

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
1		NC 33 Mk 1	Sea water in fuel	All NCs except 331s – A German Nautical Association member e mailed me from Portugal with a sorry tale. 'We had the unfortunate experience with seawater contaminating the fuel tanks of our NC33 whilst sailing 5 miles offshore in heavy seas. The engine stopped due to seawater entering the fuel system and although the filters were changed and water separator/fuel lines purged, the engine ran for only 10 minutes and finally stopped again. We had to sail all night in increasing gale force winds in order to make any port. On further inspection both tanks have seawater in them. Is there a valve which lets the air come out but closes when water tries to come in? This account has been paraphrased but you can imagine their plight whilst working in the engine room in heavy seas! At the time of this incident their boat was motor sailing and heeling heavily in very rough seas.	Fuel, Sea water, air vent	'Seawater entering the fuel tanks via the air vent has been a problem which was not corrected until the introduction of the NC331s. Siltala have now routed the air vents for both fuel tanks to a point beside the aft helm position. This modification can easily be incorporated into the older boats using rubber (neoprene) fuel vent pipes of approximately 5mm internal diameter. The original fuel tank vents are removed and the holes fitted with blanking plates'. Unfortunately, installing a one way valve will prevent equalising air pressure as the fuel tank level falls during engine operation – not a good idea!	Fuel	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
2		All	Fuel Additives	All NCs - A member has brought to our attention another very effective fuel additive called Fuel Set. It is reported that the exhaust is much cleaner with this treatment.	Fuel, Additive Type	Info	Fuel	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
3		All	Anode Leaking	All NCs - A member reports that he has identified an internal hull leak in the area of the external anode mounting. Main hull anode bolts are not long enough and the distance between them is shorter than the UK anode manufacturers' standard. In this particular case the bolts had been progressively forced apart and the entire bonded structure required replacing.	Anodes bolts distance	File one hole on the new anode mounting bar so as to provide a clean fit onto the hull bolts.	Electrics	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
4		All	Engine Anodes	All pre 1987 NCs - Anodes for Gustavson and early Lehman engines are no longer available from the Nautical Association. They were specially produced because the center bored female thread of the Gustavson/Lehman brass anode holders could not accept commercially available anodes of the correct size. Gustavson have taper (no washers needed) threaded brass anode holders, early Lehman use parallel (fitted with washers) threads and just to complicate matters, later Lehman and Sabre also use taper threads. The Association decided to manufacture replacement parallel (early Lehman) and taper (Gustavson) threaded brass anode holders that are bored and threaded to accept any 3/8 Whitworth (international standard) male threaded anodes. This allows us to standardise anodes 28 29 across the entire Gustavson/Lehman/Sabre fleet. Price £8.50 per pair including copper washers (Lehman) and p&p excluding the new anodes. M G Duff anode part numbers will be P500/1-1/2 (small – used for Gustavson/Lehman/Sabre) and P625/2 (large – Gustavson/early Lehman only). Please note that the anode type 625/2 seems to be more like one and a half inches long. Recommendation is to remove, clean or replace the anodes at least every four months. It has been reported that debris from previously used anodes can partially block the heat exchanger chamber and prevent the insertion of a new anode. Engine overheating can result from failure to clean out the heat exchanger tubes (using a length of weldin	Engine anodes adapters	Info	Engines	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
5		NC 331	Keel corrosion	NC331 keel - lead surface corrosion has again been identified on UK delivered boats. The lead is coated to prevent contamination with seawater and encapsulated for further protection. Identification of this problem – white spots appear on the outer surface after pressure washing the antifouling. Problem rectified by exposing the lead and re-sealing according to manufacturers recommendations.	Lead Keels exposed sea water	Info	Hull	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
6		All	Prop Shaft Glands	All NCs - Replacement 40mm propeller shaft glands are being fitted and I will pass on operational reports to you. Siltala fit bronze gland 'shaft carriers' with either 2" BSP or M60 threads and gearbox couplings that could be either local make, Vetus 'Bulliflex' or Centraflex. I mention the coupling types as the shaft has to be pulled back to allow the exchange of the gland nut.	Prop Shaft Gland replacement	Info	Propeller	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>

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7		All	Gland Spanner	All NCs - There has been a problem with obtaining propeller shaft gland nut spanners (75mm across the flats). A limited number of sets of open ended spanner heads machined from 6mm thick steel plate are in stock. You have to weld on handles according to your individual requirements as the space is different for every Nauticat type.	Gland Spanner manufacture	Info	Propeller	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
8		All	Gland Greaser	NC43 - Neoprene greaser hose attached to the propeller shaft bronze seal carrier. Mild steel threaded section on the lower greaser hose end rusted away. Boat about to leave Penzance for NW Spain. This is a common but potentially serious fault and requires careful cleaning of steel lower hose end and treatment with automotive product called 'Waxol' or similar water resistance product. These hoses can be replaced by any hydraulic equipment firm using stainless steel fittings (1/8th BSP thread).	Gland Greaser tube failure	Info	Propeller	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
9		NC43	Rudder Post	NC43 - Rudder post stainless steel tube separating from the fibreglass hull and allowing seawater ingestion into the aft steering well. This has occurred on an older boat and the problem can be corrected by careful re-bonding of the horizontal support brackets that are welded onto the tube. Suggest all owners of earlier NC40-43 carry out an inspection. Two more cases of stiff steering have been reported. This is caused by the steering ram polythene centre seal-carrier swelling and becoming jammed in the tube. I can provide information on rectification work as this problem has occurred so many times.	Rudder post separation fibreglass	Info	Steering	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
10		All	Deck Light	All NCs - We have found it difficult to obtain replacement deck light sealed beam units. This has been rectified by identifying Elta Lighting Ltd as the UK trade supplier of American 4 inch diameter GE 4411 (Elta code SB 4411) units. Price £6.90 + VAT and p&p to Nauticat Association members. More details in the Suppliers List	Deck flood bulb replacement	Info	Electrics	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
11		All	Ceiling light switch	All late model NCs - Ceiling mounted white 12-240v push on/off single pole switch. Made by Arcoswitch Ltd, UK, and supplied to Siltala via unknown source. Product also identified as switch used in Belling cookers and other Stoves products. See our latest NC Association Parts Supplier List.	Ceiling light switch replacement	Info	Electrics	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
12		NC 331	Alternator	NC331 Alternator - a member has fitted a larger alternator to the Yanmar engine in order to provide better battery charging and domestic power whilst cruising abroad. This looks a very nice job indeed and the extra power for water-makers etc will be invaluable.	Larger Alternator upgrade	Info	Electrics	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
13		NC 38	Toggle Switches	NC38 - Pilothouse red toggle switches/magnetic circuit breakers. The supplier has just been identified as US Airpax Inc. Will identify a UK supplier shortly.	Toggle switch c/b replacement	Info	Electrics	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
14		NC 44	Standby Gen Heat Exchanger	NC44 Standby generator - Aluminium seawater heat exchanger on the exhaust has corroded and needs replacing. Siltala trying to trace original unit manufacturer or failing this, copper replacement can be made by Bowman, Birmingham	Generator heat exchanger	Info	Engines	29-2003	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-29-2/</a>
15		All	DomesticLight Bulbs	Lighting: Did you know that you can buy normal 230v type light bulbs (BC/SBC fittings) that are made to run on 12V? They are widely used on cruise ships and readily available from wholesale electrical factors such as City Electrical Ltd. 25w is quite sufficient and every domestic table lamp will work perfectly on your boat. Those slim office table lamps with a heavy transformer in the base are really good. They are fitted with 12v halogen bulbs so when the transformer in the base is bypassed you have a most stable reading light. In both cases do change the plug!	12 volt bulbs replacements	Info	Electrics	30-2004	Not online
16		All	Engine Mounts	Engine Mounts: Siltala fitted round engine mounts made by Metalastik to their early boats. These didn't have a centre screw height adjustment which made good alignment almost impossible. The Americans have sent us complete working drawings for a modification to the existing type of mounts, and copies are available on request. They have a 'hardness' code which is Pn 17/482-60 (white spot) on the rear and Pn 17/482-20 (orange spot) on the front.	Mounts modification adjustment		Engines	30-2004	Not online

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17		NC 33 Mk 1	Fuel Tanks	Fuel Tanks: An NC33 has required both fuel tanks being changed whilst overseas. Corrosion had caused leaks and they were replaced with mild steel copies. We have some excellent diagrams to show an easy way to remove them and re-install their replacements. Stainless steel is not an obvious choice because the welding material (316 grade) changes its properties when heated, and in the presence of any salt water, creates an electrolytic reaction between the weld and the stainless steel walls of the tank. This is particularly prevalent with holding tanks.	Fuel Tanks replace	Info	Engines	30-2004	Not online
18		All	Fuel Additive	Fuel Additive: We have received another strong recommendation for the use of Fuel Set (www.liquideng.co.uk) which seems to significantly reduce smoke emissions from some models of the Yanmar engine.	Fuel additive recommendation	Info	Engines	30-2004	Not online
19		NC 38	Prop Coupling	NC38 Gearbox/prop shaft coupling disintegrated and propeller forced into skeg. This incident occurred on leaving harbour and totally disabled the boat. The cast aluminium couplings fitted to Nauticats prior to 1992 have a six 'spider' centre fitted with rubber caps. Whilst reducing some vibration the design is not nearly as flexible as modern couplings and an engine out of alignment can cause considerable stress on the cutlass bearing assembly.	Prop coupling disintegration	Info	Propeller	31-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-31-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-31-2/</a>
20		NC43	Fuel Return	NC43 Fuel loss on Atlantic crossing. Some of the earlier boats were fitted with engine injector return lines that were connected to only one tank. If both tanks are full of fuel the first tank to use must always be the one receiving injector return fuel. Not observing this procedure can result in over-fuelling and discharge from the fuel venting system. All boats are now fitted with a double fuel tank selector valve that switches injector return fuel to the tank in use.	Fuel returns modification	Info	Fuel	31-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-31-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-31-2/</a>
21		NC 38	Prop Alignment	NC38. Engine impossible to re-align due to P bracket distortion. There are two considerations when tackling this type of problem: a) It is impossible to align an engine without a 'dummy' coupling that has an accurately machined face and slides/locks onto the propeller shaft. b) The P bracket can be easily separated from the hull by re moving the four bolts and applying a minimum a heat to the top of the bracket. Siltala has given us a repair programme and two re-fixings have been very satisfactorily completed.	P Bracket replacement alignment	Info	Propeller	31-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-31-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-31-2/</a>
