

---

---

**SERVICE BULLETIN**

**N° 189-315**

**ALERT**

**DATE:** October 20, 2022

**REV. :** /

---

---

**TITLE**

**ATA 25 - EMERGENCY LIFE-RAFT SYSTEM, ACTUATION CABLE INSTALLATION**

**REVISION LOG**

New Issue

---

An appropriate entry should be made in the aircraft log book upon accomplishment.  
If ownership of aircraft has changed, please, forward to new owner.

---

## **1. PLANNING INFORMATION**

### **A. EFFECTIVITY**

#### Part I

All AW189 helicopters from S/N 49007 to S/N 49079 (S/N's 49024, 49036, 49040 and 49041 excluded), from S/N 89001 to S/N 89012 (S/N's 89005 and 89006 excluded) and from S/N 92001 to S/N 92010 equipped with life raft assemblies LH/RH P/N 8G2560V00131 and P/N 8G2560V00231.

#### Part II

All AW189 helicopters from S/N 49007 to S/N 49079 (S/N's 49024, 49036, 49040 and 49041 excluded), from S/N 89001 to S/N 89012 (S/N's 89005 and 89006 excluded) and from S/N 92001 to S/N 92010 equipped with life raft assemblies LH/RH P/N 8G2560V00131 and P/N 8G2560V00231:

only if required after compliance with Part I of this SB.

### **B. COMPLIANCE**

#### Part I

Within 50 flight hours or 3 months whichever occurs first after the issue of this Service Bulletin.

#### Part II

For helicopters which didn't pass any of the inspections of Part I on one side only, within 120 days starting from compliance with Part I of this SB. For helicopters which didn't pass any of the inspections of Part I on both sides, before next intended flight over water.

### **C. CONCURRENT REQUIREMENTS**

N.A.

### **D. REASON**

This Service Bulletin is issued in order to provide the necessary instruction on how to check the actuation cable installation on the AW189 life rafts.

### **E. DESCRIPTION**

After a case of an uncommand deployment of the ELS on an AW189 helicopter, Leonardo identified a possible problem on the installation of the actuation cables on the life raft.

As corrective action, Part I of this SB gives instruction to inspect for condition the actuation cable installations of the LH and RH life rafts.

In case of findings on the cables or the pulley covers, the affected parts must be replaced. A further check of the inflation cylinder in the life raft assemblies will be required. In case of findings after this check, the affected life raft must be replaced with a serviceable one. If a new life raft is not immediately available, the affected one should be disabled and the helicopter can return to the normal operations.

Part II of this SB gives the instructions to replace the life rafts which didn't pass any of the inspections of Part I of this SB.

## F. APPROVAL

The technical content of this Service Bulletin is approved under the authority of DOA nr. EASA.21.J.005. For helicopters registered under other Aviation Authorities, before applying the Service Bulletin, applicable Aviation Authority approval must be checked within Leonardo Helicopters customer portal.

EASA states mandatory compliance with inspections, modifications or technical directives and related time of compliance by means of relevant Airworthiness Directives. If an aircraft listed in the effectivity embodies a modification or repair not LHD certified and affecting the content of this Service Bulletin, it is responsibility of the Owner/Operator to obtain a formal approval by Aviation Authority having jurisdiction on the aircraft, for any adaptation necessary before incorporation of the present Service Bulletin.

## G. MANPOWER

To comply with this Service Bulletin the following MMH are deemed necessary:

Part I: approximately four (4) MMH

Part II: approximately four (4) MMH

MMH are based on hands-on time and can change with personnel and facilities available.

## H. WEIGHT AND BALANCE

N.A.

