. These minimum sizes and colours are considered adequate to provide an alerting function when a personnel is approaching the aircraft at a reasonable distance. It includes the indication of the egress point of the rocket launcher.

The intent of this standard is that the placards should provide enough information to the rescue personnel to identify the presence of the equipment and find the contact information to seek advice from the manufacturer of the ballistic device. When installed according to such standard, the placards will quickly provide the needed information in most of the accident scenarios.

AAIB Assessment – Partially Adequate - Closed

RESPONSE HISTORY

N/A

Safety Recommendation 2015-007

It is recommended that the European Aviation Safety Agency introduce the requirement that the rocket-launcher in an aircraft Ballistic Parachute Recovery System is fitted in a position where it can be readily disarmed following an accident.

Date Safety Recommendation made:

14 May 2015

LATEST RESPONSE

Response received:

8 July 2015

The design and the installation of a Ballistic Parachute Recovery System (BPRS) should comply with at least the following requirements: recovering of the airframe and its occupants at a survivable rate of descent; its activation system shall ensure a reliable deployment of the parachute, but it shall also mitigate inadvertent deployment; protection of the aircraft and its occupants against the associated inherent hazards (e.g. fire hazard).

Requiring that the installation of the rocket-launcher is such that it can be 'readily' disarmed in all possible after-crash scenarios, and with occupants on-board, could create design constraints that are not compatible with the functional requirements mentioned above.

In practice, rocket-launchers are installed so that they can be easily disarmed following the instructions of the BPRS manufacturer after most of the accidents, in particular the survivable ones.

AAIB Assessment – Not Adequate - Closed

RESPONSE HISTORY

N/A

**CZAW SportCruiser,
G-EWZZ**

**Kingarth,
Isle of Bute**

9 August 2014

Accident

Safety Recommendation 2015-008

It is recommended that the European Aviation Safety Agency disseminate information for first responders and accident investigators to allow them to identify if an aircraft is equipped with a Ballistic Parachute Recovery System. This information system should include details on the actions required to make the system safe.

Date Safety Recommendation made:

14 May 2015

LATEST RESPONSE

Response received:

13 July 2015

A Ballistic Parachute Recovery System (BPRS) can be installed as part of the initial Type Certification, but it can also be installed (or removed) via a Supplemental Type Certificate (STC).

BPRS certified by EASA are regulated in the Certification Specifications for Light Sport Aeroplanes, CS-LSA, which refers to the ASTM F2316-12 international standard in its Subpart K. The same reference standard can be applied to other small aeroplanes category certified by EASA through a Special Condition.

The intent of the ASTM F2316-12 standard is that the placards installed on the aeroplane should provide information to the rescue personnel to identify the presence of the BPRS and find the contact information to seek advice from the manufacturer of the ballistic device.

AAIB Assessment – Not Adequate - Closed

RESPONSE HISTORY

N/A

**CZAW SportCruiser,
G-EWZZ**

**Kingarth,
Isle of Bute**

9 August 2014

Accident

Safety Recommendation 2015-009

It is recommended that the Civil Aviation Authority review the requirement for the placarding of aircraft referred to in Regulation (EC) 216/2008 Annex II, fitted with a Ballistic Parachute Recovery System, so that the warning placards contain information on the location of the rocket launcher and the actuating device, and can be read from a safe distance regardless of the stationary attitude of the aircraft.

Date Safety Recommendation made:

14 May 2015

LATEST RESPONSE

Response received:

31 July 2015

The CAA accepts this recommendation, and undertakes to review requirements regarding placarding relative to location of BRS and actuating device fitted. However, it should be noted that current UK requirements are broadly harmonised with those applied by FAA to Cirrus (via Special Condition) and EASA (Proposed Special Condition for CS-VLA), and in the current climate of proportionality, the CAA would seek to align with the requirements of the latter where possible. This action is planned to be completed by January 2016.

AAIB Assessment – Partially Adequate - Open

RESPONSE HISTORY

N/A

**CZAW SportCruiser,
G-EWZZ**

**Kingarth,
Isle of Bute**

9 August 2014

Accident

Safety Recommendation 2015-010

It is recommended that the Civil Aviation Authority introduce the requirement that, for aircraft referred to in Regulation (EC) 216/2008 Annex II, the rocket-launcher in an aircraft Ballistic Parachute Recovery System is fitted in a position where it can be readily disarmed following an accident.

Date Safety Recommendation made:

14 May 2015

LATEST RESPONSE

Response received:

31 July 2015

The CAA accepts this recommendation, and will compile some Administrative & Guidance Material to BCAR Section S (Sub-Section K), relating to location and ease of disarming of such systems. This action is planned to be completed by January 2016.

AAIB Assessment – Partially Adequate - Open

RESPONSE HISTORY

N/A

Safety Recommendation 2015-011

It is recommended that the Civil Aviation Authority introduce an information system, for aircraft operating in the UK that allows first responders and accident investigators to identify if an aircraft is equipped with a Ballistic Parachute Recovery System. This information system should include details of the type of system fitted, the location of the major components, routing of the actuator cable and the actions required to make the system safe.

Date Safety Recommendation made:

14 May 2015

LATEST RESPONSE

Response received:

31 July 2015

The CAA accepts this recommendation and will undertake a review to determine the practicality of expanding G-INFO so that owners may add details appropriate to modifications to their specific aircraft. It should be noted that the CAA are not necessarily made aware of the embodiment of such modifications on an individual aircraft so could not guarantee its veracity, however in this way we may encourage owners to provide appropriate up to date information to potentially aid in their own rescue. This action is planned to be completed by September 2015.

AAIB Assessment – Partially Adequate - Open

RESPONSE HISTORY

N/A

**CZAW SportCruiser,
G-EWZZ**

**Kingarth,
Isle of Bute**

9 August 2014

Accident

Safety Recommendation 2015-012

It is recommended that the Civil Aviation Authority takes action to ensure that information on the risks from Ballistic Parachute Recovery Systems is disseminated to the emergency services operating in the United Kingdom.

Date Safety Recommendation made:

14 May 2015

LATEST RESPONSE

Response received:

31 July 2015

The CAA accepts this recommendation. When and if action in response to recommendation 2015-011 is in place, it will undertake to issue an Information Notice to promote awareness. This action is planned to be completed by March 2016.

AAIB Assessment – Partially Adequate - Open

RESPONSE HISTORY

N/A