



# SERVICE LETTER

HL-108.2\*

DL-82.2\*

EL-33.2\*

FL-40

DATE: 21 NOVEMBER 1990

PAGE 1 OF 1

\* Supersedes Service Information Letters HL-108.1, DL-82.1 and EL-33.1, dated 25 July 1990.

TO: ALL OWNERS AND OPERATORS OF MCDONNELL DOUGLAS HELICOPTER COMPANY (MDHC) 369 Series helicopters.

## **FACET SCAVENGE OIL FILTER KITS, P/N 1741050 (369H SERIES, 369D AND 369E) AND P/N 1741300 (369F/FF)**

The Filter Products Division of Facet Enterprises, Inc. has recently been granted a STC by the FAA for a scavenge oil filter kit for the 369F/FF series helicopter. Scavenge oil filter kits were developed for other models in 1988. Those operators that are currently using the Facet scavenge oil filter Kit must change the filter element per the following Facet Service Bulletin (ref. Serial No. 041888). Installation of the retrofit kit removes the 100-hour element change restriction.

**NOTE:** The Facet scavenge oil filter Kit is required equipment in the Allison 250-C20R/2 engine installation.

Additional Facet Service Bulletins involving the scavenge oil filter kit are as follows:

**NOTE:** The following Facet bulletins should be accomplished concurrently with Facet bulletin No. 041888, if not already accomplished.

No. 020689, dated 5 February 1989  
Subject: Incorrect installation of  
Facet scavenge oil filters.

No. 090589, dated 5 September 1989  
Subject: Facet filter assembly  
functional check tool PN 171145.

John Reagan, Manager,  
MD500 Customer Support,  
McDonnell Douglas



## Filter Products Division

Serial No. 041888  
April 18, 1988  
GLP  
Page 1 of 1

Facet Enterprises, Inc.  
8439 Triad Drive  
Greensboro, N.C. 27409  
(919) 668-4444

### S E R V I C E   B U L L E T I N

Date: April 18, 1988

Subject: Facet Scavenge Oil Filter Kit, P/N 1741050

Models Affected: McDonnell Douglas (Hughes) 500 Series

Because of a potential for exceeding the engine's Scavenge pressure limits, operators with Facet Scavenge Oil Filter Kit 1741050 installed must change filter element, P/N 038088-08, if the filter goes into a bypass condition or at 100-hour intervals instead of every 200 hours.

Filter Products Division is in the process of obtaining approvals for a retrofit kit for operators flying with Kit 1741050. This kit, P/N 1741050-02, will include only those items needed to stay in the pressure limits and will also satisfy the mandatory filter requirements for the C20R engine.

Installation of the retrofit kit removes the 100-hour element change restriction. Retrofit kits and pricing will be available from our distributor network July, 1988. Filter Products Division strongly recommends this update be accomplished upon availability of retrofit kits.

**Serial No.: 020689**  
**February 6, 1989**  
**KGN**  
**Page 1 of 1**

**Date:** February 6, 1989  
**Subject:** Incorrect Installation of  
Facet Scavenge Oil Filters  
P/N 1740001-01  
P/N 1740001-03

**Models Affected:**

<b>Kits</b>	<b>Aircraft</b>
1741010-01	Bell 206A & B
1741020-01	Bell 206L
1741030-01	Bell 206L-1
1741140	Bell 206L-3
1741040-01	Bell 206B-III
1741050-01	McDonnell Douglas 500
1741070	MBB BO105
1741080	Sikorsky S76A
1741090	G.A.F. Nomad
1741150	AS355 Twinstar
1741260	Agusta A109A
1741270	Agusta A109A-II

## SERVICE BULLETIN

Facet Enterprises, Inc. has learned of an instance where Facet filter assembly 1740001-03 was installed incorrectly on a helicopter. The 10-micron filter was installed in reverse with the engine oil out line connected to the filter outlet port (marked "OUT") instead of the filter inlet port (marked "IN").

Such an incorrect installation could cause carbon accumulation on the outlet strainer, with no possibility of bypass. With this reverse oil flow, the bypass valve will not open and the red bypass indicator will not function.

An incorrectly installed filter could lead to excessive back pressure in the scavenge system, causing damage to scavenge pumps, oil tanks, and other related components.

We, therefore, urge all operators of aircraft equipped with Facet scavenge oil filters to verify the correct installation of the filter assembly in accordance with the proper Facet Installation and Service Manual. If an incorrect installation is discovered, we suggest a thorough investigation of the oil tank for signs of distortion which would indicate extreme back pressure has developed during operation.

**NOTE:** This Service Bulletin does not apply to Facet scavenge kits with 10-micron filter assembly 037738-04 or 3-micron filter assembly 1742500.



Filter Products Division  
8439 Triad Drive  
Greensboro, NC 27409  
(919) 668-4444  
FAX: (919) 668-4452

**Serial No.: 090589**  
**September 5, 1989**  
**KGN**  
**Page 1 of 1**

**Date:** September 5, 1989  
**Subject:** Facet Filter Assembly  
Functional Check Tool  
P/N 1741145  
**Purpose:** Provides simple check  
of operation of filter  
bypass indicator.

**Applicability:** Used on the following  
Facet Filter Assemblies:  
037738-04  
1740001-01  
1740001-03  
1740001-05

<b>Aircraft</b>	<b>Facet Kit</b>
Soloy Hiller UH12 E, D	1741000
Bell 206 A & B	1741010
	1741010-01
Bell 206L	1741020
	1741020-01
Bell 206L-1	1740130
	1741030-01
Bell 206B-III	1741040
	1741040-01
Bell 206L-3	1741140
McDonnell Douglas 500	1741050
	1741050-01
Soloy Bell 47	1741060
MBB BO105	1741070
Sikorsky S76A	1741080
G.A.F. Nomad	1741090
AS355 Twinstar	1741150
Agusta A109A	1741260
Agusta A109All	1741270

## SERVICE BULLETIN

Considering the fact that the first Facet/Ni-Cad filter was installed in 1976, some filters have been in service over 13 years. We are providing this Facet filter test tool to give the operator a simple way of ensuring the impending bypass indicator is still functioning properly.

### Instructions for Use

**Note:** Do not attempt to adjust or replace indicator.

At next scheduled filter element change after receipt of tool and each subsequent 800-hour interval:

1. Remove safety wire from filter bowl, unscrew bowl, remove and discard installed filter element.
2. Install tool P/N 1741145, reinstall bowl (do not safety wire at this time), leave cowling locked open or removed for visual access to filter assembly.
3. Start engine, operate at ground idle until normal operating temperatures are reached and filter bypass indicator button extends (approximately 10 minutes). Bypass indicator must reach 100 degrees plus or minus 15 degrees Fahrenheit to operate.
4. If bypass indicator fails to extend, shut down the engine, wait 3 minutes, then repeat Step 3 while oil is still warm.
5. Secure engine, remove bowl and tool, install new seal kit and filter element, reinstall and safety wire bowl, reset indicator, drain and reservice engine oil system.
6. If bypass indicator fails to extend or will not reset, contact Facet Enterprises, Inc. Do not attempt to adjust or replace indicator.

 **Facet**  
Filter Products Division  
8439 Triad Drive  
Greensboro, NC 27409  
(919) 668-4444  
FAX: (919) 668-4452