## I. REFERENCES

### 1) PUBLICATIONS

<u>DATA MODULE</u>	<u>DESCRIPTION</u>	<u>PART</u>
DM01 89-A-00-20-00-00A-120A-A	Helicopter on ground for a safe maintenance.	I, II

<u>DATA MODULE</u>	<u>DESCRIPTION</u>	<u>PART</u>
DM02 89-A-25-63-03-00A-520A-A	Left life raft container - Remove procedure	I, II
DM03 89-A-25-63-03-00A-720A-A	Left life raft container - Install procedure	I, II
DM04 89-A-25-63-07-00A-520A-A	Right life raft container - Remove procedure	I, II
DM05 89-A-25-63-07-00A-720A-A	Right life raft container - Install procedure	I, II
DM06 89-A-25-63-00-01A-320A-A	Life raft installation kit - Life raft control cables - Operation test	I
DM07 89-A-25-63-04-00A-520A-A	Left life raft control cable - Remove procedure	I
DM08 89-A-25-63-04-00A-720A-A	Left life raft control cable - Install procedure	I
DM09 89-A-25-63-04-00B-520A-A	Left life raft control cable - Remove procedure	I
DM10 89-A-25-63-04-00B-720A-A	Left life raft control cable - Install procedure	I
DM11 89-A-25-63-08-00A-520A-A	Right life raft control cable - Remove procedure	I
DM12 89-A-25-63-08-00A-720A-A	Right life raft control cable - Install procedure	I
DM13 89-A-25-63-08-00B-520A-A	Right life raft control cable - Remove procedure	I
DM14 89-A-25-63-08-00B-720A-A	Right life raft control cable - Install procedure	I

- Aerosekur Life raft CMM 25-61-513
- MAF AW189 Master Minimum Equipment List (MMEL) n°189G0250Q003

## 2) ACRONYMS

AMDI	Aircraft Material Data Information
AMP	Aircraft Maintenance Publication
DM	Data Module
DOA	Design Organization Approval
EASA	European Aviation Safety Agency
ELS	Emergency Life-Raft Systems
LHD	Leonardo Helicopters
MMH	Maintenance Man Hours
MMEL	Master Minimum Equipment List
P/N	Part Number
S/N	Serial Number

**3) ANNEX**

N.A.

**J. PUBLICATIONS AFFECTED**

N.A.

**K. SOFTWARE ACCOMPLISHMENT SUMMARY**

N.A.

## 2. MATERIAL INFORMATION

### A. REQUIRED MATERIALS

#### 1) PARTS

##### PART I

#	P/N	ALTERNATIVE P/N	DESCRIPTION	Q.TY	LVL	NOTE	LOG P/N
1	8G2560V00432		Cable assy release life raft	AR	.	(1)(2)	-
2	8G2560V00532	8G2560V00531	Cable assy release life raft	AR	.	(1)(3)	-
3	309806A		Pulley cover	AR		(1)	
4	N/A	N/A	Placard	AR		(4)(5)	

##### PART II

#	P/N	ALTERNATIVE P/N	DESCRIPTION	Q.TY	LVL	NOTE	LOG P/N
4	8G2560V00131		Life raft assy LH	AR	.	(4)	-
5	8G2560V00231		Life raft assy RH	AR	.	(4)	-

#### 2) CONSUMABLES

Refer also to AMDI for the consumable materials required to comply with the AMP DM referenced in the accomplishment instructions.

#### 3) LOGISTIC MATRIX

N.A.

#### NOTE

- (1) Item to be ordered only if required by the accomplishment instructions.
- (2) Item applicable only to Standard Cabin helicopters S/N 49xxx.
- (3) Item applicable only to Extended Range helicopters S/N 890xx or S/N 920xx.
- (4) Required quantity of these items depending on inspection results after compliance with Part I of this SB.
- (5) Item to be locally manufactured.

### B. SPECIAL TOOLS

N.A.

### C. INDUSTRY SUPPORT INFORMATION

Owners/Operators who comply with the instructions of this Service Bulletin no later than the applicable date in the "Compliance" section will be eligible to receive required materials on free of charge basis, except for Consumable Materials and Special Tools. Customers who fail to comply with the instructions in this Service Bulletin before the compliance date, are not eligible for the aforementioned special policy.

