



TECHNICAL BULLETIN

Ref No.: YMTQTB11-017
Date: October 18, 2011

**To : Yanmar Marine Regional Head Quarters and
All Yanmar marine distributors**

**Subjects : Yanmar Sailboat engine control lever position during sailing
under sail with engine stopped**

1. Introduction

Yanmar wishes to inform you about the instruction of the control lever position during sailing under sail with engine operation stopped. This instruction is subjected to mechanical type gearboxes and sail drives only.

2. Operation instruction

2-1 Mechanical Cone clutch :

Applicable models: Sail Drive: Models SD 40, SD50 and SD50-4T
Marine gear: Models KM2P, KM35P, KM35A and KM4A

When mechanical cone clutch type gearbox or sail drive is equipped with the following propeller:

a. Fixed propeller:

When sailing under sail with engine operation stopped put control lever into **Neutral**. The output shaft keeps rotating.

Notice:

When control lever is put in **Reverse** position, cone slippage will be introduced and void your warranty and there is possibility that the clutch doesn't disengage. This can be a problem for engine re-starting.

There are options to stop free rotation of propeller-shaft if customer doesn't want occur noise from rotating propeller:

- 1) For sail drive: install folding propeller or Feathering propeller instead of fixed propeller.
- 2) For marine gear: install the Shaft - Lock device, Yanmar does not supply, on the propeller shaft.

b. Folding propeller: (including GORI Over-drive propeller)

When sailing under sail with engine operation stopped put control lever into **Reverse** position, this to operate the folding propeller to fold close blade and output-shaft stops from rotating. After this operation put the control lever back into **Neutral**.

c. Feathering propeller:

When sailing under sail with engine operation stopped put control lever into **Reverse** position, this to operate the feathering propeller into feathering position and output-shaft stops from rotating. After this operation put the control lever back into **Neutral**.



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2-2 Other Mechanical clutch:

Applicable model: Sail Drive: Model SD20, SD31 (Dog clutch type)
Marine gear: Model KBW10, KBW20, KBW21
(Mechanical single or multi disc clutch)

When mechanical dog clutch or mechanical disc clutch is equipped with the following propeller:

a. **Fixed propeller:**

When sailing under sail with motor stopped put control lever into **Neutral**. The output shaft keeps rotating.

Notice:

When control lever is put in **Reverse** position there is a possibility the clutch does not disengage. This can be a problem for engine re-starting.

There are Options to stop free rotation on propeller shaft if customer doesn't want occur noise by rotating:

- 1) For sail drive: install folding propeller or Feathering propeller instead of fixed propeller.
- 2) For marine gear: install the Shaft-Lock device, Yanmar does not supply, on the propeller shaft

b. **Folding propeller:**

When sailing under sail with engine stopped put control lever into **reverse** position, this enables the folding propeller to fold close blade and output-shaft stops from rotating. After this operation put the control lever back into **neutral** or remain **reverse** position as you like.

c. **Feathering propeller:**

When sailing under sail with engine stopped put control lever into **reverse** position, this enables the feathering propeller into feathering position and output-shaft stops from rotating. After this operation put the control lever back into **neutral** or remain **reverse** position as you like.

Notice:

Do above mentioned operations with a boat speed <3knts when sailing under sail with engine operation stopped.

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