CRASH RESISTANT FUEL SYSTEM
H125 / H130, the worldwide reference

over 5,200 in-service Aircraft

over 34,500,000 performed flight hours

1,970 operators worldwide

Safety by design
Simple to operate
Ready for any mission, highly versatile
The most Competitive

Figures from fleet distribution end 2019
CRASH RESISTANT FUEL SYSTEM
Enhanced Safety

Requirement:
FAA or EASA certification
FAR/CS 27.952

Including a 50-feet drop test

- Airbus Helicopters continuously maintain its efforts to improve its solutions and allow customers to perform their missions in the safest condition

- The current CRFS solutions covers all H125/H130 configurations

- Airbus Helicopters proposes a Crash Resistant Fuel System on the light single aircraft for the H125/H130 and as a retrofit for the H125/H130 in-service-fleet
CRASH RESISTANT FUEL SYSTEM
CRFS – Airbus solution

A complete new certified\(^{(1)}\) crash resistant fuel tank

with a rubber bladder fitted inside an aluminium fairing

compliant FAR/CS 27.952 specification \(^{(1)}\)

“Reduce the risk of post-crash fires”

“Improve occupant survivability in an accident”

FAA SAIB SW-17-23: Installation of a Crash Resistant Fuel System compliant with FAR §27.952 is not required to correct an unsafe condition, but such installation will reduce the risk of post-crash fires and improve occupant survivability in an accident”

\(^{(1)}\) EC130 B4: Not compliant to §27.952 with underbelly installation, but still airworthy. It offers safety features and prevents the risk of post-crash fires.
CRASH RESISTANT FUEL SYSTEM
Designed for Safety

A modern technology for the fuel tank

with crash resistant rubber bladder fuel cell

fitted inside an aluminium fairing

Fuel cell fitted inside aluminium fairing

Rubber Bladder Fuel Cell

Aluminium Fairing
CRASH RESISTANT FUEL SYSTEM
A new fuel system design

A complete redesign of the fuel system

offering additional new features and benefits:

- Independent low fuel level sensor
- Easy accessible equipped fuel plate for maintenance

Double skin fuel lines

New vent system roll-over protection

New vent system flame arrestor

A full equipped fuel plate

- New fuel pump
- Crash-resistant recessed sump drain valve
- New capacitive gauge fuel transmitter
CRASH RESISTANT FUEL SYSTEM
Minimized operational constraints

- No change in maintenance requirements
- Equal amount of usable fuel

+17 kg / +37 lb (1)
CRFS new fuel tank

(1) estimated average weight depending on Aircraft configuration.
CRASH RESISTANT FUEL SYSTEM
Easy to install

Retrofit installation could be performed by the customer (Part 145) or within the Airbus Helicopters network

Simple CRFS kit with pre-assembled fuel tank
Small tool box with specific drill-bit for new cradle installation

Downtime 2 weeks, some 110/140 hours worktime

No additional downtime if performed within the frame of a T inspection (600FH // 2Y)
CRASH RESISTANT FUEL SYSTEM
What are the retrofit solutions?

A suitable solution for H125 / H130

### H125 Family

<table>
<thead>
<tr>
<th>Model</th>
<th>Provider</th>
<th>STC</th>
</tr>
</thead>
<tbody>
<tr>
<td>AS350 B, B1, D, BA, B2</td>
<td>N.A.</td>
<td>STC SR02492AK</td>
</tr>
<tr>
<td>AS350 B3(2)</td>
<td>SB Master(1)</td>
<td>STC SR02492AK</td>
</tr>
<tr>
<td>AS350 B3e(2)</td>
<td>SB Master(1)</td>
<td>STC SR02492AK</td>
</tr>
</tbody>
</table>