NOTE: WRM will include RETURN MATERIAL AUTHORIZATION (RMA) number; the unit disembarked from the aircraft (Life Raft assy P/N 8G2560V00131 or P/N 8G2560V00231) has to be returned to LHD within thirty (30) calendar days after the shipment of the replacement part.

In case of missing return within thirty (30) calendar days, Customer will be invoiced for the price of the replacement part (Life Raft assy P/N 8G2560V00131 or P/N 8G2560V00231).

Please Issue relevant MMIR form to your Warranty Administration Dpt., Including Inspection Report Form complete of notes and pictures, after the inspection required on "PART I", claims without the aforementioned report will be rejected.

### **3. ACCOMPLISHMENT INSTRUCTIONS**

#### **GENERAL NOTES**

- a) Place an identification tag on all components that are re-usable, including the attaching hardware that has been removed to gain access to the modification area and adequately protect them until their later re-use.

#### **PART I**

1. In accordance with AMP DM 89-A-00-20-00-00A-120A-A, prepare the helicopter on ground for a safe maintenance. Disconnect the battery, all electrical power sources and/or the external power supply.
2. In accordance with AMP DM's 89-A-25-63-01-00A-520A-A / 89-A-25-63-02-00A-520A-A and 89-A-25-63-05-00A-520A-A / 89-A-25-63-06-00A-520A-A, remove the LH and RH upper and lower fairings to get access to the LH /RH (respectively) life raft container.
3. In accordance with the applicable steps of AMP DM 89-A-25-63-03-00A-520A-A or DM 89-A-25-63-07-00A-520A-A, remove the cover from each LH and RH life raft and lock each bellcrank with the safety pin. Then perform the following inspections on each LH and RH life raft installation:
  - 3.1 In accordance with the applicable steps of AMP DM 89-A-25-63-00-01A-320A-A, visually examine the section of the control cable that comes out from the sheath for any damage (e.g. wear or bird caging). In case the control cable (P/N 8G2560V00432 for helicopters S/N 49xxx; P/N 8G2560V00531 or 8G2560V00532 for helicopters S/N 89xxx or S/N 92xxx) has been found damaged, take pictures of the damages, fill the inspection report in Figure 5 and go to step 3.2. Otherwise go to step 3.4.

#### **NOTE**

In case step 3.2 has to be performed, during this activity also perform step 3.4.1 below.

- 3.2 Replace the damaged control cable in accordance with the following procedures.
  - 89-A-25-63-04-00A-520A-A and 89-A-25-63-04-00A-720A-A for the LH life raft control cable installed on helicopters S/N 49xxx.
  - 89-A-25-63-08-00A-520A-A and 89-A-25-63-08-00A-720A-A for the RH life raft control cable installed on helicopters S/N 49xxx.



- 89-A-25-63-04-00B-520A-A and 89-A-25-63-04-00B-720A-A for the LH life raft control cable installed on helicopters S/N 89xxx or S/N 92xxx.
- 89-A-25-63-08-00B-520A-A and 89-A-25-63-08-00B-720A-A for the RH life raft control cable installed on helicopters S/N 89xxx or S/N 92xxx.

### **CAUTION**

The following Step 3.3 shall be performed by trained operators or by authorized service stations only.

If this condition cannot be satisfied, do not perform Step 3.3 and apply Part II of this SB in accordance with the required compliance time reported in Section 1.B.

### **NOTE**

In case Part II of this SB is going to be applied, then go to step 5.

- 3.3 Perform the life raft check in accordance with the following procedure:
- 3.3.1 In accordance with the DM 89-A-25-63-03-00A-520A-A or DM 89-A-25-63-07-00A-520A-A, remove the life raft container from the helicopter.
  - 3.3.2 In accordance with Section “Disassembly” of life raft CMM 25-61-513, and with reference to Figure 3, get access to the cylinder inflation valve. Remove the break-away pin and check it for condition (no sign of damage, cracks or missing parts).
  - 3.3.3 In case the break-away pin is damaged install the safety pin in its place. Take a picture of the damaged parts and fill the Inspection Report in Figure 5. Then either perform Part II of this Service Bulletin to immediately replace the life raft, or go to step 3.3.6.  
In case the break-away pin is in good condition proceed with step below.

