

Robben Island' race. This deep-tunnel catamaran, built with foam core composite technology, was, in the words of Springbok power-boater Grant Harrison who went on to race it in the UK, 'designed to utilize both hydrodynamic and aerodynamic lift ... [with] adjustable air gates ... to regulate air compression in the tunnel.' Bob also worked with former Nissan rally and race exponent Nic de Waal, who now runs Teknicraft in New Zealand, in designing a six-litre racing boat, Jokers Sports Club 2, which has been a force in UAE racing.



The BOBKAT 'Spindrifter Supercat' doing its thing. (Grant Harrison)

Tony Needell, father of F1 driver and *Fifth Gear* presenter Tiff and SA Formula Ford and Atlantic exponent Mike, and a noted powerboat racer, described Bob as a 'national genius' in highlighting his power-boating contribution even back in 1970.

This was not only because of Bob's hydrodynamic but also his mechanical innovation a long way from specialist suppliers. As Needell commented on Meteor V's drive-train: 'Unable to obtain a Mercruiser with racing outdrive he had endeavoured to achieve the advantages of outdrive weight distribution and shaft angle by positioning the engine with gearbox aft, facing forward, coupling via a universally jointed layshaft to a V-drive which was fitted through the tunnel roof. Thence, from the output of the V-drive, a sliding spline, universal jointed propeller shaft connected to a Mark II Mercruiser outdrive, with a second universal taking the angle of the shaft to the outdrive prop shaft. The outdrive, of course, had all its other shafting and bevels removed but still did the steering and was fitted with power trim, the whole point being that utilising the universals and the sliding splines the prop shaft could be varied in position and length. As Ken

Stephens already had the engine and gearbox, the V-drive and the outdrive, the cost of his transmission was a fraction of that of a new outdrive unit.'

Van Niekerk's radical Phoenix Holman-Moody V8-powered offshore trimaran design for Bob Friedman. Finished just three days before the 1970 annual offshore race in False Bay, it was lying second to Stephens' similarly powered Meteor V when forced to withdraw.



Phew. In those days folk seldom complained, they just got on with it.

This was not the end of his repertoire: Far from it. Among many other designs were those for a low-cost refrigerator and an air conveyor for bakeries. At the time of his death he was working on harnessing the noise from road traffic to generate power for street lighting. He possessed an extraordinarily creative brain, yet one rooted in logic and practical application.