Part No.: LSxxx

Description: Loud Speaker 300/600W External

Service Manual: ASM-LS Service Bulletin No.: ASM-LS-603-0002

ECO No.: ECO# 1130 Subject: Re-entrant tip securing inspection (Loctite® LRUs only)

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1 Planning Information

1.1 **Applicability**

1.1.1 This modification is only applicable to the serial numbers of the LS600-200 products listed in Table 1 that do not have Mod 2 applied. The procedure for Mod 2 is listed in Service Bulletin No.: ASM-LS-603-0001.

H/C	Loud speaker s/n	Installed as
210F (H155 Osaka FD)	090288 / 090289	Local modification
18RK (H135 NPA)	093240	STC
92CP (H135 NPA)	093239	STC
20PD (H135 NPA)	093241	STC
21DK (H135 NPA)	093499	STC
04MP (H225 NPA)	094149 / 094150	Local modification

Table 1: List of loud speakers at Mod 1 with applied Loctite®.

1.2 Reason

1.2.1 Field inspections noted loosening of an LS600 re-entrant tip after a flight. AEM advised to apply Loctite as a temporary solution only to the loud speakers listed in Table 1.

1.3 **Description**

1.3.1 This service bulletin details the procedure for performing a periodic inspection and Loctite® application.

1.4 Compliance

1.4.1 AEM recommends periodic inspection be accomplished every 250 flight hours. AEM orders the applicable units in Table 1 be replaced by January of 2025 by loud speakers with Mod 2 applied.

1.5 **Approval**

1.5.1 No change to existing approval.



1.6	Costing
1.6.1	This modification incorporates a customer request and design improvement which does not constitute changes to correct a malfunction. The modification is therefore not subject to warranty considerations.
1.6.2	Parts and Labour
1.6.2.1	Periodic inspection is estimated to take ten minutes every 250 flight hours.
1.6.2.2	Loctite® application is estimated to take thirty minutes.

1.7 Equipment Required

Part No.	Manufacturer	Description
WA-001	AEM	Wrench Adapter (Contact Anodyne Electronics product support to purchase)
5522A33*	McMaster-Carr	Drive Adapter, 3/8" Female x 1/2" Male Square
85555A413*	McMaster-Carr	Torque Wrench, 3/8" Square Drive, 50 - 250 in-lb
Loctite® 242	Loctite [®]	Medium strength threadlocker

^{* -} an approved equivalent may be substituted.

1.8	Weight and Balance	
1.8.1	Not affected.	
1.9	Electrical Load Data	
1.9.1	Not affected.	
1.10	References	
1.10.1	For Mod 2 information reference Service Bulletin No.: ASM-LS-603-0001	
1.11	Other Publications Affected	
1.11.1	LS-IOLS: ASM-LS Installation and Operations Manual	



2 Procedure Instructions

2.1 Inspection and Loctite Procedure

2.1.1 Securing Wrench Adapter

2.1.1.1 Place Wrench Adaptor (WA-001) onto the re-entrant tip. Ensure rubber fitting of Wrench Adaptor is concentric/parallel to re-entrant tip and tightly fit.

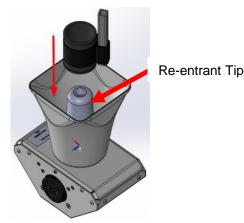


Figure 1: Seating Wrench Adapter

2.1.1.2 Ensure there is a tight fit. Wrap square tube counterclockwise. Ensure the Wrench Adaptor does not contact bell. Surface damage to the bell will occur if the Wrench Adaptor scrapes the bell during assembly.



Figure 2: Wrench Adapter Seated

2.1.2 <u>Periodic Inspection Procedure</u>

2.1.2.1 With WA-001 in place and a ½" drive torque wrench, apply a torque of 60 in-lb counterclockwise to attempt to remove the re-entrant tip, part number 150-61-001 of product LS600-200. If the tip remains in place, no rotation, nothing more is required. If the tip breaks loose and begins to rotate or the unit has not been secured with Loctite® 242 previously, then perform then steps in 2.1.3 Loctite® Application Procedure.



2.1.3	Loctite® Application Procedure
2.1.3.1	If the periodic inspection has failed or Loctite® 242 has not been previously applied, then all proceeding steps are applicable.
2.1.3.2	Using WA-001 and a $1/2$ " drive wrench, apply sufficient counterclockwise force to remove the re-entrant tip.
2.1.3.3	Clear any remaining Loctite® from the threads of the re-entrant tip and y-adaptor (82-05-001). Follow all Loctite® removal procedures.
2.1.3.4	Apply Loctite® 242 to the re-entrant tip threats following all Loctite® application procedures.
Note:	Loctite® 242 sets in ten minutes and cures in 24 hours.
2.1.3.5	Reinstall the re-entrant tip and apply a torque of 100 in-lb using the torque wrench.
2.1.4	Removing Wrench Adapter
2.1.4.1	Remove the WA-001 and repeat all applicable steps in section 2 Procedure Instructions for each re-entrant tip listed in table 1.



Figure 3: Re-entrant tip removal



2.2 Acceptance Test Procedure

2.2.1 Ensure the unit functionally works by performing an audible system test on the aircraft.

WARNING:

The system can produce high sound pressure levels. Proper personal protective equipment is required to prevent hearing damage. Stand clear, this equipment operates at an intense sound level. Personnel must be kept away from the direct loud speaker beam. Do not operate the equipment in a hangar or in confined areas.

2.3	Modification Status Marking
2.3.1	Not applicable.
3	Material Information
3.1	Not applicable.
4	Reference Documents
4.1	For Mod 2 information reference Service Bulletin No.: ASM-LS-603-0001
	End of Service Bulletin