### **CAUTION**

Pay attention not to pull the activation cable, this would activate life-raft inflation / gas deployment.

- 3.3.4 Install the safety pin and then gently push the activation cable inside the valve. Make sure that the trigger ball end on the inflation valve does not move.
- 3.3.5 In case the condition reported in Step 3.3.4 is not verified, fill the Inspection report in Figure 5. Then perform Part II of this Service Bulletin to immediately replace the life raft, or go to next step 3.3.6. Otherwise go to Step 3.3.7.

- 3.3.6 If Part II is not intended to be performed immediately, close the life raft in accordance with Section “Assembly” of life raft CMM 25-61-513, re-install it on the helicopter in accordance with AMP DM 89-A-25-63-03-00A-720A-A or DM 89-A-25-63-07-00A-720A-A, put a locally manufactured placard as defined in Figure 4 in clear view of the Pilots and obey to the instructions of the AW189 MMEL (LHD doc. 189G0250Q003). Then go to Step 4.
- 3.3.7 In accordance with Section “Assembly” of life raft CMM 25-61-513, and with reference to Figure 3, remove the safety pin and re-install the break-away pin.
- 3.3.8 In accordance with Section “Assembly” of life raft CMM 25-61-513, reassemble the life raft container.
- 3.3.9 In accordance with DM 89-A-25-63-03-00A-720A-A or DM 89-A-25-63-07-00A-720A-A, re-install the life raft container on the helicopter.

**NOTE**

[Skip steps 3.4 and 3.5 if step 3.2 has been performed.](#)

- 3.4 In accordance with AMP DM 89-A-25-63-03-00A-520A-A or DM 89-A-25-63-07-00A-520A-A and with reference to Figures 1 and 2, perform a visual inspection of the area:
  - 3.4.1 Inspect the pulley cover for condition. No damage / wear to pulley cover is permitted. In case it's not possible to properly inspect the whole cover, its removal is required (in this case, steps 3.4.2 and 3.4.3 have to be skipped). In case of any damages, take pictures of the pulley cover and fill the Inspection report in Figure 5. Then replace the pulley cover P/N 309806A with a new one.
  - 3.4.2 Make sure that the pulley cover is correctly installed. Check if the P/N stamped on the pulley cover is in the position shown in Figure 1.
  - 3.4.3 Make sure that the control cable is correctly installed as showed in Figures 1 and 2. The control cables must go into the pulley cover through the smallest opening and come out through the largest one.

### NOTE

The following procedure is applicable only to the installation of control cable to the life raft container. It is not necessary to completely remove the control cable from the helicopters.

- 3.5 In case one of the inspections at Step 3.4 didn't pass, remove and carefully re-install the control cable to the life raft container in accordance with the applicable steps of the following procedures:
- 89-A-25-63-03-00A-520A-A and 89-A-25-63-03-00A-720A-A for the LH life rafts.
  - 89-A-25-63-07-00A-520A-A and 89-A-25-63-07-00A-720A-A for the RH life rafts.
4. Record compliance with this Service Bulletin on the log card of the life raft.
  5. Remove all the tools and other items from the work area.
  6. Return the helicopter to flight configuration and record for compliance with Part I of this Service Bulletin on the helicopter logbook.
  7. Send the attached compliance form to the following mail box:

[engineering.support.lhd@leonardo.com](mailto:engineering.support.lhd@leonardo.com)

As an alternative, gain access to My Communications section on Leonardo WebPortal and compile the "Service Bulletin Application Communication".

## **PART II**

1. In accordance with AMP DM 89-A-00-20-00-00A-120A-A, prepare the helicopter on ground for a safe maintenance. Disconnect the battery, all electrical power sources and/or the external power supply.

