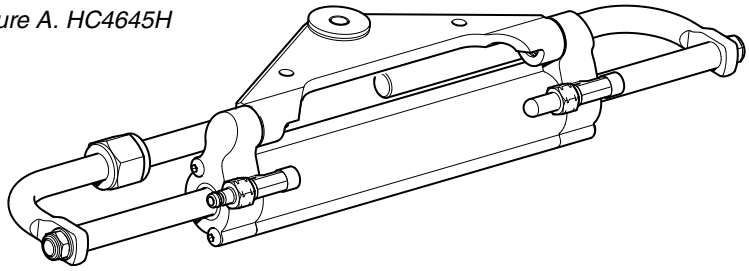
BayStar™

CYLINDER UPDATE AND SYSTEM OPTIONS FOR EFFORT REDUCTION

Teleflex Marine proudly announces an update to the BayStar compact cylinder. In the near future the main piston seal will be changing from an O-ring seal to a low friction Teflon impregnated seal. At the same time, the end gland wiper and rod seals will be changing to low friction seals. In addition to these changes, the wiper seal will no longer be pressed into place but will now be retained in a groove to improve wiper retention.

Figure A. HC4645H



Effort Reduction

The above enhancements will reduce steering effort in BayStar systems, but if one chooses to further reduce the steering effort the following additional changes can be made:

- Change to SeaStar **hose** from BayStar tubing (HO51/81XX)
- Change to a BayStar Plus 1.4 in^3/rev displacement helm (HH4513/14)
- Change to a BayStar 1.1 in^3/rev displacement helm (HH4311) (number of turns will increase)

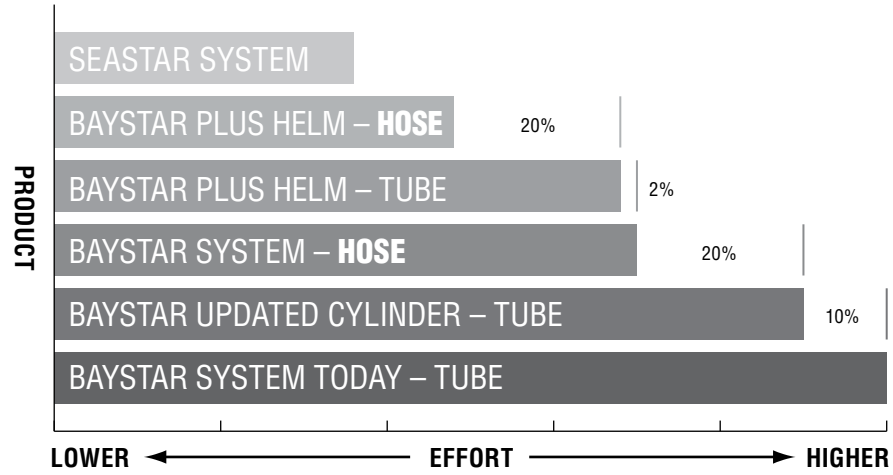


Figure B.

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Installation Reminders

In addition to component changes, we often encounter installation irregularities that can have a significant impact on steering effort. Please check your system for the following conditions if effort is deemed high:

- The engine rigging tube is not interfering or impeding with the cylinder/engine travel. A simple check can be performed by disconnecting the steering and ensuring the system travels freely when manually turning the engine.
- If your system is equipped with a tilt helm, ensure that the rubber boot is installed properly and not interfering with the wheel hub.
- Ensure that the steering lines have enough play during operation of the system to prevent lines from stretching or kinking during cylinder/engine travel.

Application

Baystar hydraulic steering systems are rated for a maximum of 150 horsepower as rated by the engine manufacturer. Customers can safely operate the system at this level and be assured that safety and reliability are met.

However in applications with high steering effort (i.e. pontoons, bass boats and larger HP four stroke engines), we recommend that the system be upgraded to SeaStar/SeaStar Pro steering. This will reduce the steering effort due to the fact that SeaStar steering provides more output power resulting in lower steering effort. Please refer to the chart below for the optimum power range.

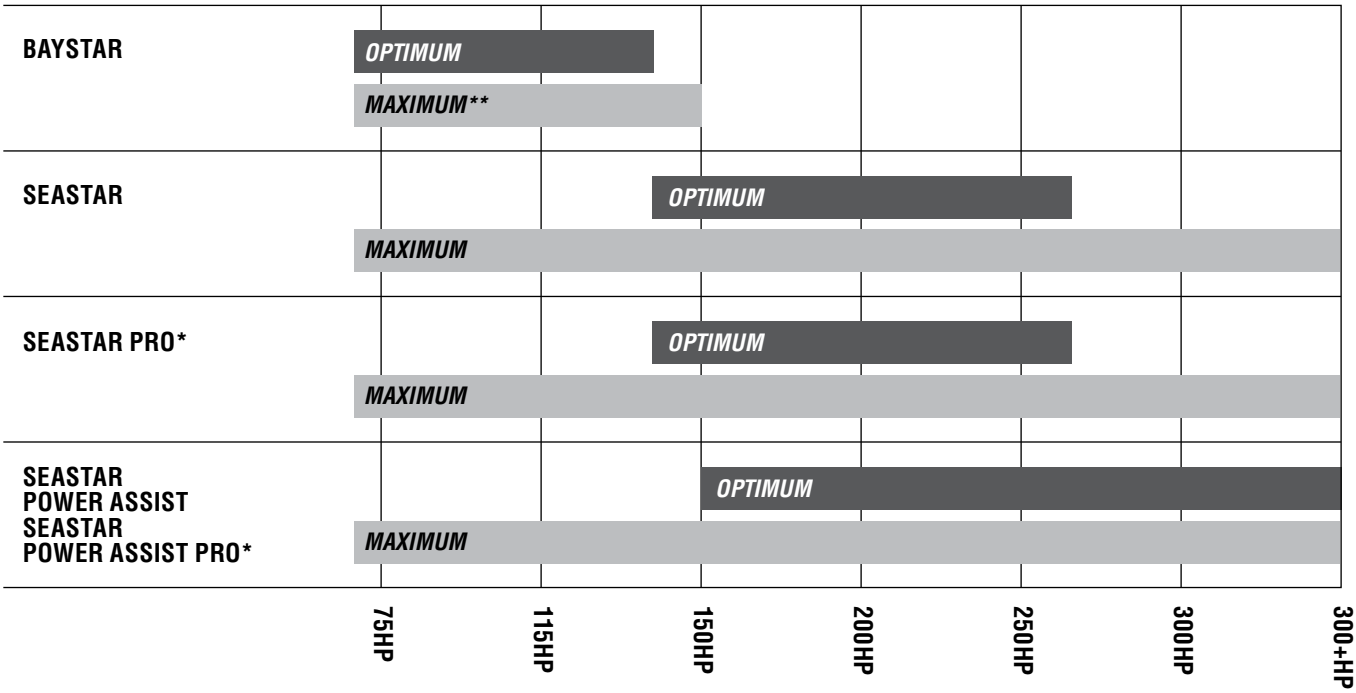

*Figure C. Chart based on 'Optimum Comfort' * Ideal for Bass boats that exceed 60mph ** Mercury 150 Optimax should use SeaStar*