22		NC 44	Prop Alignment	NC44 Vibration when under power. The cutlass bearing needed replacing but it was in so tight that the bronze stern tube came out of the hull. To achieve a first class repair the old Siltala coupling was replaced with a new Centraflex model, new propeller shaft and the stern tube re-fixed into the hull.	Prop vibration cutlass tight	Info	Propeller	32-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-32-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-32-2/</a>
23		All	Sea Cock	All NCs. Another case of severe corrosion of the engine seacock hull fitting has been reported. Since the latest case is on an eight year old boat it would be wise to remove the hull strainer and examine this fitting during the next haul out.	Sea Cock Corrosion	Info	Hull	32-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-32-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-32-2/</a>
24		All	Door locks	All post 1990 NCs. Pilothouse door lock internal failure. The later boats are fitted with slimmer pilothouse doors that incorporate less substantial Mobella locks. When the door is closed the latch 'hooks' over the door pillar plate and it is possible for this latch to carry the weight of the door in the following circumstances: a) Badly worn front door wheel. b) Door plate fixed too high. Key numbers are stamped on the lock.	Door lock failure	Info	Fittings	33-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-33-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-33-2/</a>
25		All	Cutless Bearing	All NCs. Noisy cutlass bearing at low rpm. Caused by antifouling being applied to the end of the rubber bearing and blocking the seawater lubrication/cooling grooves.	Cutlass bearing antifoul	Info	Propeller	33-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-33-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-33-2/</a>
26		All	Battery Chargers	Following requests for battery charger replacements we now have trade facilities for Victron and Mastervolt units.	Battery chargers suppliers	Info	Electrics	33-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-33-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-33-2/</a>
27		All	EPRIBS	Following requests for EPRIBS we now have trade facilities for ACR, Jotron and McMurdo units. American ACR are particularly good.	EPRIBS suppliers	Info	Electronics	33-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-33-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-33-2/</a>
28		All	Bulbs	Replacement 12v 10w internal 'festoon' light bulbs identified as Lucas part number LLB272 (75p inc VAT). Deck lamps as Lucas part number SB4411	Bulbs replacements	Info	Electrics	33-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-33-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-33-2/</a>

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29		All	Leaky Glands	We have long wondered why some boats have very leaky propeller shaft glands and others remain relatively dry. This occurs with new deliveries almost as often as with older boats. Standard neoprene rubber hose used for stern tubes is cut from a coil and the bend is greatest if it comes from the centre. If the hose is subsequently installed in a straight line, the natural bend exerts a constant pressure on the soft gland seal and wear always occurs in the same area as the gland nut is progressively tightened. If the natural bend is downwards, it adds to the weight of the bronze seal carrier (with greaser) and makes matters even worse! If by chance the bend is upwards the problem is much reduced. Good engineering practice dictates that special rubber tube that has been manufactured in straight lengths is used	Stern glands rubber connector	Info	Propeller	34-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-34-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-34-2/</a>
30		All	Prop Couplings	All post 1995 NCs with Yanmar engines and Centraflex propeller shaft couplings. The flexible coupling is connected to the gearbox flange via a spacer plate. This plate has aft facing recessed holes for the bolt heads connecting it to the coupling and forward facing studs connecting it to the gearbox flange. It is impossible to see the coupling bolt heads when the spacer plate is bolted to the gearbox. A serious case has been reported where the coupling was slowly becoming detached from the gearbox because the recessed bolts were not installed with thread locking sealant. Symptoms: unusual vibration or visible gap between plate and coupling. Advise check as soon as possible.	Yanmar Couplings loose	Info	Propeller	34-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-34-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-34-2/</a>
31		All	Hydraulic Steering	All NCs with hydraulic steering. Steering lost due to separation of the hydraulic ram from the rudder stock plate. Caused by missing lock nut and bolt subsequently working loose to the point of separation. Advise check.	Hydraulic Steering failure	Info	Electronics	34-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-34-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-34-2/</a>
32		All	Exhaust Flush	All NCs. Report on the advisability of flushing out the engine with fresh water before winter lay up. Push one end of a plastic tube into the sea water strainer outlet (cover and strainer removed - airtight fit round tube) and the other end into a bucket of fresh water being filled by a mains hose. Run the engine slowly and make sure that water comes out of the exhaust.	Fresh water exhaust flush	Info	Engines	34-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-34-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-34-2/</a>
33		All	Auto Pilots	The best known manufacturer was NECO (Normand Electric Co) who made robust products that sold throughout the world, however, like the British motorcycle industry it failed to keep up with the times and disappeared from the market in 1990. Sadly, the company never followed its competitors in abandoning mechanical relays in favour of the very reliable transistorised solid state switch. We probably have at least 40 NECOs systems still in service and whilst the hydraulic drive versions are somewhat complicated, the reversible electric motor versions are simple and capable of further cost effective development.	NECO replacements	There are three basic options when deciding on maintaining or upgrading existing systems. Firstly fit two new mechanical relays at a cost of anything between £50 and £135. Secondly incorporate a new transistorised solid state switch at an anticipated cost of about £150 (see next paragraph). Thirdly retain the excellent quality electric drive unit and interface it with a new generation digital 'steer computer' manufactured by companies such as Simrad and Raymarine. These are available for less than £900 including fluxgate compass, rudder reference unit, controller, VAT and delivery. Armed with a little information from a manufacturer, we asked Exeter University's School of Physics if they could help. The result was a prototype 'Rolls Royce' solid state switch assembly that was put in a test rig and survived 8 hours of 100% load with the rudder direction being changed every 30 seconds! It is now being fitted to Mick's boat (NC38) in Sardinia. The mark 2 version (available soon) will be smaller but still capable of handling a peak load of 35 amps. So which way do you go? The NECO electric drive units are much better quality than anything on offer today and will give long service provided you remember to check the oil level in the gearbox. There are plenty of NECO spares tucked away on garage shelves and it's easy to upgrade from mechanical relays to solid state switches. Modern digital autopilot steer computers are very sophisticated and capable of fine tuning to suit a particular boat but the difference in the 'ride' compared with the NECO may be indiscernible. In the absence of data bus information from matching instruments, all modern controllers will accept manual speed inputs for their rate of turn calculations in the cruise. In conclusion, it would seem that as long as you keep to the original electric drive unit it's both easy and relatively cheap to modify your existing autopilot system to any standard that suits your budget. We were fortunate in being put in touch with Derek Coventry, the retired development engineer of NECO, who lives near Chichester and runs a repair workshop for these autopilots. We are most grateful for all the advice that he has given us. NB.	Electronics	34-2004	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-34-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-34-2/</a>

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34		NC 44	Gearbox Screech	Following a rather unsatisfactory series of repairs to a gearbox on a late model NC44 the owner asked us for advice on how to proceed with the problem. The Association approached the UK Distributors (Barrus) and, following consultation between all the parties involved, it is now thought that the screech noise produced when engaging forward/reverse gear is caused by too high engine idle speed combined with the drag of a large stationary prop. This gearbox has been removed several times without the manufacturer's authorised agent spotting the probable cause of the noise!	Gearbox noise engine idle speed		Gearbox	36-2005	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-36.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-36.pdf</a>
35		All	Steering Rams	Six hydraulic steering rams have been fitted with new seals by the SeaStar/Capilano/Teleflex agent in Lymington. However two rams fitted to a NC43 were repaired by a local hydraulics firm using non-genuine parts that resulted in both items being removed a second time. The correct seals cost about £50 a pack and can easily be fitted by a competent DIY mechanic with a 'c' spanner. Whoever does the job should fit pipe blanks so as to avoid an oily mess in the aft cabin area.	Hydraulic rams overhaul		Steering	36-2005	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-36.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-36.pdf</a>
36		All	Sound Insulation	The engine sound insulation project involving three boats has been completed. It was decided that Halyard Maritex was the most suitable product (32mm for the engine case and 45mm under floor). Fortunately we were allowed to purchase larger sheets at trade prices and collect them either from Salisbury or from the factory near Ipswich. Total material cost varied between £90 (engine only) and £250 (engine plus under floor). Siltala have done a lot of research in this area and their newer boats seem really quiet in comparison with the older models. We will file a further report on this subject after the trial boats have been away on their summer cruise.	Sound Insulation replacement		Engines	36-2005	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-36.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-36.pdf</a>
37		NC 33 Mk 1	Leaking fuel tanks	Leaking fuel tanks are back in the news. Our President, Ray Dennett, has sent us a diagram showing how to remove the old tanks in an NC33 without destroying too much of the pilothouse floor. Once a leak at the base of the tank has started there is no alternative but to fit a replacement – preferably both tanks if they are more than twenty years old. The tanks are held in place by steel fixing lugs at the rear which are bonded onto the side of the hull. Once cut free the tank has to be lifted over a lower sill and pulled forward. Stainless steel replacements are not recommended as it is impossible to prevent corrosion developing between the sheet metal and the welding material.	Leaking Fuel tanks replacement		Fuel	36-2005	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-36.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-36.pdf</a>