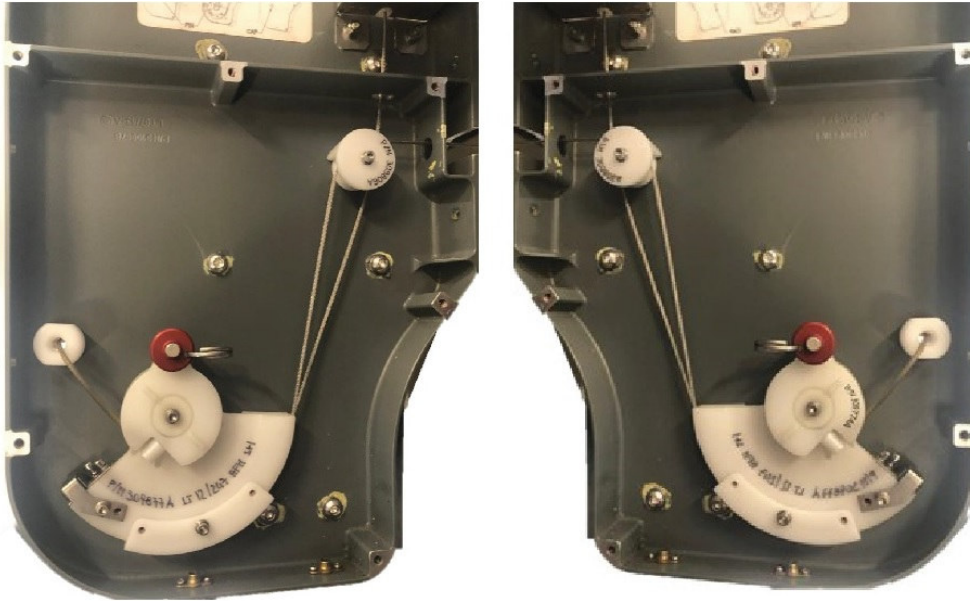
### **NOTE**

During step 2, remove the placards installed during step 3.3.6 of Part I of this Service Bulletin, if present.

2. In accordance with the applicable steps of AMP DM 89-A-25-63-03-00A-520A-A or DM 89-A-25-63-07-00A-520A-A, remove the affected life raft containers from the helicopter. Return the affected life raft container to LHD for further investigation.
3. In accordance with AMP DM 89-A-25-63-03-00A-720A-A or DM 89-A-25-63-07-00A-720A-A, install a serviceable (i.e. new or overhauled or which has passed the checks of Part I) life raft on the helicopter.
4. Remove all the tools and other items from the work area.
5. Return the helicopter to flight configuration and record for compliance with Part II of this Service Bulletin on the helicopter logbook.
6. Send the attached compliance form to the following mail box:

[engineering.support.lhd@leonardo.com](mailto:engineering.support.lhd@leonardo.com)

