MODEL AFFECTED: **412/412EP**

SUBJECT: **TAIL ROTOR BLADE P/N 212-010-750-009 THROUGH –129, INSPECTION AND REWORK OF.**

HELICOPTERS AFFECTED: **Model 412/412EP Helicopters with Tail Rotor Blades P/N 212-010-750-009 through –129 with Serial Number A or AFS-12700 through A or AFS-14479.**

The following tail rotor blade S/N with prefix A or AFS will have the intent of this bulletin accomplished prior to delivery.

12807	14039 to 14043	14285
13351	14115 to 14116	14289 to 14290
13545	14125	14295
13571	14159	14297
13617	14162	14302 to 14303
13676	14167	14307 to 14317
13726 to 13729	14169	14319 to 14323
13730	14190	14325 to 14326
13780 to 13789	14193	14328
13794	14199	14332 to 14333
13805 to 13881	14204	14335 to 14344
13889 to 13893	14213 to 14217	14346
13912 to 13928	14219	14348 to 14358
13931 to 13935	14221 to 14225	14364 to 14366
13973	14228	14369 to 14370
13987	14230	14387 to 14388
13989	14234	14392
13990	14236 to 14238	14395 to 14429
13994	14246	14431 to 14432
13996	14248 to 14252	14434 to 14435
13998	14255 to 14257	14440 to 14471
14003	14259 to 14270	14473
14007 to 14009	14273 to 14275	14480 to and sub
14012 to 14015	14277 to 14279	

COMPLIANCE:	**PART I**	Within the next 100 hours of flight time following the receipt of this bulletin.
	PART II	Within 600 hours of flight time but no later than October 31, 2006.

DESCRIPTION:

Bell Helicopter has discovered that certain serial number tail rotor blades have been manufactured with adhesive filler applied in the blade bolt washer contact area.

This bulletin is issued to identify and rework blades that have adhesive filler in the blade bolt washer contact area.

PART I of this bulletin gives instructions to verify blade bolt washer contact area for cracked or chipped adhesive filler and to perform a torque check of the tail rotor blade bolts.

PART II of this bulletin gives instruction to remove adhesive filler around blade bolt washer contact area and refinish tail rotor blade.

APPROVAL:

The engineering design aspects of this bulletin are FAA/DER approved.

MANPOWER:

Approximately 1 man-hour is required to accomplish Part I of this bulletin.

Approximately 2 man-hours are required to accomplish Part II of this bulletin.

Man-hours are based on hands-on time, and may vary with personnel and facilities available.

WARRANTY:

Owner / Operators of the affected T/R Blades who have to comply with Part II outlined In this bulletin will receive $130.00 per blade warranty credit for labor to perform the repair.

To receive this credit:

Submit a completed MMIR to BHTI Warranty Dept. no later than the date found in
In the compliance section Part II of this bulletin.

MATERIAL:

Required Material:
The following material is required for the accomplishment of this bulletin and may be obtained through your Bell Helicopter Textron Supply Center.

Part Number	Nomenclature	Quantity
212-010-746-005	Buffer	4 (Note 1)

Note 1: Buffer pads will only be required if damaged during rework process.

Consumable Material:
The following material is required to accomplish this bulletin, but may not require ordering, depending on the operator's consumable material stock levels. This material may be obtained through your Bell Helicopter Textron Supply Center.

Part Number	Nomenclature	Quantity	Reference
MIL-C-81706 1QT	Chemical Film Material (alodine)	A/R	C-100
GRIT CLOTH or PAPER	Abrasive Cloth	A/R	C-423
TURCO W.O.1QT	Cleaner	A/R	C-344

SPECIAL TOOLS:

None required

WEIGHT AND BALANCE:

Not affected

ELECTRICAL LOAD DATA:

Not affected

REFERENCES:

BHT-412-MM Maintenance Manual
BHT-412-CR&O Component Repair and Overhaul Manual
BHT-ALL-SPM (Standard Practice Manual)

PUBLICATIONS AFFECTED:

None affected

ACCOMPLISHMENT INSTRUCTIONS:

PART I **Visually inspect for cracked or chipped adhesive filler around the blade bolt washer contact area. Perform a torque check of the tail rotor blade bolts.**

1. Visually inspect around the blade bolt washer contact areas at all four locations for cracked or chipped adhesive.

    a. If adhesive cracks or chips are found around blade bolt washer circumference, remove blade from helicopter and perform PART II.

    b. If no adhesive cracks or chips are found around blade bolt washer circumference, perform step 2.

2. Apply a torque of 500 in-lbs to the nuts on the tail rotor blade attachment bolts.

    a. If any of the four nuts move, remove the associated blade(s) from the hub.
    b. Inspect T/R yoke bearing bores, blade bushing bores and bolt shanks for damage.

    c. Reinstall blade(s) on the hub and torque per maintenance manual.

    d. If any of the four nuts moved in step a., the torque check must be repeated after 10 flight hours. If any of the nuts move on the re-check, remove blade from helicopter and perform PART II.

    e. Annotate historical record to indicate compliance with Part I of this bulletin.