38		NC 38	Water in Exhaust	Nauticat 38 Modifications to Exhaust Many owners of early Nauticats experience problems with water entering the engine while sailing causing hydraulic lock in the back one or two cylinders. Mostly the tough old Ford revives when the water is removed even if attempts have been made to start it. I had to cure this problem on dear old Sea Forge our previous 1975 33' but thought that as our 1980 38' had a water trap it would be o.k. One rough passage past Ushant on the Starboard tack proved me wrong. As we sailed into the Brest Estuary Sue said "humour me and start the engine early". I did, it didn't! Anchoring under sail I usually reserve for more 'handy' vessels than a Nauticat, fortunately Neptune had had his laugh for the day and let us get away with it this time. The danger of this happening on a 38' is particularly the starboard tack as the engine manifold and water trap become lower than the exhaust, which can then dump its contents and any other extra water that can get in through the very low exhaust exit into the engine.	Modified exhaust hydraulic lock	To cure this I took a loop of exhaust pipe to deck level. To achieve this I took the flexible pipe off the exit skin fitting, and joined an extra 2 metres of flexible exhaust pipe to it. I then took this in a big loop towards the port side up under the deck (you have to cut through the locker, if you have one there) and then down to a new skin fitting (90 degree elbow) about 12" higher than the old one and well towards the centre line of the boat. I also added an exhaust flap to make doubly sure. Before I made this modification I talked to several engine suppliers, they all said that the original exhaust diameter was on the small side and to be careful about making this worse by adding to the back pressure but I could see no alternative. To remove and glass in the hole from the old skin fitting is a big and difficult job. As with Sea Forge I filled the skin fitting with epoxy and overlapped the outside with stiff epoxy putty. On the inside I again filled the hole and then fibre glassed over the whole fitting to the hull. Several surveyors have looked at both boats since and have not made any adverse comments. Our next concern was how much water was left trapped in the exhaust? Could it defeat the water trap? We (Ray and Jan Dennett were contributing by then) ran the engine several times and afterwards drained the water from the trap and measured it. It seemed that it would be over ½ full, which I think would have been o.k. However, I then made a further modification which was to remove the drain plug from the water trap and fit an off the shelf ball valve (same thread). With the addition of a piece of stiff wire I can now dump the contents of the trap into the bilge when sailing in rough weather. All the bits required can be obtained from ASAP supplies: <a href="http://www.asapsupplies.com">www.asapsupplies.com</a> or Telephone 0845 1300 870. I will be glad to answer any questions anyone may have. We go back to Sardinia on 4th May for 2 months to pick Chatelaine up and cruise over to Sicily with a view to getting over to Corfu/Preveza by the beginning of July, but can be contacted by e-mail on <a href="mailto:chatelaine60@hotmail.com">chatelaine60@hotmail.com</a> . (We aim to check the e-mail at least once a week but you could text our mobile to warn us to check it), or any urgent query to our Italian phone number	Engines	36-2005	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-36.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-36.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
39		NC 331	Propeller Shaft Coupling	We have had another disturbing report of a loose propeller shaft coupling in a new delivery NC331. The bolts that secure the gearbox adaptor plate to the Centraflex type coupling were inserted without the application of thread locking fluid. It is recommended that the coupling is physically jerked from side to side and any detectable play be immediately investigated	Shaft coupling loose		Propeller	37-2005	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-37.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-37.pdf</a>
40		NC 331	Radome Fitting	A member reported that a friend experienced radome securing bolts dropping onto the deck. On examination of his own new NC331 it was found that these bolts were only finger tight. Raymarine say that they have no experience of this problem but it is worth noting that some mounting platforms are not perfectly flat. The base of the radome must not be distorted so it is important for installers to use spacers and tighten to the published torque. Finger tight is definitely unacceptable.	Radome fitting loose		Hull	37-2005	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-37.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-37.pdf</a>
41		NC 44	Chain Plates	Early build NC44 reported chain plates visibly lifting from the deck whilst on overseas passage. Boat docked near to Nauticat Agent and investigation still in progress but overstressed rigging is suspected. Siltala 'beefed' up these anchor points on later models so we can assume that this potential problem is confined to a small number of pre 1985 boats.	Chain Plates weak lifting		Rigging	37-2005	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-37.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-37.pdf</a>
42		NC 33 Mk 1	Loose Fan Belt	NC33 reported alternator charge light illuminated due to loose fan belts (2). When tightening the belts it is necessary to loosen all the alternator securing bolts before inserting a 45cm/18" metal bar between the alternator casing and the engine block. Correct tension is achieved when the belts can be finger twisted through 90 degrees at the mid point between crankshaft and alternator pulleys.	Fan Belt adjustment		Electrics	37-2005	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-37.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-37.pdf</a>
43		All	Hydraulic steering vent	The post 1997 models had a long awaited modification to the fluid reservoir on the upper helm pump. On the earlier boats there's no venting of the system to take account of the expansion of the fluid with changes in temperature. In addition, when topping up it's almost impossible to gauge when the reservoir is two thirds full. Nauticat solved the problem by welding a 6mm spigot 2/3 up the side of the stainless steel reservoir and leading a small diameter reinforced plastic pipe down to a bottle under the rear pilothouse step. In the conventional yachts the pipe is lead down to any lower point were the bottle is easily accessible.	Hydraulic vent modification	To start this modification the rear upper helm pump is exposed and the fluid is siphoned off until the level is about 20mm below the top of the yellow/silver pump casing. Use a dip stick and wait about 15 minutes for the round reservoir 'can' to fully drain before removal. To prevent air entering the system do not rotate the helm shaft again until the fluid is replenished. Remove the deck fitting and connecting pipe before unscrewing the reservoir, making sure no debris enters the pump casing. Weld a short stainless steel spigot 2/3 up the side of the can and angled 45 degrees down. Thoroughly wash out and dry the reservoir before reinstalling with PTFE gas (thicker) thread tape. The chosen reinforced clear plastic vent pipe should fit tightly onto the spigot and further clamped if necessary. The deck fitting must be bedded down on white Sikaflex and the top edge of the short connecting plastic pipe underneath must be wiped round with clear silicone sealant – not Sikaflex as it's an adhesive sealant. Pass the new vent pipe down to the area under the rear pilothouse step via a hole drilled at 45 degrees just above the collector bottle. We used a Sainsbury's fresh orange juice bottle. Drill a hole in the cap to accept the vent pipe and an additional small vent hole beside it. Refill reservoir until fluid is seen to be running down the plastic pipe into the bottle. Job almost finished! The following problem is common with hydraulic steering systems and is not confined to Nauticats. Bear it in mind when reinstalling the filler deck fitting: A serious fault develops when the system fluid level seems to rise without being topped up. This is caused by water passing under the base of the deck filler fitting and into the reservoir via a poorly sealed connection. Water (being denser than system fluid) passes down the plastic pipe between the base of the upper helm and the top of the lower helm. The resulting white emulsion can migrate to the entire system so it's worth checking for this problem by shining a bright light through the lowest point of this clear plastic pipe run. After modification it's easy to see the overflow fluid level in the plastic bottle.	Steering	38-2006	Not online

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
45		All	Ford spares	Mermaid Marine (mermaid-marine.co.uk) is a well known and long established mariniser of the same Ford core engines that were used by Gustavson/Lehman/Sabre. They tell us that they have a good spare parts stock but as we said in a previous issue, cylinder heads, crank cases and crank shafts are only available from breaker's yards. They now offer a replacement marinised JCB engine that precisely fits our boats at a discounted price of £6700 inc VAT for the 4 cylinder model which includes engine mountings and instruments. It is compatible with the existing Borg Warner gearbox and is dimensionally the same except it is 30mm higher at the header tank. Whilst this engine is ideal for the NC38s and above, the lighter and smaller turbo Yanmar 75 + gearbox at a discounted price of £7700 inc VAT is a much better choice for the NC33s. This Yanmar engine is original equipment for the NC331.	Ford spares suppliers		Engines	38-2006	Not online
46		NC 331	Engine starting	In our last issue we included an account of engine starting difficulties with an NC331. This is a timely reminder of a problem that goes back at least twenty years. Nauticat have long used a starter switch made by Telemecanique that comprises a knob, frame and two plug in contact modules. Part numbers ZB4 BG08 - keyswitch - ignition, ZB4 BD8 - non keyswitch - ignition, ZB4 BG2 - keyswitch - 2 position ON/OFF used for hidden master, ZB4 BZ101 frame for switch modules, ZBE 101 - engine start module (green spot) and ZBE 102 - ignition ON module (red spot). It's the cheap little engine start module that gives us the problems. Easy to change and worth carrying a spare but do check the code on the side of your existing start module as there was a slight redesign in the late nineties. Parts are obtainable from industrial switchgear suppliers located in most large towns.	Starting relay failure replacement		Engines	38-2006	Not online
47		All	Exhaust Mufflers corroding	Stainless steel exhaust silencers/mufflers fitted to late model Nauticats are corroding around the lower welded seams. We've had two reports affecting boats less than six years old and since the design has little changed in the last twenty five years it's reasonable to assume that there's a problem with quality. It's possible to affect a good repair by cutting off the base just above the original weld, move the drain plug up and weld on a new circular base using 316 grade stainless steel. See Yellow Pages - Sheet Metal Fabricators - Stainless Steel. The lower drain plug should always be removed during winter lay up.	Exhaust mufflers drain plug		Engines	38-2006	Not online
48		All	Cookers	Cookers seem to be giving up the ghost at an alarming rate. The narrow width of the 'slot' in Nauticat galleys (503mm for a 1991 NC33) severely restricts the choice of replacement models, especially if you're looking for three rings. The original cookers were made in Finland and spare parts are no longer available. It's possible to re-make the aluminium burner rings and the oven flame failure sensors are easily obtainable from plumber's merchants. If you have any spare parts, especially burner rings, or an old cooker please let us know	Cooker replacements		Domestic	38-2006	Not online
49		All	Engine spares	At the moment spare parts are available for the marinisation components of Gustavson and Lehman/Sabre engines and Ford still supports everything for the Dorset 2712E(4)/2715E (6) and Dover 2722E (4)/2725E (6) except major castings such as cylinder heads, blocks and crank shafts. These later parts are easily obtainable from scrap yards for reconditioning. We see no immediate problems but it's by no means certain that critical spares will be available in five years time. To improve support our Ford supplier has been changed to Hendy Power, Southampton Road, Cosham, Portsmouth PO6 4RW Tel: 02392 322900 (see new Parts Suppliers List 19).	Engine Spares supplier		Engines	38-2006	Not online

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
50		NC 33 Mk 1	Lifting Points	Following a recent incident when lifting out an NC33 all owners of fin keeled boats are advised to mark the aft lifting point (30cm forward of the aft end of the keel). Any sign writing firm will make the black triangles and 'Lift Here' sticky labels. The boat in question was lifted twice with the strop under the propeller shaft and this resulted in both the shaft and P bracket being replaced.	Lifting point marks		Handling	38-2006	Not online