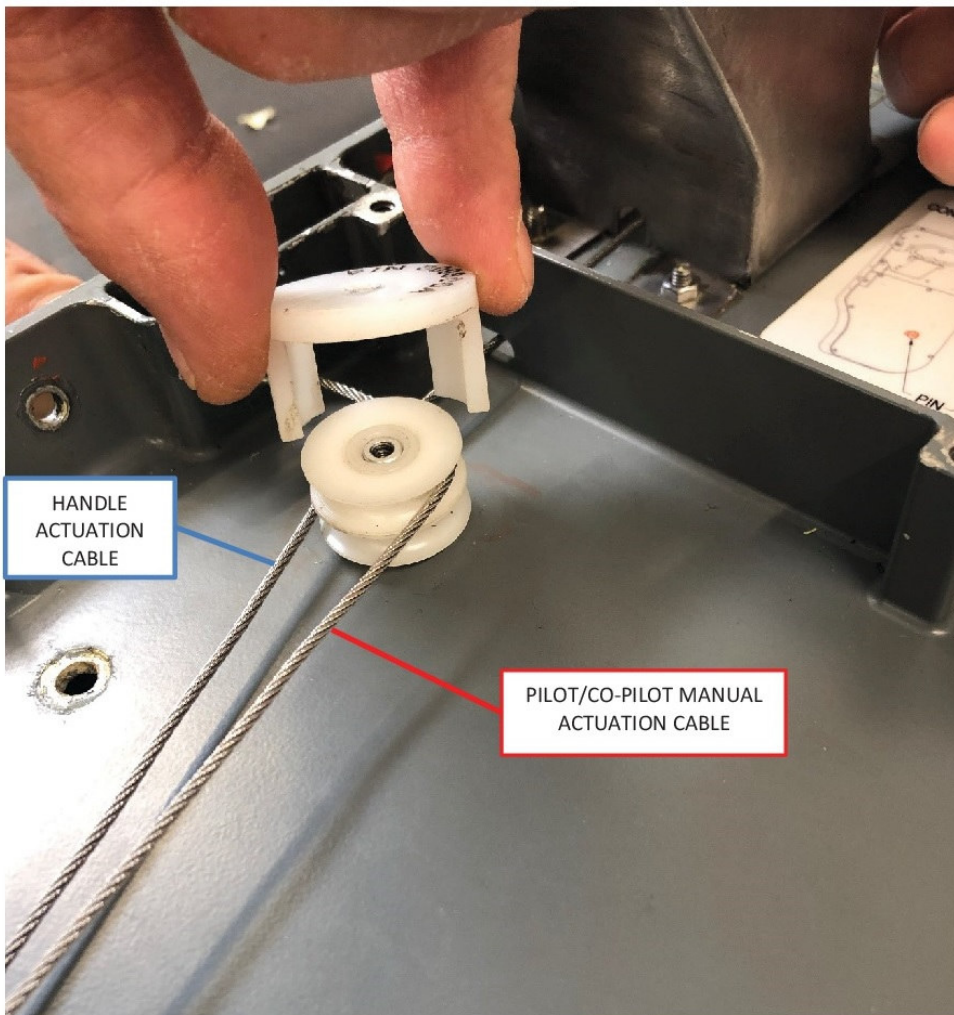
As an alternative, gain access to My Communications section on Leonardo WebPortal and compile the "Service Bulletin Application Communication".



