

## Sole Diesel Marine Engine – Guidelines for Fishing / Workboats

### **Fishing and Workboats**

Engine selection guidelines for displacement craft. It is not possible to make a general list of boat sizes and the required horse power for these commercial applications. Sole Diesel and Engines Plus Ltd are very happy to work with you the owner, and our dealer to arrive at a suitable choice based on past experience and the following general principles.

### **Fishing (Potting/Long Lining) and 'Free Speed' Work Boats**

For general propulsion work (where no trawling is involved) the rule of 4 hp per ton can be used. This should be increased to 6 hp per ton where rough conditions are more usual. The size of engine is often restricted by the fisherman's licence which limits the power that can be installed. Sole Diesel and Engines Plus Ltd can assist you by de-rating a larger, higher torque engine, to meet the horse power requirements of the licence, but at a lower rpm.

Consideration has to be given to the amount of power required at or near tick over, to drive a hydraulic hauler as well as move the boat. A 'de-rated' larger engine is best for this application.

A larger propeller with say 3:1 reduction ratio is always going to be more efficient, Sole Diesel will be able to manufacturer the correct propeller and stern gear assembly, to suit your craft

Most small fishing boats require a hydraulic hauler / winch. Sole Diesel and Engines Plus Ltd can mount your hydraulic pump off the forward end of the engine with extended rails and a cross member so that everything moves together. We have many options available to choose from, and can mount a hydraulic pump on the gearbox PTO.

Trolling valves can be fitted to a suitable hydraulic gearbox.

### **Trawlers and Tugs**

#### **In addition to the items listed above the following should be noted**

The aim here is to get the maximum allowed horse power transmitted to the largest propeller the boat can accommodate at the lowest shaft rpm.

Sole Diesel needs to be involved as very often a 4 blade propeller may be required.

The trend towards shorter, fatter boats with plenty of horse power calls for a larger naturally aspirated engine to be installed and this is where Sole Diesel/Engines Plus Ltd and our dealers can advise on the most suitable unit including accessories such as PTO, clutched or un-clutched pumps, trolling valves, reduction ratios, hydraulics etc.

**Engines Plus Limited do not accept any responsibility for incorrect engine selection.**