51		All	Starting control	I keep Patience on a swinging mooring on Chichester Harbour. I have a Nauticat installed solar panel that seems to work well and battery charge status has not been an issue. I use the boat throughout the year as the mooring is at the bottom of my garden. Over the Christmas/New Year period my son then I tried to start the engine during a period when the temperature was around freezing. Once a warm front passed through we tried again; she started first click without any repeat of the problem, until over Easter. Once again the ambient temperature was about freezing and like previously I checked battery condition and electrical connections. This time I plugged my Honda generator into the shore power inlet and left the boats warm air heating running for about two hours with the engine compartment open. I returned to the boat and the engine once again started first click. Over the next couple of days the problem reoccurred with the still low ambient temperatures and short periods of boat heating resolved the issue.	Starting Control volts drop	After the holiday period I contacted my local Yanmar service engineer, who suggested I got an electrician involved. The sparks had come across this problem with other Yanmar engines and said there was a simple modification which should resolve the matter. The Yanmar starter solenoid (high current switch) needs 12v to connect the starter motor directly to the battery. If the battery is cold and there's a long length of wire between the battery/starter switch/starter solenoid, then the voltage drop in the boat's wiring loom will prevent starter motor activation. The electrician installed another relay next to the engine that connects the battery directly to the starter solenoid coil. Since this new relay is less sensitive to a voltage drop it will activate the starter motor (via the normal start switch) in all temperatures'.	Electrics	38-2006	Not online
52		All	Emergency Tiller	Safety warning notice – Emergency tiller will not fit over the rudder stock immediate check advisable. The following report concerns a late model NC331 but the error could be present throughout the fleet. Please report back to Technical Support if your boat has the same defect. Report: I can confirm that the use of the emergency tiller arrangement apparently provided by the builder would not be possible without modification. The rudder stock has two keyways - diametrically opposed fore and aft, i.e. on the stock centre-line. The after keyway houses a 10 mm square key connecting rudder stock to crank of steering cylinder. The for'ard keyway has no key fitted. The welded boss of the cranked tiller has one keyway only ... corresponding with the empty keyway of the rudder stock. It would therefore seem that the only way the tiller could be utilised in an emergency would be to transfer the one key provided from the rear keyway to the for'ard one ....clearly an impracticable solution in an emergency. Had both stock keyways been provided with keys the tiller, having only a fwd keyway, would not accommodate the after key. It would seem that the tiller boss should have two keyways or, alternatively, the single keyway in the tiller boss should have been facing aft. What, perhaps, has happened was that the tiller boss, already machined with its keyway, was then welded to the tiller arm 180 degrees out!!! If this did occur it is possible that a similar mistake was made to other tillers. I think the best solution to my problem is to cut the boss from the tiller, rotate it 180 degrees and re-weld. I was fortunate to discover this defect during a pre-season check of 'emergency' items. The previous owner must have been unaware of the potential problems.	Emergency Tiller wrong assembly		Steering	40-2006	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-40/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-40/</a>
53		All	Propellor Replacement	There have been 3 propeller replacements since the last issue. One was due to an out of balance problem caused by an incorrectly machined taper at the centre of the boss. The other two have suffered galvic erosion, possibly due to the marina 230v AC mains 'earthing' via the boat. Galvic isolators are being fitted and it is worth checking two further items associated with this type of problem: The propeller shaft flexible coupling must be fitted with a braided copper earthing strap and the boat must not be moored with the propeller near a steel pile. These reports have been particularly valuable because they contained a wealth of information on propeller specifications, suppliers and trade prices.	Propellers galvoic isolators		Propeller	40-2006	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-40/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-40/</a>
54		NC 33 Mk 1	Sound Insulation	Halyard 35mm sound insulation has been fitted behind the perforated aluminium sheet of the engine box and 45mm thick insulation fitted under the pilothouse floor. Early indications are that engine noise has been reduced by about 20% but this will be confirmed after a long summer cruise.	Sound Insulation Halyard 35mm		Engines	40-2006	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-40/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-40/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
55		All	Battery Charges & Inverters	Battery chargers and inverters. Victron Energy BV invited Technical Support to a seminar on the latest innovations with marine electrical power systems. We liked the concept of combined charger/inverters that allow smaller generators to accommodate power surges when appliances are initially switched ON. The generator supplies 230v AC to the battery charger and boat domestic outlets. If demand exceeds supply, battery charging instantly stops and the battery/inverter provides the extra power. Many applications within our fleet and we have all the supporting technical data. <a href="http://www.victronenergy.com">www.victronenergy.com</a>	Battery Charges Inverters suppliers		Electrics	40-2006	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-40/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-40/</a>
56		All	AIS Trail Class B	Automatic Identification System AIS National security agencies have become increasingly alarmed at the implications of leisure craft moving freely between countries without identification on the high seas or surveillance on arrival at minor coastal ports. This has prompted an urgent review of Class B AIS development as the only feasible way of monitoring these movements. The UK Marine Coastguard Agency has taken delivery of 10 pre-production sets for trials in the Solent this summer. Class B AIS is a small 3W transmitter, 2 receivers and an inbuilt GPS. It transmits on a frequency of 162MHz which is very close to the marine VHF channels that are around 157 MHz. Details of the boat and MMSI are incorporated in each transmission. Power consumption is approximately 12v 0.5A continuous. Large ships and land based stations can see you in all weather conditions but the range of reception is limited by the 3W power output. The unit has a row of coloured 16 LEDs that confirm the operational status of the system. Size 190mm x 135mm x 83mm (L x W x H). The MCA has accepted the Nauticat Association's offer to install one unit in a boat operating in the Western Approaches and this trial should commence in June. Falmouth and Corsen (Brittany) Coastguards have been informed of our movements as we will be the first leisure craft in Europe to be AIS Class B equipped. The equipment is being loaned by manufacturers and our Association will provide an article to be published in the Yachting Press. Unlike DSC radios, Class B AIS is going to be a legal requirement for those wishing to cross the English Channel and it's likely to happen quite soon.	AIS Class B Trial		Electronics	40-2006	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-40/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-40/</a>
57		NC 33 Mk 1	High Water temperature	Engine water temperature higher than normal. The cause of higher than normal water temperature is usually a faulty thermostat or blocked tubes in the main raw water heat exchanger. In this case it was found that the Lehman 90 did not have an engine oil heat exchanger fitted. Local engineers in the Chichester area said that this was common but Sabre confirmed that these engines were never assembled without an engine oil heat exchanger and it was impossible to control the oil temperature without one. Oil is used to carry heat away from the bearings and engine casing. Suggest all relevant owners carry out a check during the winter. Test data (performance limits) for the Lehman 90/Sabre 90: Engine oil press 58/70 psi @ 2600 rpm. Min engine oil press 35 psi @ 750 rpm. Engine water temp 80-88 deg C. Gearbox pressure 140-185 psi @ 2600 rpm (about 145 psi @ 1800 rpm).	High water temp gearbox heat exchanger		Engines	42-2007	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-42.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-42.pdf</a>
58		All	Rudder Shaft Gland	Every boat has a grease nipple fitted to the rudder shaft - inside the hull below the gland seal nut. Some earlier NC 40-52s had problems with the fibreglass bonding between stainless steel supports welded onto this tube and the sides of the hull. This required additional strengthening during which fibreglass matting buried the grease nipple and subsequent owners did not know it was there. The shaft should be filled with waterproof grease until it oozes past the upper gland seal and appears externally in quantity.	Rudder Shaft Grease nipple		Steering	42-2007	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-42.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-42.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
59		All	Diesel Tank	We have had a larger than normal number of diesel tank replacements during the last six months. It takes time to remove the tanks but the job is straight forward and replacements easy to fabricate (see Yellow Pages – Sheet Metal Fabricators – Stainless Steel). The latest is an NC 52 which has very large tanks built into the internal structure and it's physically impossible to remove them in one piece. Each has to be cut out and replaced by 2 individual units (per side) which will result in reduced total capacity. We note that that the new NC 381 is fitted with stainless diesel tanks – a first!	Diesel Tanks Replacement		Fuel	42-2007	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-42.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-42.pdf</a>
60		All	Electric Winch	Winches report. "We have the Maxwell Nilsson M-N V1000 (that's the Vertical version) windlass on our NC40. It might be useful for owners to note that, although this windlass is no longer produced and the Maxwell Nilsson partnership has ended, many of the spares are still available from the new company - including gears, seals, bearings, even the emergency winding handle (very expensive we thought) and most importantly, the 12v 1000w motor. This motor replaces the original Lucas model and is made in Italy - many motors are these days. It requires an adaptor kit – which I ordered and this came fitted to the motor. The whole transaction was pretty slick from order to delivery in 5 days. This is extremely quick (UPS) and beats many of the UK suppliers I have used thus far. Contact details Debbie at <a href="http://www.jamesnilsson.com">http://www.jamesnilsson.com</a> ." Technical note: Most winch and bow thrusters motors are modified auto engine starter motors and can be easily rebuilt. We have a commercial contact that makes electric motor brushes of any dimension.	Winches Electrical Maxwell Nilsson		Electrics	42-2007	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-42.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-42.pdf</a>
61		All	Gas water heater	Request for information. "Our recent insurance survey has recommended that the entire gas system be examined by a Corgi Registered gas engineer. It adds: "we also noted that Vessel was fitted with a Rinnai instant water heater flue were not considered to adequate standards for marine use." The water heater was fitted probably 6 or 7 years ago replacing a "Paloma" model (from memory) and using the existing flue arrangement through the side of the wheelhouse. I would be interested to know whether the older Nauticats fail inspection due to this type of installation and if they do, what is the solution to hot water on tap? I particularly like the current system as it provides instant hot water without having to run the engine and doesn't require a storage tank. Can the flue be modified in any way? I would be grateful if you know of any other members who may have encountered this problem and any potential remedies".	Water gas heater corgi check		Domestic	42-2007	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-42.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-42.pdf</a>
62		All	Fridge re gass	NC Fridges. The type of top loading fridge units fitted by Nauticat can be re-gassed by any refrigeration engineer. The gas is type R12 at 0.5 – 0.75 bar. They sometimes loose gas through slack couplings between the compressor and evaporator (freezing bit).	Fridge re gassing		Domestic	41-2006	Not online

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