Control cable on RH ELS

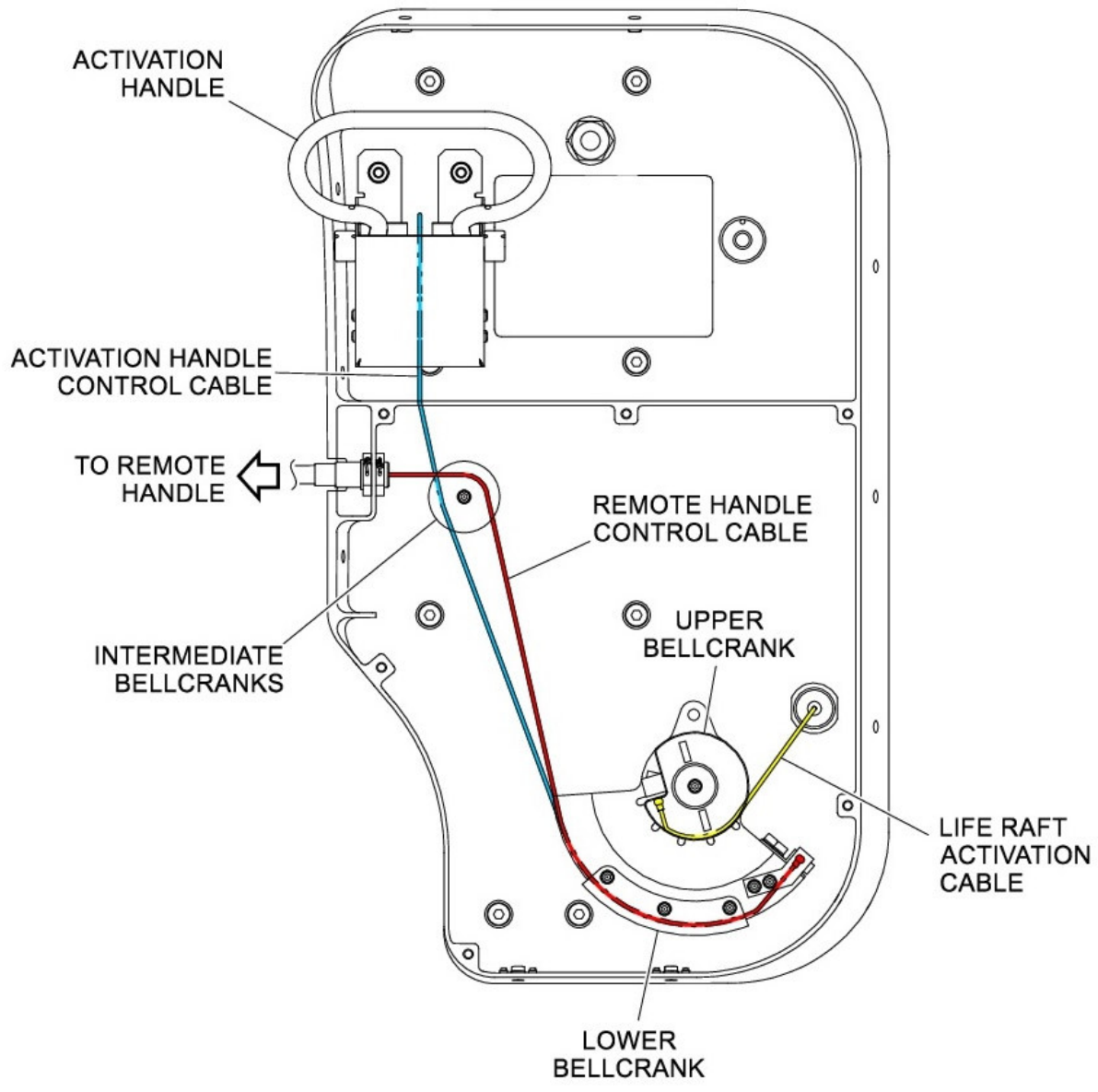
Control cable on LH ELS

FOR REFERENCE ONLY



Pulley cover installation

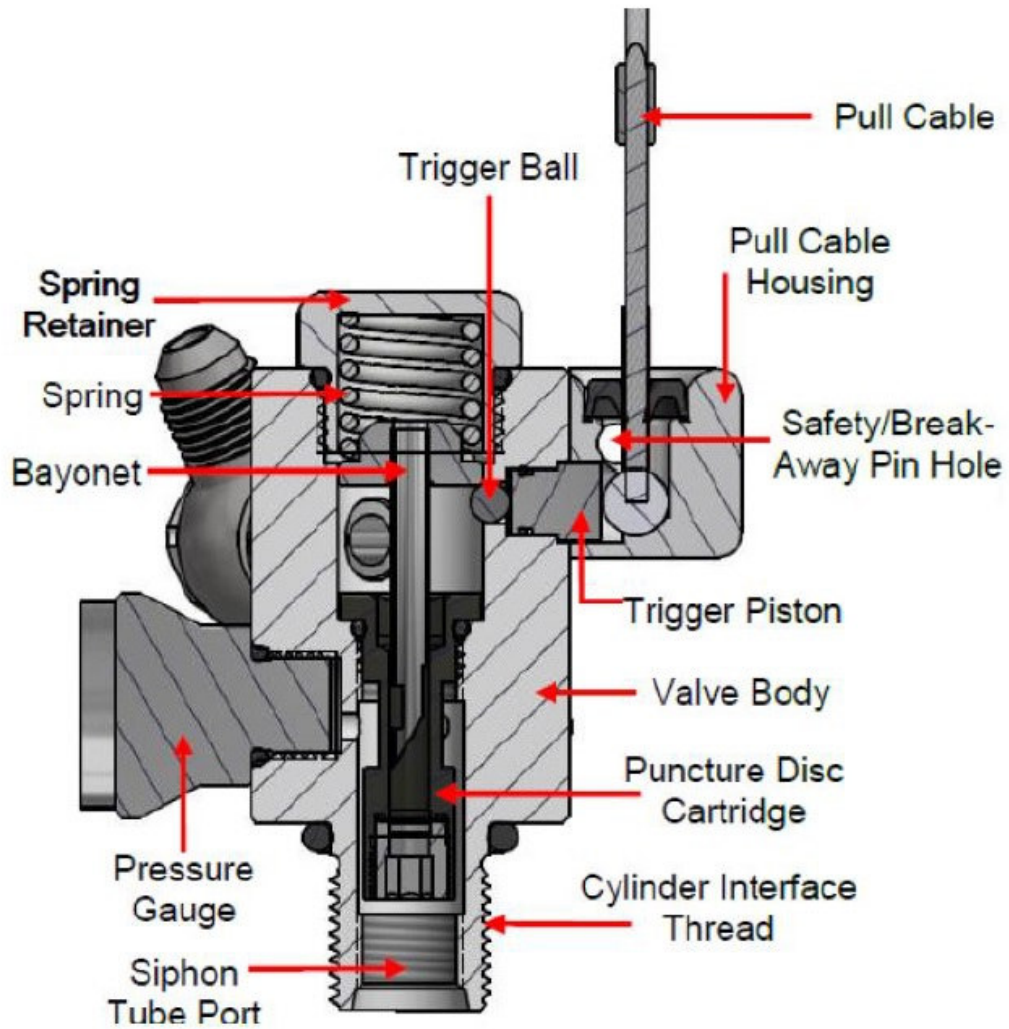
**Figure 1**



CONTROL CABLE PATHS

**Figure 2**

S.B. N°189-315 ALERT ALERT  
DATE: October 20, 2022  
REVISION: /



CYLINDER INFLATION VALVE

Figure 3

**LIFE-RAFT INOPERATIVE ON LH SIDE**

**LIFE-RAFT INOPERATIVE ON RH SIDE**

**LIFE-RAFT INOPERATIVE ON BOTH SIDES**

Placard (for reference only) – use the most appropriate option

**Figure 4**

S.B. N°189-315 ALERT ALERT  
DATE: October 20, 2022  
REVISION: /



## SB 189-315 – Inspection Report

<b>Date</b>		
<b>Helicopter S/N</b>	S/N	FH
<b>Life raft LH</b>	P/N	S/N
	8G2560V00131	
<b>Life raft RH</b>	P/N	S/N
	8G2560V00231	

PROCEDURE STEP FAILED		DESCRIPTION OF FINDINGS
Part I Step 3.1 Control cable P/N 8G2560V00432; Control cables P/N 8G2560V00531 or 8G2560V00532	<input type="checkbox"/>	
Part I Step 3.3.2 Break-away pin	<input type="checkbox"/>	
Parts I Step 3.3.5 Inflation valve	<input type="checkbox"/>	
Parts I Step 3.4.1 Pulley cover P/N 309806A	<input type="checkbox"/>	
<b>Notes:</b>		

**Figure 5**

Please send to the following address:  <b>LEONARDO S.p.A.</b> <b>CUSTOMER SUPPORT &amp; SERVICES - ITALY</b>  <b>PRODUCT SUPPORT ENGINEERING &amp; LICENSES DEPT.</b> Via Giovanni Agusta, 520 21017 Cascina Costa di Samarate (VA) - ITALY Tel.: +39 0331 225036 Fax: +39 0331 225988	<b>SERVICE BULLETIN COMPLIANCE FORM</b>	Date:		
		Number:		
		Revision:		
Customer Name and Address:		Telephone:		
		Fax:		
		B.T. Compliance Date:		
Helicopter Model	S/N	Total Number	Total Hours	T.S.O.
Remarks:				
<b>Information:</b>  We request your cooperation in filling this form, in order to keep out statistical data relevant to aircraft configuration up-to-date. The form should be filled in all its parts and sent to the above address or you can communicate the application also via Technical Bulletin Application Communication Section placed in Leonardo AW Customer Portal - MyCommunications Area. We thank you beforehand for the information given.				