### H130 Family

<table>
<thead>
<tr>
<th>Model</th>
<th>Provider</th>
<th>STC</th>
</tr>
</thead>
<tbody>
<tr>
<td>EC130 B4</td>
<td>SB Master(1)</td>
<td>STC SR02492AK</td>
</tr>
<tr>
<td>EC130 T2</td>
<td>SB Master(1)</td>
<td>STC SR02492AK</td>
</tr>
</tbody>
</table>

**Two providers:**

**AIRBUS**

**StandardAero**

---

(1): SB provided at aircraft serial number after ordering
(2): Modification 07.20034 upgrade kit available for AS350 B3/B3e already equipped with CRFS for full conformity to FAR/CS 27.952 for swing operations (see SB Master chart)
# CRASH RESISTANT FUEL SYSTEM

## Retrofit certifications

### EASA / FAA compliance

<table>
<thead>
<tr>
<th></th>
<th>AS350 B, B1, D, BA, B2</th>
<th>AS350 B3</th>
<th>AS350 B3e</th>
</tr>
</thead>
<tbody>
<tr>
<td>H125 Family</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>EASA 27.952</td>
<td>EASA 27.952</td>
<td>EASA 27.952</td>
<td></td>
</tr>
<tr>
<td>FAA 27.952</td>
<td>FAA 27.952</td>
<td>FAA 27.952</td>
<td></td>
</tr>
<tr>
<td>N.A.</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>EC130 B4</th>
<th>EC130 T2</th>
</tr>
</thead>
<tbody>
<tr>
<td>H130 Family</td>
<td></td>
<td></td>
</tr>
<tr>
<td>EASA 27.952</td>
<td>EASA 27.952</td>
<td>EASA 27.952</td>
</tr>
<tr>
<td>FAA 27.952</td>
<td>FAA 27.952</td>
<td>FAA 27.952</td>
</tr>
<tr>
<td>N.A.</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

(1) EC130 B4: Not compliant to §27.952 with underbelly installation, but still airworthy. It offers safety features and prevents the risk of post-crash fires.

This document is the property of Airbus Helicopters; no part of it (including its content) shall be reproduced or transmitted without the express prior written authorization of Airbus Helicopters. © Airbus Helicopters – All rights reserved. The facts and figures contained in this document are disclosed for information purposes only. Airbus Helicopters reserves the right to make configuration and data changes at any time without notice. This document does not constitute any offer or contract with Airbus Helicopters.
CRASH RESISTANT FUEL SYSTEM
Standard Aero CRFS kit

AS350 B, B1, D, BA and B2 aircraft

How to order?

⇒ To register the Pre-Ordering form on the website and a Sales Manager will contact back the customer: Standard Aero information sheet & Pre-Ordering form

⇒ To contact Langley facility by mail for additional information: mailto:sales.hsna@standadaero.com or Tel +1 604.514.0388

⇒ To find a local StandardAero representative contact for direct information

Airbus Helicopters will participate to any Standard Aero retrofit with a voucher of 20 k€ / 25 kUSD (1) for Pilot/Technician training sessions on Ecureuil/Astar family through part of its training network.

(1) Economical conditions 2021

This document is the property of Airbus Helicopters; no part of it (including its content) shall be reproduced or transmitted without the express prior written authorization of Airbus Helicopters. © Airbus Helicopters – All rights reserved. The facts and figures contained in this document are disclosed for information purposes only. Airbus Helicopters reserves the right to make configuration and data changes at any time without notice. This document does not constitute any offer or contract with Airbus Helicopters.
CRASH RESISTANT FUEL SYSTEM

Airbus Helicopters kit content

**MAIN KITS**

- Rupture Resistant Fuel Tank with the bladder, fuel pump, probe and associated hoses provided as an assembly

**ADAPTATION KIT**

- A set of reinforced sheet metal cradles
- Some loose wires to connect the fuel pump and the probe to the existing electrical system
- Some small sheet metal parts to adapt the airframe
Important to you. Essential to us

Thank you for your attention

For more information, please contact your Sales Manager or contact us at marketing-services.helicopters@airbus.com