63		NC 33 Mk 1	Fuel Tank Replacement	I bought my 1987 Nauticat 33 in Singapore a couple of years ago. She had been more-or-less abandoned several years before by her Japanese owner, who had her from new, and she was in a pretty sorry state. I had a fair bit of major work done on her in Singapore, and did a lot more myself before I felt comfortable enough to tackle the 400 – odd mile journey from Singapore to Langkawi, a Malaysian archipelago just south of the Thai border, which is where I now keep her. As it happens, she covered the journey non-stop, mostly under power at an average speed of 5.5kts which I was quite happy with. During the time I've owned her, I have been a bit concerned at the amount of muck and water coming from the fuel tanks, and the fact that the starboard tank seemed to leak when I was sailing on a port tack, suggesting a hole at the top of the tank, or a leak where the filler hose connected to the tank. Unfortunately it was impossible to access or even see the top of the tanks as they were only an inch or two below the floor boards. I have two Racor filters fitted, which enable me to keep a close eye on what's emerging from the tanks, and during a recent trip from Penang, again under power (the wind is very fickle in this part of the world), I ran low on fuel in the port tank, and one filter became totally blocked. This prompted me to finally do something about the problem. The two tanks, by the way, are located either side of the engine room below the wheelhouse floor, and each has a capacity of around 315 litres. I'm lucky that Graham, a British friend here in Langkawi is a highly trained engineer and, as I knew the removal of the tanks would be beyond my limited skills, I enlisted his help. We decided to try to remove the old tanks by cutting them out but before that I contacted the Nauticat Owners' Association for any advice they could provide. They told me that the backs of the tanks tanks were secured to the side of the hull by steel straps, and these would have to be cut. We would then have to remove a floor beam above, and a fibreglass "lip" at the base of each tank to enable the tanks to be pulled forward and	Fuel tank replacement information		Fuel	41-2006	Not online
64		NC 33 Mk 1	Rudder Failure	Safety Warning: Late 1970s long keel NC33. Could affect all long keeled models of similar age or later. We have a report of total rudder failure due to the weld failing between the stainless steel rudder stock tube and the flange (4 bolts) directly above the rudder. This warning refers to the upper flange section. The rudder remains secure but is free to impact with the propeller. Suggested course of action: 1. With the boat out of the water check for movement between the rudder tube and the upper flange section. Also check for sideways movement at this point. In the water be aware of unusual rudder slack or vibration. Following steering failure stop engine. Do not attempt to reverse under power	Rudder weld failure		Steering	43-207	Not online
65		All	Teak Decks	Teak Decks: We were asked to comment on the alternatives to a complete renewal of teak decks. The subject was put to the floor at the AGM and the general feeling was that it was better to initially increase the depth of the screws, followed by deck replacement as a last resort. Teak decking sits in a recess which is greater than the thickness of other teak 'look alike' materials. If a plastic substitute is used then it must be laid on plywood to achieve a finish which is level with the fibreglass sides of the existing deck moulding. The time required to create a sufficiently flat surface to bond the sheet plywood to the fibreglass base would increase costs to the point where real teak was nearly the same price. More to the point, a Nauticat is worth somewhat less if it doesn't have a teak deck. The teak planks are secured with flat 'pan headed' screws hidden from view by 10mm diameter plugs. The following procedure is very common: 1. Remove the teak plug when it is seen to be worn through or split. 2. Replace the existing 'pan headed' stainless steel screw with a counter sunk version of similar or slightly shorter length. Try to use A4 (316) grade screws. 3. After countersinking the existing hole and vacuuming out the debris, squeeze sealant into the hole before inserting the new screw. This will prevent water ingress through the fibreglass. 4. Renew the 10mm teak plug using waterproof glue and avoid too much pressure as this can split the existing deck.	Teak Deck replacement		Hull	43-207	Not online

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
66		All	Gas Installation	The Surveyor said that the installation did not meet the 2005 requirements. The gas bottle should be completely enclosed in a fireproof container with steel lid. The gas pipe can only go through a bulkhead via a secure fitting – not classed in. The drain hole must be of a minimum bore. Of course there is no legislation which makes this mandatory on a private boat but it is mandatory upon manufacturers, charter vessels and approved installers. Paloma have ceased production and Rinail's current model doesn't meet the requirements but they are working on another model that is compliant – side venting I believe, mainly for caravans. Strangely, the regulations are less stringent for an inland waterways vessel! I decided to go ahead anyway and fitted a Rinail system without difficulty. One small snag. The mushroom vent which prevents spray. I'm sorry rain, entering the flue can't be screwed down completely so you can't cut off the exhaust from the heater. Very sensible but no good at sea. I've used a short piece of plastic tube from a plumber's merchant to bridge the gap and when we want to use the heater, must remember to unscrew the cap of the mushroom sufficiently. The system works very well and I have total confidence in it. Note from Technical Support: Do check your insurance policy as they are very specific on the subject of gas installations. Most pre 1995 boats don't comply with current regulations.	Gas water heater Rinail		Domestic	43-207	Not online
67		All	Fuel Filters	We have chosen the subject of blocked diesel filters/water separators for this issue. It is more likely to occur with older fuel tanks that have built up rust and biomass deposits. However an uplift of contaminated diesel will affect boats of any age and the situation is not helped by the end of the draw off pipe being less than 4cm from the base of the tank. Last month an NC44 was off rocks on a lee shore when the engine slowed down and finally stopped. The tank in use had unintentionally been allowed to fall half way into the red reserve band and this caused sediment to block the single primary filter. Following a desperate effort to change the filter the engine was restarted and the boat proceeded to the nearest port before falling again at the rocky entrance. In another incident, an NC33 engine stopped in the Channel Separation Zone very close to a bulk carrier. Both situations could have been disastrous. There is a long history of diesel filter/water separator blockage incidents with leisure boats and we have certainly had our share of the problem. We know that the answer is to fit a 'duplex' filter with a changeover lever so that a clean filter and different fuel source can be selected in minutes, but the cost seems high if you haven't experienced the problem.	Blocked filters	However, you may find the following information useful. There are three ways to modify the original single filter installation: 1) Fit a bypass pipe round the existing filter with 3 valves to allow the filter element to be changed whilst the engine is running. A cheap option but contaminated fuel will pass to the engine fuel filters and the outcome could be final! 2) Fit a 'duplex' assembly and be able to change the contaminated filter whilst the engine is fully protected and running. 3) Convert a single filter to a 'duplex' assembly. We asked Separ UK to look at our problem and they came up with a modification kit for post 1992 square Separ filters which are still in production. It includes all parts to make the latest SWK2000/SIU assembly but incorporates the existing filter. Excellent special price and well worth considering for Nauticats built after 1992. The American Racor and German Separ filters are very similar and perform to the same technical standard. Both are well made but the Separ does not have the 'filter serviceability gauge' – with the engine running it shows when the filter needs changing. No tools are needed to change the filter on the Racor unit whereas the Separ filter cover is held down by 4 small screws. Specify 'petcock drains' when ordering Racor units. Filters for both products must be 30 Micron. Don't forget to specify the size of copper pipe being attached to the inlet/outlet ports so that the correct fittings are included.	Fuel	44-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-44-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-44-2/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
68		All	VHF Aerial	How good is your VHF aerial ? Probably like most owners we are minimal users of our VHF radio. Its main use is to hear coastguard weather reports and to contact ports and marinas when arriving in order to get a berth. Sometimes it is a source of amusement when listening to users being 'told off' for inappropriate use by the coastguard. However I had a suspicion that our reception was not as good as it should be. This was confirmed on a recent sailing club long distance cruise when we couldn't hear both ends of a conversation between 2 other boats whom we were between on the water and who both were just about in visual range. Later in Fowey, our mutual destination, tests confirmed that other boats could easily call up Falmouth coastguard, whilst we couldn't. As a result another skipper loaned us a temporary aerial which we rigged up on the spreaders using a flag halyard. This immediately enabled us to call the coastguard and gave us much better reception than we had been used to. Further proof came when about a month later we were over in France. We had been told that with a good aerial we should be able to hear the UK coastguard when just off the Cherbourg peninsula (about 50 miles). Sure enough with the temporary aerial we picked up both Solent and Portland coastguards when a few miles north of Barleur. This is something we had not experienced previously even though the boat is only 5 years old and we have had it for 3 years ourselves.	VHF Connections	Further investigation revealed that Nauticat, on modern boats, generally use a Glomex 109 GRP aerial at the masthead which has on its base a standard SO239 VHF female connector. This is connected to a 10 mm low-loss coaxial cable which is terminated both ends with a PL259 male connector. This cable comes out somewhere inside the boat under the mast where it connects to another similar cable going to the VHF radio set. Various tests were done on the Glomex aerial and cable and these showed a low SWR reading and a non-standard d.c. impedance (sorry to those readers for whom that is gibberish!). I talked to various people, including marine electronics installers, and the likely problem Windsor was assumed to be a fault with the connector and/or the cable at the masthead due to water ingress (the connector on my boat had no protection, not even the plastic cover provided by Glomex - probably because it is made for a smaller size cable). However when the installer went up the mast he checked out the cable and found it was fine. He then removed the aerial. On the Glomex the main body cover unscrews and when he did this out came lots of water. No wonder we had bad reception with water and corrosion over the coil and connections inside the aerial! It turns out that the UK distributor for Glomex does not stock the RA109, it is only available on special order. Many chandlers sell the RA106 model which looks similar but has a special 'solderless' connector on it made for its accompanying specially terminated coaxial cable. As a result my supplier obtained a Shakespeare 5215 aerial which also has the SO239 connector and would fit on the Glomex masthead bracket. The good news is that the new aerial is fully encapsulated to stop any water penetration. Out on the water we are now hearing much more VHF traffic and, since we use a splitter on our aerial for AIS reception (a proper one designed for the job, I should add), we are now 'seeing' many more big ships on our SeaPro PC display. Glomex aerials are supposed to be guaranteed for life - I am still waiting to hear about what that means from the UK distributor. The reason for writing this article was to bring to	Electronics	45-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-45-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-45-2/</a>
