



- A. NEW MERCUISER I ALUMINUM PROPELLER LINE
- B. NEW PROPELLER SHAFT LUBRICANT RECOMMENDATION

CIRCULATE TO:  
 SERVICE MANAGER  
 PARTS MANAGER  
 MECHANICS

**A. NEW MERCUISER I ALUMINUM PROPELLER LINE**

The current "MerCruiser I" aluminum propeller line will be superseded to the V-6 Outboard "Black Max" aluminum propeller line, shown below. (The MerCruiser I stainless steel propeller line was superseded earlier — refer to Service Bulletin 82-7). These propellers will perform approximately equal to their MerCruiser I predecessors. In some cases, their higher rake design (15° vs. 10°) will allow the drive unit to be trimmed "out" farther, thereby, holding the bow of the boat higher and providing improved boat performance.

**BLACK MAX ALUMINUM PROPELLERS**

<u>Part Number</u>	<u>Diameter</u>	<u>Pitch</u>
48-78112A4	16"	11"
48-78114A4	16"	13"
48-78116A4	15-1/4"	15"
48-78118A4	14-1/2"	17"
48-78120A4	14"	19"
48-78122A4	13-3/4"	21"
48-78124A4	13-1/2"	23"
48-78126A4	13-3/8"	25"

The propellers will be superseded, as shown below, when inventories of the current MerCruiser I propellers are depleted.

**MC-I TO BLACK MAX PROPELLER SUPERSESSION**

<u>MC-I Propellers</u>	<u>Superseded by</u>	<u>Black Max Propellers</u>
48-79582A4 27" Pitch	" "	None
48-79580A4 25" Pitch	" "	48-78126A4 25" Pitch
48-79578A4 23" Pitch	" "	48-78124A4 23" Pitch
48-79576A4 21" Pitch	" "	48-78122A4 21" Pitch
48-79574A4 19" Pitch	" "	48-78120A4 19" Pitch
48-79572A4 17" Pitch	" "	48-78118A4 17" Pitch
48-79570A4 15" Pitch	" "	48-78116A4 15" Pitch
48-79568A4 13" Pitch	" "	48-78114A4 13" Pitch

Our testing has shown that a reduction in engine speed of up to 150 RPM may be experienced when changing from a MerCruiser I to a Black Max propeller of the same pitch. Therefore, if engine RPM was in lower half of specified range with MerCruiser I propeller, a Black Max propeller 2" less in pitch than MerCruiser I propeller may be required to keep RPM within specified range (see example below).

**EXAMPLE:** An MCM 140 turned 4300 RPM at wide-open-throttle with a 21" pitch MerCruiser I propeller. Installation of a 21" pitch Black Max propeller would probably cause the engine to run at 4150 RPM at wide-open-throttle; therefore, a 19" pitch Black Max propeller would probably be required to maintain RPM within the specified range of 4200-4600 RPM.

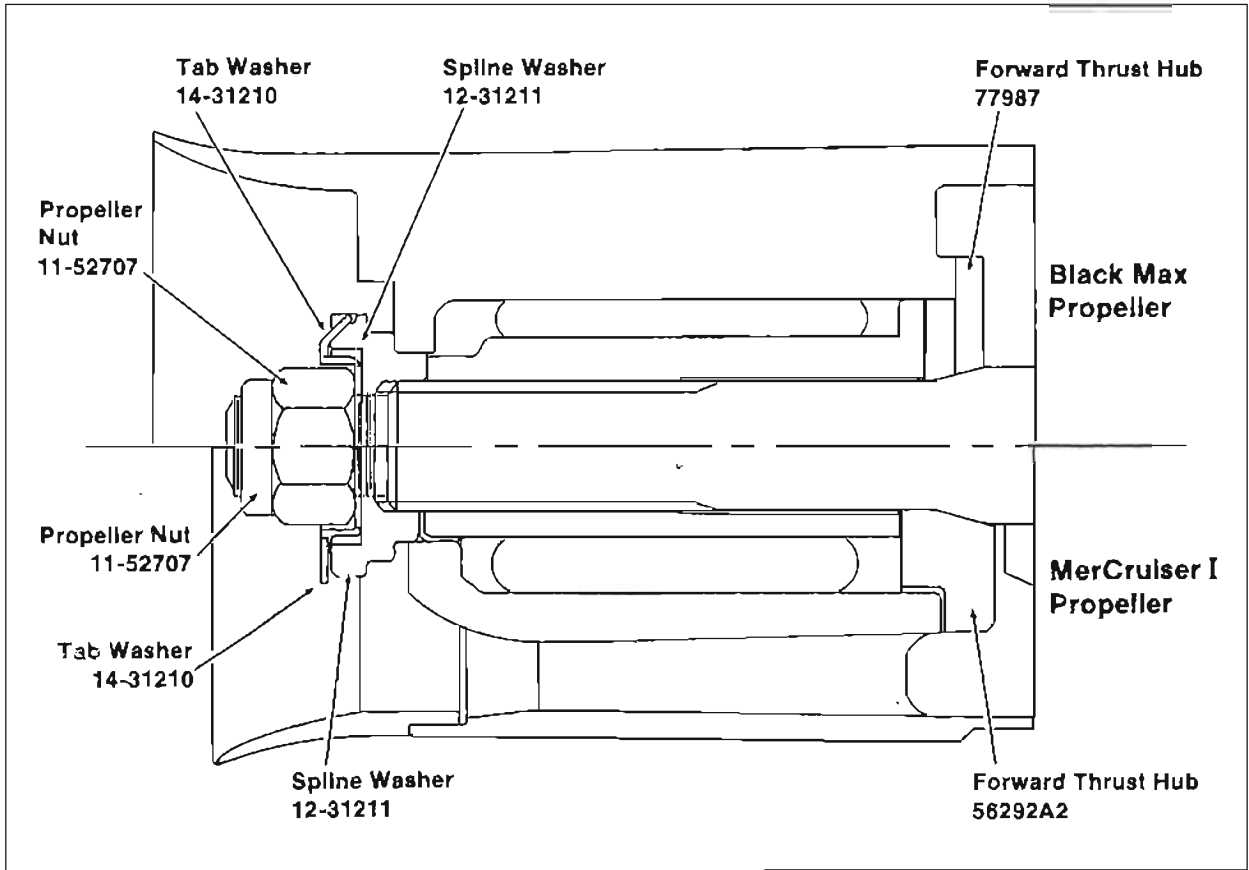
Since the RPM difference between the MerCruiser I and the Black Max propellers vary with boat design, ALL boats should be retested after installing Black Max propellers to ensure that engine RPM falls within specified range. Normally, a 300-400 RPM change exists between propeller pitches within the Black Max propeller line.