PART II Removal of adhesive filler around blade bolt washer contact area and refinishing tail rotor blade.

1. Remove tail rotor blade from helicopter.

NOTE

Alternate paint and adhesive removal may be accomplished by using a 180 grit cloth or paper and sanding by hand in a spanwise direction only. Surface finish of 32 RMS or better must be accomplished in the rework area after removal of adhesive using 400 grit cloth or paper. Do not remove more than .001” of aluminum material.

2. Remove paint and adhesive filler in blade bolt washer contact area per Figure 1 using plastic media blasting per the BHT-ALL-SPM.

3. Inspect reworked surface for damage and corrosion. If corrosion is found or damage beyond manual limits, send blade to Bell approved repair facility for repair.

4. Measure depth of spotface on reworked surfaces at all four locations. If depth exceeds 0.035 inches remove blade from service.

5. Apply by brush cleaner (C-344) to the bare metal surface of the reworked area.

6. Thoroughly rinse with water and dry surfaces with a clean dry rag or filtered compressed air.

7. Apply chemical film (C-100) to reworked area.

8. If buffers are damaged, replace per applicable section of CR&O.

9. Refinish blade per CR&O.

10. Install tail rotor blade on aircraft and dynamic balance.

11. Annotate records to indicate compliance with Part II of this bulletin.

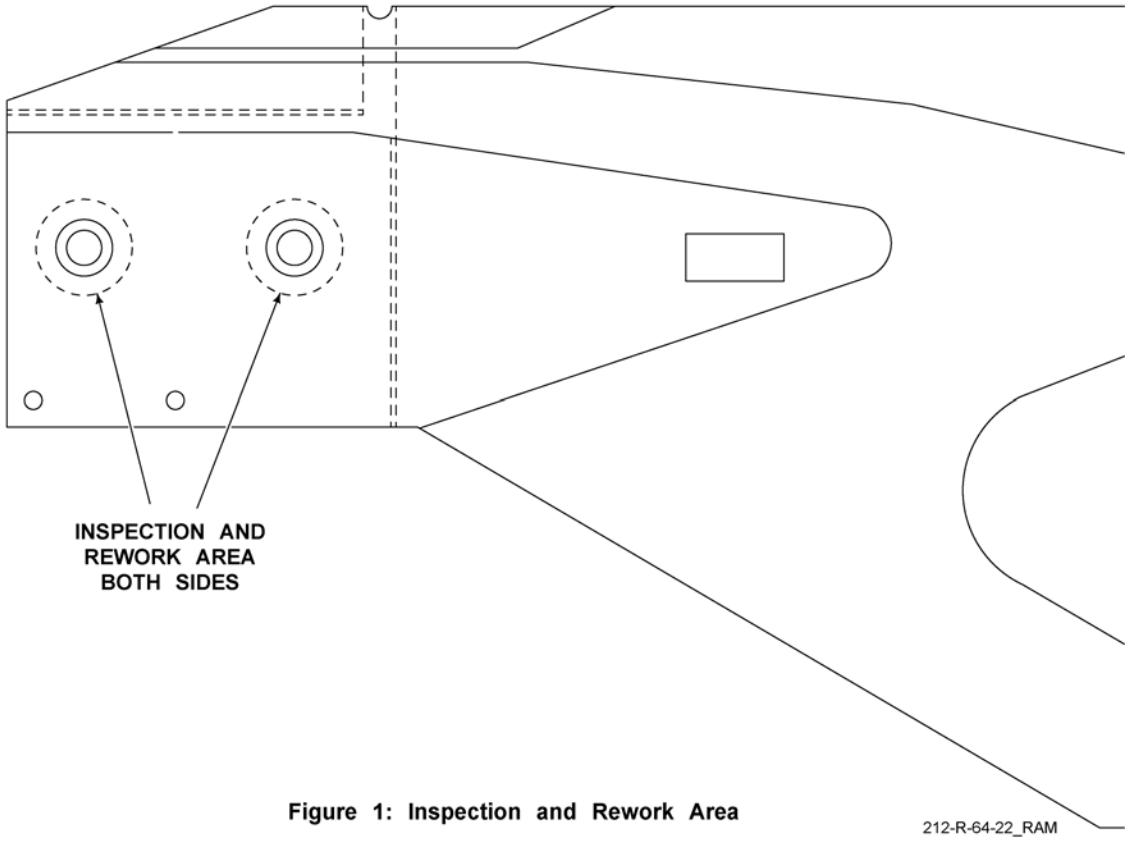

Figure 1: Inspection and Rework Area