69		NC321	Fuel Tank Leak	A member reported that his late model NC321 had developed a leak from the polythene diesel tank when heeling in rough seas. This was caused by separation of the joint between the filler neck and tank due to poor design and workmanship. We advised the owner to contact our two listed UK tank manufacturers for technical advice on the correct type of glue to repair the joint. The fuel gauge sender unit leaked as well!	Fuel Tank leak neck joint		Fuel	45-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-45-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-45-2/</a>
70		All	Door Lock failures	Late model Nauticats seem to experience an unusually large number of door lock failures. These stainless steel locks are made by Mobella of Sweden which is in turn owned by Southco USA (www.southco.com) and their European stock holding happens to be in the UK. Out Parts Suppliers List has all the details on page 8 and it's definitely cheaper to buy direct.	Door lock replacements		Fittings	45-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-45-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-45-2/</a>
71		All	AIS	It was interesting to read the article on AIS in the last issue written by David Silke. He is absolutely right to highlight the potential problem of large numbers of Class B transmissions in a small geographical area. All Class A and B units have TX Off switches to avoid piracy on the High Seas. Probably a good idea to transmit when crossing the Channel and go to RX only when it's not advantageous for other ships or the coastguard to see you. There are further system deficiencies that have only come to light since David wrote his article.	AIS Class A & B Data Specification	Due to a change in the technical specification for Class B, the static data (name, type of boat, length and draught but not MMSI) is sent in a different part of the message than that used by Class A. NASA Marine Instruments spotted the problem and changed their chip set during June 2006 but did not record the product serial number when the first units were modified. It's much to their credit that they now provide an easily (DIY) installed new chip for under £9. Having achieved the correct decode from the receiver we now find that virtually all PC software and plotters can only show static data from Class A signals. Garmin are about to release a fix for all their products but many PC software suppliers are pre-occupied with trying to run existing programmes on Windows Vista. The MCA have all their AIS software written by SAAB of Sweden but the Class B update is months behind schedule. Commercial shipping will only see the complete Class B message if their equipment is less than two years old. So there it is in a nutshell!	Electronics	45-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-45-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-45-2/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
72		All	Stern Gland leaking	<p>One day in early May, we took our Nauticat 33 "Minimum" out for her first shake-down sail of the season. After a pleasant day in the Solent we returned to our berth in Haslar creek, secured the boat and made ready to go home. My last act before leaving the boat was to switch on the bilge pump to check that the bilge was dry. I was somewhat taken aback when, instead of the usual short gloop of water, a torrent issued from the pump discharge and continued to do so. All thought of going home was abandoned and up came the wheelhouse floor to reveal the bilge level up to the bottom of the trusty Sabre engine. In a 33 this is a lot of water! I estimated about 40 gallons was in the bilge and a quick "sip" soon revealed it was salty. After pumping out the bilge, investigation revealed that the stern gland was leaking at any shaft revs above idling speed. At idling speed or out of gear the shaft seal was watertight, but any increase in speed and a substantial spray of water issued from the Deep Sea Seal. The following day the boat was hauled out of the water for repairs. When I had bought Minimum in Holland 18 months earlier, I had been quite pleased to find that she was fitted with a Deep Sea Seal rather than the Nauticat standard stuffing box seal. Now I was not so sure! I was used to Deep Sea Seals as they were fitted to the submarines in which I had served in the Navy. Thank goodness I had never suffered a catastrophic failure, such as I now appeared to have in the Nauticat! Moreover, I decided that I really didn't want a seal that could fail in such a spectacular way. After a very helpful discussion with Richard Bartlett, I decided to try and source a stuffing box type seal to replace the Deep Sea Seal.</p>	Stern gland failure deep sea seal	<p>Meanwhile, I uncoupled the shaft, removed the Deep sea seal and threw it away! As I had also noticed some shaft vibration when investigating the shaft seal leak, I examined the Cutless bearing in the P bracket and as it looked fairly worn I decided to renew that as well. This proved a big problem. The cutless bearing was retained in the P bracket by a recessed grub screw, which I found and removed quite easily. However, the bearing was an interference fit in the housing (P bracket) and would not be removed. After further discussion with Richard, I tried using a dummy bearing to push the cutless bearing out without success. I manufactured a press using angle iron and threaded rods. The design and construction of this tool attracted many complimentary comments but it still didn't work and neither did any combination of the tool and hammer blows with increasingly large hammers! Eventually, and reluctantly, I decided to remove the P bracket as the shaft cannot otherwise be withdrawn due to the presence of the skeg which gets in the way. After bolstering my courage with a couple of beers at lunchtime, to my surprise the P bracket came off relatively easily – also to the surprise of my octogenarian friend who had offered to hold the P bracket whilst I undid the 4 securing bolts in the after cabin bilge – it was very heavy! I was then able to remove the P bracket complete with the cutless bearing from shaft and take it to the workshop where I was able to cut the cutless bearing out with a hacksaw in the traditional way. It appeared to have been sealed in with "Loctite" or some similar compound and I suspect it was the original fitted bearing from build in 1993. The new Cutless bearing fitted quite easily but snugly and tight enough for comfort. I drilled and tapped a second grub screw hole in the P bracket to supplement the single grub screw that I found when dismantling it. The P bracket was then refitted to the boat, the bolts being a nice tight fit to locate it accurately. P Bracket re-fitted with new Cutless bearing (before fairing to hull with epoxy putty) in the meantime, my search for a good old fashioned stuffing box and greaser had revealed a couple of suppliers but the whole assembly was quite expensive (about</p>	Propeller	46-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/</a>
73		All	Hydraulic Steering	<p>NC hydraulic steering: Whilst under sail the helm started to behave erratically and required 3 turns to hard a' port and eleven to hard a' starboard. To makes things worse the starboard included 'a dead band' where the rudder did not move at all (the rudder responded to the autopilot normally).</p>	Erratic control, valve	<p>Sometime later an engineer removed the aft helm pump unit and stuffed rag into the pipes to prevent oil leaking out. The helm pump was 'checked' and reinstalled but the problem persisted and it now became impossible to bleed air out of the system. Both pumps and the hydraulic ram were sent the Hypro Marine for a thorough service and they eventually found bits of rag or J cloth in all three units. On reassembling the system the fault persisted and so the autopilot electric pump was removed and returned to Raymarine for service. A bent spring in the starboard valve was replaced after which the steering and bleeding faults disappeared. We can only surmise as to the sequence of events but it is certain that the fault in the autopilot pump was obscured by the fact that it functioned normally when responding to autopilot commands. If you experience a similar problem it is worth remembering that there are valves linking port and starboard sides of the system in both helm pumps and the autopilot pump. Initial action should be to turn off the fluid isolation cocks either side of the autopilot electric pump. Interestingly, the aft helm pump had a two way lever (sailing valve) that provided either normal operation or alternatively, feedback from the rudder with both helms rotating together. It was hidden from view behind the panel. This report refers to the Sea Star/Capilano/Teleflex system 1250V/1275VS (yellow) helm pump units.</p>	Steering	46-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/</a>
74		All	Stiff Steering	<p>Steering becomes stiff over a period of years: A timely reminder that we have experienced a number of cases of increasingly stiff steering in all NC types. If the helm cannot be easily turned with one finger then suspect the hydraulic steering ram is slowly ceasing up. Some Capilano/Teleflex rams have a plastic seal carrier moulded onto the centre of the piston rod and this material seems to absorb automatic transmission fluid. The plastic expands and eventually jams the two seals tightly in the tube. Rectify the fault by dismantling and getting an engineering firm to turn down the plastic seal carrier and equally the grooves that the seals sit in. New piston rods are very Expensive.</p>	Steering ram seals		Steering	46-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
75	2015	All	Bent Propeller	Propellers and propeller shafts. Following another bent propeller in an NC38 (Greece) we have negotiated a special Association price for NCs 33/38/40/42/44 of £400 + VAT for a balanced class 1 (best) replacement made from NiBrAl. Duncan Propellers Ltd is a well established manufacturer making large ships propellers as well as those for small boats. They also produce shafts to order at a most competitive price. www.duncanpropellers.com or sales@duncanpropellers.com Original propellers fitted by Nauticat have the word 'Federal' stamped on the hub at the root of one of the blades. www.michiganwheel.com	Propeller bent replacement		Propeller	46-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/</a>
76		All	Switch & Circuit Breaker	NCs with combined switch/circuit breakers in the pilothouse panel. These were installed during the eighties and early nineties. Replacements are available at £6.72 + VAT and postage from Abacus Group, who are the UK distributors for American Airpax switches. Contact Alex Shawcat, Abacus Group, Encombe House, Hargreaves Way, Scunthorpe, DN15 8RF Tel: 01724 408 700 Airpax UK 01903 209 099	Electrical switches circuit breakers supplier		Electrics	46-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/</a>
77		All	Toilet Odours	Odours from toilet hoses. Jabsco recommend 10 slow hand pumps of the toilet flush for each metre of discharge hose. On an NC33 the forward toilet requires 20 pumps to conform to this rule and we have experienced no bad odours after 10 years of use.	Odours Toilets Jabsco		Domestic	46-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/</a>
78		All	Engine Spares	Gustavson and Lehman engines: Just a note to remind owners that these engines remain fully supported with spare parts. Boso Motor AB (Stockholm) support the Gustavson marinisation package and although their parts are expensive at least everything is still available. Lehman/Sabre/Perkins are now part of Caterpillar Inc.	Gustavson Lehman spares		Engines	46-2007	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-46-2/</a>
79		NC 33 Mk 1	Propeller eroded	NC33 early long keel model had been laid up ashore and all maintenance completed, including new batteries before lift in. The boat was then left for a month on its pontoon berth with the battery charger switched on. It was then taken out for a short run but things didn't seem to be going according to plan. The boat lacked speed and the propeller vibration was considerable. After returning to port a diver reported that only 1/3 of the propeller remained and the rudder was similarly eroded. The owner was indeed fortunate, as he had been in exposed waters with a deep Atlantic swell but what he didn't know at the time was that his rudder was to fall off when the boat was lifted out! Propeller after 4 weeks in the water. Note electrolytic erosion of face and complete separation of lower mounting bracket. The top flange had almost disappeared. Further investigation revealed that the battery charger had an internal failure causing it to revert to full charge rate. Although the batteries boiled there was still enough capacity left to start the engine. An internal short circuit in the charger resulted in a connection between the marina 240v mains earth and the electrical bonding of the hull. Once the 'pear shaped' anode had all gone, the propeller and rudder bracket were next in line. The marina was known to have a poor mains earth so it would have been wise to have fitted a Galvic Isolator between the mains supply and the electrical bonding of the hull.	Propeller eroded, electric failure		Propeller	47-2008	Not online