When changing from a MerCruiser I to a Black Max propeller, a new forward thrust hub (77987) also is required. (Figure 1) Forward thrust hub (56292A2), used with MerCruiser I propellers, CANNOT be used with Black Max propellers. All other propeller attaching hardware remain the same.

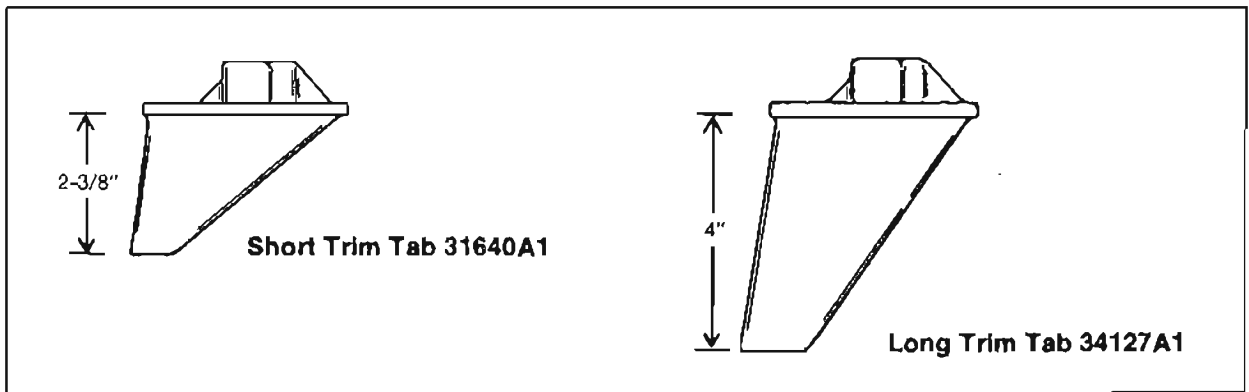
**CAUTION: If a MerCruiser I propeller is to be reinstalled in the future, forward thrust hub (56292A2) also MUST BE reinstalled. Forward thrust hub (77987), if used, will allow MerCruiser I propeller to contact gear housing and subsequent damage may result.**

Long trim tab (34127A1) will interfere with the 15", 17", 19", 21", 23" and 25" pitch Black Max propellers. When using these propellers, short trim tab (31640A1) MUST BE used. (Figure 2) The short trim tab has been standard on all MerCruiser I Stern Drives since approximately the 1976 model year.

**CAUTION: It is extremely important that the propeller attaching hardware is installed correctly and propeller nut is torqued to 55 lbs. ft. (75 N.m) minimum, or interference between propeller and trim tab may result. Attaching hardware is properly installed when at least two threads of propeller shaft are exposed thru propeller nut. Less than two threads being exposed could indicate that spline washer is not engaged with splines on propeller shaft. After installation, propeller should be rotated by hand (while pulling it rearward) to ensure that blades clear trim tab.**



**Figure 1. Black Max Propeller Attaching Hardware**



**Figure 2. Long and Short Trim Tab**

## **B. NEW PROPELLER SHAFT LUBRICANT RECOMMENDATION**

We are adding two additional propeller shaft lubricants to our current recommendations. Any of the lubricants listed below can be used to lubricate propeller shaft. In the past, our only recommendation has been Perfect Seal.

### **Recommended Propeller Shaft Lubricants**

- Quicksilver Special Lubricant 101 (92-79214)
- Quicksilver 2-4-C Multi-Lube (92-86154)
- Quicksilver Perfect Seal (92-34227)

Our testing has shown that Special Lubricant 101 will provide approximately twice the protection as Perfect Seal and, therefore, is recommended for use in areas where corrosion is a problem. The 2-4-C Multi-Lube also will provide greater protection than Perfect Seal, but is not quite as good as Special Lubricant 101.

Propeller shaft should be lubricated at intervals specified below or whenever propeller is removed for service. Failure to lubricate propeller shaft may result in difficult propeller removal in the future (due to corrosion between propeller hub and shaft).

### **Recommended Lubrication Intervals**

- SALT, POLLUTED OR MINERAL LADEN WATER AREAS — Every 50 hours of operation or 60 days (whichever occurs first).
- FRESH WATER AREAS — Every 100 hours of operation or 120 days (whichever occurs first).