From Reader ROSS TYLER, Sydney, NSW

Issue Of The Month:

Pros and Cons Of Auxiliary Motors In The Modern Era

Hi Peter, Mary and the ABM team.

I have been buying or more recently, subscribing to your publication(s) for over 12 years and always look forward to each edition.

On the subject of auxiliary motors, I was wondering if you could do a test on the pros and cons of using aux. motors and indicate which motors, propellers and hardware are most appropriate. This would need to be examined in light of new and used boats given the changes in hull designs and weights of outboard motors.

The reason I ask is that I have an old Haines Hunter V16R with a later model Yammy 115hp that has its stability impacted (at rest and underway) by the weight of the auxiliary motor amongst other things. The aux. bracket (s/steel and adjustable) is on the port side to offset driver's weight. However, this all comes undone when the family is onboard.

Further, the relatively narrow hull means that the amount of weight on the transom (main motor and auxiliary; petrol tank, weight of people sitting in rear quarter seats) also impacts the set up of the boat.

I have on loan a 21kg Tohatsu 5hp long shaft (an early 90s model but still basically the same as the current model) which has proven to be a very reliable auxiliary. It has its own internal tank which means there are no concerns over fuel lines and space for the separate tank. It starts first pull and provides heaps of power for its size, however, it is a pain to access on the auxiliary bracket to raise or drop the leg of the motor.

I feel like I need to be standing on the water to adjust the motor. The tilt mechanism is quite flimsy and cantankerous making it difficult to use. It would be nice to use the auxiiary motor for trolling, however, the difficulties experienced prevent this from happening.

I have been examining current motors and am interested in your thoughts for the ideal aux motor and set up. I have noted that:

- A lot of smaller motors have delicate tilt mechanisms and would be difficult to use if not the main motor on the transom ie: mounted on aux. bracket. Further how do they stand up to being tilted up most of the time?
- A number of small motors on the market (particularly 4 strokes) do not offer an internal petrol tank. The same goes for the option of long shaft;
- Not all small motors offer a smaller pitched propeller which I understand would assist performance as an aux motor;
- Some are impacted by fuel vapour lock which would create difficulties starting the motor in an emergency;
- Most new motors 6hp and below are single cylinder and are thus very noisy whether it be at mid range revs or WOT. I'd be interested in your thoughts on noise and vibration levels for motors between 2hp and 15hp.
- I wish my old Johnson 4hp twin cylinder was still working as it had plenty of mid-range torque, was relatively quiet compared to modern motors, had a good size internal tank and a robust tilt mechanism.

Additional questions I would like to have answered in a proposed test include:

- What is the minimum acceptable horsepower for different size boats eg: under 4 metres say up to 4 hp, 4 to 5 metres say 5 to 8 hp and so on given the variety of situations a boatie can find him or herself in eg: a larger aux motor would be required if most time is spent inshore fishing versus estuary fishing?
- Can a smaller motor like the Tohatsu 3.5B with its optional 4.5 inch pitched prop and deeper gearing be used to adequately propel boats 4 to 5 metre in size and save on weight (it is only 13kgs) and improve my chances of lifting the leg of the motor up - or I am just kidding myself?
- Should I just start saving my pennies for the impressive Suzuki 6hp.
- Can you include in your test, checks on the tilt mechanism, location and length of the tiller handle, access and use of internal tank, hot and cold starting, long versus short shafted motors on adjustable aux brackets, etc.
- Some quick tips or an 'idiot sheet' would be helpful.

I'm sure there are many readers who have similar issues with aux motors particularly those of us on the wrong side of 40.

PS - my V16R was fully restored 2 years ago and looks like a modern boat. We have 3 kids from 5 to 14yrs so a good auxiliary is essential.

Regards
Ross Tyler
(Via email)

Such a typical 1970s-1980s set-up - until 4-strokes emerged as a reliable, solo installation in the 1990s.

Following receipt of this email, Editor Peter Webster asked Ross:

I'd like to respond in depth in the next issue, but you've left out some critical pieces of information i.e., WHERE do you (and the family) go boating? What do you do together - fish? (Where?) Ski? (Where) How often do you ALL get out on the water? How many times have you been forced to use the auxiliary in a true 'get me home to safety' situation? If so, what went wrong with the Yammy ?

If you have the patience to answer these questions - we'll certainly open up the subject for debate and comment in ABM

Ross replied:

Where do we go boating? Georges River/Botany Bay, Port Hacking and off Cronulla, and our favourite coastal retreat, Sussex Inlet.

What do we do? Visiting beaches for picnics with the 3 kids/wife, or taking my brother and father out fishing, mainly estuary fishing with occasional inshore fishing.

How often do I get out on the water? Not enough. My use of the boat is irregular, with spurts around Xmas (3 or 4 times) and school holidays.

The kids probably only get out a few times a year, but I'm always trying to encourage them. For myself, between my boat, my brother's inflatable and friend's boats, probably average at least once a month outside of school holidays. I do have a kayak, which I use (say) once a month as well.

The boat was rebuilt with some skiing in mind. I originally got the bug for skiing at the ripe old age of 38, behind a friend's Dancraft skiboat - but skiing without my (eye) glasses is difficult. Safer to stick with the fishing!

As far as the motors are concerned, the main motor was purchased second hand. It is a 1989 Yammy 115 with oil injection. As I found out over the first 2 years of ownership, there were some minor technical problems resulting in a call for help or needing the auxiliary motor.

Examples:

a) Went out early one summer's day for a quick run with expectations of coming in before 11:00am to beat the heat. However, a fuse blew (under the cowl) with motor tilted up - and I'd forgotten to pack the flathead screwdriver to manually adjust the tilt and I didn't know where to find the blown fuse.

I do now, and have plenty of spares. I was rescued by Mr Dancraft, but the kids had to endure mid-30 temperatures.

b) Battery collapsed - moral don't borrow a friend's battery whilst saving up for new one! I always keep mine fully charged now, and get rid