80		NC 33 Mk 1	Handling anchor retrieval	NC33 late model attempted to weigh anchor in the morning but found his tackle fouled on the sea bed. Unable to winch it free he resorted to backing off and then motoring forward at 2-3 knots, whereupon the boat came to an abrupt halt. It was then noticed that the stress of this manoeuvre had not only bent the bow roller tube but also forced the entire pulpit out of alignment. The cost of repairs was considerably greater than the price of a new anchor and 60m of chain. It's worth noting that due to the geometry of the rig, the main back stay chain plates on the pilothouse roof took much of the load. This problem has clearly occurred before as the NC331 has an additional brace to support the bow roller tube. The Nauticat is a powerful beast!	Anchor stuck bent bow roller		Handling	47-2008	Not online

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
81		NC 331	Loss of Power	An NC331 entering port experienced a total loss of power in a difficult situation. After recovery to a marina pontoon berth the flexible coupling between the gearbox and the propeller shaft was found to have fallen apart. The bolts holding the coupling together were not inserted with 'thread lock' solution and possibly not tightened to the correct torque. This is the second occurrence in a boat less than five years old and members are advised to have this component checked if any unusual vibration is noticed	Prop Shaft Coupling failure		Propeller	49-2008	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-49-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-49-2/</a>
82		All	Starter Switch	In our last issue we included an account of engine starting difficulties with an NC331. This is a timely reminder of a problem that goes back at least twenty years. Nauticats have long used a starter switch made by Telemecanique that comprises a knob, frame and two plug in contact modules. Part numbers ZB4 BG08 - keyswitch – ignition, ZB4 BD8 - non keyswitch – ignition, ZB4 BG2 - keyswitch – 2 position ON/OFF used for hidden master, ZB4 BZ101 frame for switch modules, ZBE 101 - engine start module (green spot) and ZBE 102 - ignition ON module (red spot). It's the cheap little engine start module that gives us the problems. Easy to change and worth carrying a spare but do check the code on the side of your existing start module as there was a slight redesign in the late nineties. Parts are obtainable from industrial switchgear suppliers located in most large towns.	Engine start switches		Electrics	49-2008	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-49-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-49-2/</a>
83		All	Engine water hose	Older NCs with Gustavson engines. The front water hose cannot be renewed without removing the alternator belt and it would seem that these pre-shaped hoses are no longer available - each end is a different size! Ray Dennett, our President, produced an excellent modification and his diagram and instructions are available on request.	Gustavson engines front water hose		Engines	49-2008	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-49-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-49-2/</a>
84		All	Exhaust muffler	Stainless steel exhaust silencers/mufflers fitted to late model Nauticats are corroding around the lower welded seams. We've had two reports affecting boats less than six years old and since the design has little changed in the last twenty five years it's reasonable to assume that there's a problem with quality	Stainless Exhaust muffler drain	It's possible to affect a good repair by cutting off the base just above the original weld, move the drain plug up and weld on a new circular base using 316 grade stainless steel. See Yellow Pages – Sheet Metal Fabricators – Stainless Steel. The lower drain plug should always be removed during winter lay up.	Engines	49-2008	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-49-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-49-2/</a>
85		All	Cookers failing	Cookers seem to be giving up the ghost at an alarming rate. The narrow width of the 'slot' in Nauticat galleys (503mm for a 1991 NC33) severely restricts the choice of replacement models, especially if you're looking for three rings. The original cookers were made in Finland and spare parts are no longer available. It's possible to remake the aluminium burner rings and the oven flame failure sensors parts, especially burner rings, or an old cooker please let us know.	Cookers replacement repair		Domestic	49-2008	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-49-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-49-2/</a>
86		NC 331	Microwve failure	NC331: Andrew Russell bought a new NC331 in 2005 which was fitted with an Electrolux microwave model EMM 1260. These units are of a unique size and neither model nor spares are available in the UK. Following a failure of the timer/relay circuit, his local service agent was unable to access any parts from Electrolux UK. After Andrew complained to the MD the required parts and circuit diagram were sent from Sweden at a cost of £17. Andrew is happy assist anyone with a similar problem; telephone 01243 512322. azz@compuserve.com	Electrolux microwave failure		Domestic	50-2008	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-50/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-50/</a>
87		NC 33 Mk 1	Cooker replacement	Joel Rogale (NC33 ILKIVA) has kindly emailed us from the Mediterranean with details of a SMEV 3 burner cooker that is not wider than 50cm. Sounds like an interesting option and definitely worth considering.	Cookers SMEV 3		Domestic	50-2008	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-50/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-50/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
88		All	Engine spares	The pre 1995 boats were fitted with Borg Warner gearboxes and following several problems we have revised our latest (version 20) Parts Suppliers List to reflect changes to the UK distributorship and reaffirmed our preferred supplier of spares and service as Lancing Marine. Mermaid Marine is also a main service agent but we don't have any reports on which to base a recommendation. Mermaid Marine (mermaid-marine.co.uk) is a well known and long established mariner of the same Ford core engines that were used by Gustavson/Lehman/Sabre. They tell us that they have a good spare parts stock but as we said in a previous issue, cylinder heads, crank cases and crank shafts are only available from breaker's yards. They now offer a replacement marinised JCB engine that precisely fits our boats at a discounted price of £6700 inc VAT for the 4 cylinder model which includes engine mountings and instruments. It is compatible with the existing Borg Warner gearbox and is dimensionally the same except it is 30mm higher at the header tank. Whilst this engine is ideal for the NC38s and above, the lighter and smaller turbo Yanmar 75 + gearbox at a discounted price of £7700 inc VAT is a much better choice for the NC33s. This Yanmar engine is original equipment for the NC331.	Engine Gearbox spares suppliers		Engines	50-2008	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-50/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-50/</a>
89		All	Propeller Vibration	Propeller shaft vibration is currently affecting several boats. We thought that the original Siltala flexible couplings had ceased to be fitted after 1990 but it now seems that they were around as late as 1995. Identified by the aluminium coloured circular casting and slit clamp, they are far from 'flexible' and should be replaced by modern Vetus Bullflex or Centraflex couplings (standard on later models). One boat had a shaft that could be moved about 25mm fore and aft and after much investigation it was found that the engine mounts had separated. The correct alignment on another was only possible after removing the 'P' bracket and re-setting it in the correct position. All these jobs have been done before and are definitely not in the 'epic' category.	Prop Vibration Siltala couplings		Propeller	50-2008	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-50/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-50/</a>
90		All	Silencer Drain Plugs	Several members have commented on the rust stain caused by a dripping silencer drain plug. These tapered plugs don't seem to seal too well unless inserted with a thick layer of PTFE tape around the threads.	Silencer drain plug leaking		Engines	51-2009	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-51/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-51/</a>
91		All	Teaking Caulking	Some deck caulking will be done during the summer months. Nauticats have unusually small 4mm gaps between the teak planks and the hardest thing to find is the 4mm 'breaker' tape inserted in the base of the groove An easy, relaxing job that only requires some basic tools, primer (Sika primer-290DC), breaker tape (sales@marineindustrial.co.uk) and a steady hand with the caulking (Sikaflex- 920DC) applicator. Not advisable to attempt small areas as the caulking compound is relatively expensive and the tube goes off within weeks of opening. Using masking tape each side of the groove produces a finish that does not require immediate sanding. Plenty of advice available from Technical Support.	Teak Deck caulking		Hull	51-2009	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-51/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-51/</a>

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92		All	Engine SparesGustavson	Swedish Gustavson marinised Ford engines installed in Nauticats of the 1978 - 1982 vintage. Both the Americans and ourselves lost contact with the Swedish company called Bosomotor who brought the rights to the manufacture of Gustavson spare parts. After much trial and tribulation we have now clarified the situation and re-established a workable email link. Basically, Robin Carlsson and a friend are two 'Old Timers' that share a workshop in a town outside Stockholm. Neither speaks a word of English but Robin has two sons (Anders and David) who act as translators for their father. The state of the spare parts stock is unknown, even to Robin it seems, and there is no website or printed catalogue. Never the less it would seem that most parts are available at a price that is decided on the day! All the new contact details are in Parts Suppliers List version 22 and we suggest you attach a photo to all email enquiries. Bowman Ltd of Birmingham manufacture every marinisation part for a Ford 2712E(4) and 1271E(6) engine but it's not easy to mix and match between the two companies. We have trade price arrangements with Bowman so the situation may well be decided on the basis of overall cost. Of course, repairs are always possible and we would advise always going down this route as long as it's not an exhaust manifold that has cracked.	Gustavson spares		Engines	52-2009	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/</a>
93		All	Water Hoses	There's been a chronic shortage of the front water hoses for Gustavson engines. We identified the part number and Codan Rubber (Europe) has now received 20 pieces from its plant in Mexico. They are reinforced ribbed pipe 40mm ID at one end and 44mm ID at the other with overall length of 440mm. p/n 40.44.440. Price £11.80 + pp and VAT. At this moment there are only 20 pieces in Europe. Contact <a href="http://www.codan.co.uk">www.codan.co.uk</a> or tel: 01536 201010. In addition, all Lehman/Sabre type engine hoses are in the Codan online catalogue.	Gustavson front water hose		Engines	52-2009	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/</a>
94		All	Sea Cocks	Several of our members have asked about replacement sea cocks. We asked Matt Ambrose, Design Engineer, Hattersley Plc for the definitive answer on what type to fit to our boats. For this application we would recommend you use either the Hattersley Fig 100 DZR (Dezincification Resistant Brass) or Crane D171 bronze ball valves. Both are rated at PN25. When pressed to be specific as to the best type he said 'DZR brass which is compatible with all bronze skin fittings'. All ball valves are made with BSP (British Standard Pipe) threads the size of which is the diameter of the 'male' threaded part of the skin fitting. As a guide the Fig 100 1" DZR valve has p/n 010B00100JW and the Crane D171 bronze 1" valve has p/n 0EA06237C. Strangely, BSP is still the world standard imperial pipe thread! Obtainable from plumbers merchants in the Wolsley Group at a price of between £30-£45 including VAT (DZR brass is slightly more expensive than bronze). Hattersley Plc are one of the largest ball valve manufacturers in Europe. Technical sales helpline: 01473 277400.	Sea Cocks What Type		Fittings	52-2009	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/</a>
95		All	Morse Controls	Our original supplier of Morse/Teleflex controls has centralised its business in Bradford. We have a cash trade account number (C21375) which also applies to a large range of chandlery. <a href="http://www.controlsandcables.com">www.controlsandcables.com</a> Tel: 01274 732284/727234 and ask for either Sam Wiles, Product Manager or Matthew Griggs, Office Manager. This is now our first port of call for replacement bow/thruster panel mounted 'joysticks' and Morse chrome plated throttles and cables.	Morse controls & Bow thrusters		Fittings	52-2009	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/</a>

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96		All	Rudder Bearing	An NC331 has reported >5mm play in the lower nylon rudder bearing. This is totally out of limits and we are awaiting further reports as to whether the problem lies in the bonding of the stainless steel rudder post within the rudder structure or the bearing itself. Nauticat have provided us with the drawings which will be most useful as the design hasn't changed for over 25 years. The nylon bearing is held in a split clamp that is flush bolted together, the outer face of which is then filled and gel coated. Every Nauticat fin and skeg hull incorporates this design.	Play in lower rudder bearing		Steering	52-2009	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/</a>	
97		All	Windscreen Wipers	We have had numerous enquiries about replacement windscreen wiper blades and arms. All these parts, including the motors, are supplied by Vetus (www.vetus.co.uk). The wiper arms become corroded onto the splined shaft and it's all too easy to bend the brass shaft and damage surrounding gel coat during removal. Use a special puller obtainable from motor factors, car part shops or www.lasertools.co.uk (p/n 3173). Price about £10. Incidentally, our trade supplier for all Vetus products is MEC Marine Equipment & Components, Willow Marine, Willow Lane, Wargrave, Berks RG10 8LH. Tel: 0118 940 1141.	Wipers Parts		Fittings	52-2009	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/</a>	
98		NC 33 Mk 1	Engine Bearers	One of our northern members has changed his NC33 engine bearers in a remarkably simple way. Several heavy timbers were placed across the pilot house floor, a large loop of rope was then passed under the engine and a small trolley jack positioned on the timbers above to provide a lift. What a simple solution to a heavy problem but don't forget to disconnect the propeller shaft first!	Engine bearers replacement		Engines	52-2009	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/</a>	
99		NC 33 Mk 1	Fuel Vents	I noticed that the last of the NC33 MK11s and all post 1996 boats had their diesel fuel tank vents moved from the hull up to the aft side of the pilothouse. This modification addressed a long standing problem of seawater ingestion when heeled under sail. We have a report of an NC33 rolled in a heavy sea with water half way up the door, so it's more than just a remote possibility. Seawater in the diesel tanks increases the rate of internal corrosion.	Fuel vent move to pilot house	It is a relatively easy job to update the existing system of diesel venting. The original pipe is disconnected from the hull fitting and straightened out. It is not replaced because it's nearly impossible to access the retaining clip on top of the tank. The new hose used was labelled 'IPL Multipurpose 20 bar' 13mm internal diameter with 3mm wall. Since the original Siltala hose was of a non standard size, a couple of smooth brass connectors were needed. To make things simple I asked my local precision engineering works to make the connectors and also turn out two stainless steel hull blanks with the same threads as the old hull fittings. Hull finished and on my way towards the aft pilothouse bulkhead. Secure the pipe run with stainless steel JCS 19 'P' clips screwed into the available woodwork. Partially remove one section of starboard aft cabin ceiling to reveal the underside of the hollow outer fairing. Drill and rasp out an upward angled hole between the aft pilothouse bulkhead and the under side of this exposed void, then pass the hose to the rear. The new white plastic vents are relatively flush fitting with wire protective gauze to prevent insects getting inside. A right angle fitting was added to the rear so that the hose could be looped internally about 20cm above the new vent. There was no need to use a clip on the hose so it could be pulled through the outer hole and the new vent assembled externally. The complete assembly was bedded in white Sikaflex Sikaflex and finally screwed in position. Three points to consider: • The new vent hose must always be inclined upwards throughout the run. • Boats fitted with diesel heaters on the port side have an air intake that provides a perfect route for the new vent pipe. The white plastic vent fitting is installed directly outboard of the air intake – just remove the cover to reveal a big access hole. • Although this description refers to a 1991 NC33 MK11, Nauticat has re-positioned these diesel vents on various vertical parts of the aft topside according to the model.		Fuel	52-2009	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-52/</a>
100		All	Heat Exchanges	All our engines have raw water heat exchanges that contain narrow copper tubes that become clogged by deposits over a period of time. If the raw water pump rubber impeller needs replacing more often than every 3-4 years, the upstream flow is probably restricted. Impeller tips that are badly worn or separating indicates that there is a flow restriction in the raw water cooling system. Conversely, root separation is caused by an inlet restriction. Take the ends off the heat exchangers and clear tubes with a welding rod or similar tool. Yanmar raw water pumps as complete units cost about £800 and are only available from Yanmar dealers. However, they are actually Johnson pumps but agreements exist to prevent the UK distributor from supplying third parties. Apart from the casting which doesn't wear out, all the spare parts are readily available for the pumps to be repaired.	Blocked heat exchanger yanmar pumps		Engines	54-2010	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-54-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-54-2/</a>	

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101		All	Window leaks	We have had several requests for aft window units and fittings. Although expensive, Sam Shad at N C Berg ( <a href="http://www.ertec.dk">www.ertec.dk</a> ) is still making aluminium window sets for pre 1995 boats and Ertec Norway can provide everything from 1995 onwards. We have their contact details and an internet chandlery in Sweden that stocks individual fittings. Forward aluminium window leaks in the pilothouse are very common and the outer neoprene rubber seal strip (type 4) on pre 1995 boats is still available and can easily be replaced.	Window leaks rubber seals		Hull	54-2010	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-54-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-54-2/</a>
102		NC 331	Lifting Points	Lifting NC331s: Veli Kaja, Production Director, Nauticat OY, says 'we prefer to have the aft lifting strop between the skeg and P-bracket'. The cradle side supports must contact the hull directly over the fore and aft engine room bulkheads. These points are 285cm from the stern teak toe-rail (aft end of the fin) and 410cm from the bow (teak plywood section). It's a good idea to mark these bulkheads on the outside of the hull – just tap the fibreglass until the hard point of the bulkhead is found.	Where to lift		Hull	54-2010	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-54-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-54-2/</a>
103		All	Heaters	Eberspacher heaters: For some good reason we have had an unusual number of maintenance enquiries during the winter. The vast majority of these heaters are installed in lorries and NHS vehicles and the largest 'commercial' service agents are found in big cities rather than the marine environment. All diesel heater spare parts are extortionately expensive and should be purchased at a good discount. The complete unit can easily be removed with basic DIY skills and given to a dealer for service. The normal service interval is 800 hours but a black slick running down from the exhaust is a sure sign that maintenance is required. Running these units for short periods will reduce the service interval.	Eberspacher Heaters		Domestic	54-2010	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-54-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-54-2/</a>
104		NC 44	Steering Failure	An older NC44 lost all steering 6 miles off the coast. This potentially serious situation was the result of severe corrosion of a copper hydraulic steering line under the aft cabin area when all the fluid was pumped into the aft bilge. The failure was instant rather than gradual as further rotation of either helm just pumped more fluid out of the system. We recommend all owners to inspect the copper tubes, particularly in the area of the propeller shaft gland and under the aft floor. Corrosion should be carefully removed and the entire copper pipe runs coated in 2 applications of a preservative such as Waxol. Some of these pipes are almost inaccessible and therefore difficult to replace.	Hydraulic pipes failure steering		Steering	55-2010	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-55-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-55-2/</a>
105			Steering Failure	Two other steering faults are: If the helm cannot be rotated easily with one finger the hydraulic steering jack is ceasing up. If the boat manually steers in only one direction but is normal with the autopilot engaged, one of the non return valves in the autopilot electric hydraulic pump has stuck open.	Hydraulic jack ceasing auto pilot pump valve		Steering	55-2010	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-55-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-55-2/</a>

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106		NC 33 Mk 1	Engine Conversions	NC33s: There's always something that's being repaired which attracts our attention. The 1970s Perkins engines have done very good service and it's surprisingly easy to obtain spare parts. The earlier Ford 2712E marinised by Gustafson have unpressurised engine cooling systems which give many problems and spare parts for the raw water cooling side are almost non-existent. The Ford core engine was superseded in 1982 by the 2722E which became the basis for all Lehman/Sabre conversions. In time, all engines have to be rebuilt and our experience shows the following: Numerous Perkins engines are still in service throughout the world and the wisest thing is to rebuild rather than replace. The Ford 712E and 2722E have the same 'footprints' and it enhances the boat's value to change the engine to the later model. Two members have just tackled this problem and it provides a very good insight into the costs involved. Firstly, it was a Perkins engine in an older NC33 that was running well but obviously needed a complete overhaul as the boat is used for extensive cross channel trips and cruising. The owner decided to retain the original marinisation components as they were in a serviceable condition and after re-assembly the complete unit was spray painted before installation. Spares were readily available and the bill came to £4600 including VAT. Secondly, a NC33 Mk2 had its Gustafson/Ford 2712E engine exchanged for a Mermaid Ford 2722E (Lehman/Sabre) conversion with new marinisation components and a pressurised cooling system. Mermaid Engineering (mark@mermaid-marine.co.uk) have a fixed charge £4500 including new instruments, VAT and guarantee. In addition, both the Borg Warner gearboxes were overhauled at a cost of £800-£900 each. The total cost of each project would have been about £6500 if the owners had not been personally involved. Replacing these engines with a Yanmar 75hp and Kansaki (KM) gearbox costs about £10,000 including labour and VAT. On the downside these engines are 1995cc turbo units that are half the weight of	Engine spares replacements		Engines	56-2010	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-56-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-56-2/</a>
107		NC 331	Propellor Lock or not	NC331s: A member asked if he could sail his boat with the gearbox in neutral and propeller shaft rotating. Yanmar (Japan) replied that the KM4A gearbox is equipped with 'splash' lubrication and therefore can be rotated in neutral without time limit.	Lock prop or let spin		Propeller	56-2010	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-56-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-56-2/</a>
108			Shower Heads	All NCs: All the post 1990 boats have toilet basin shower heads made by Oras (Biddetta p/n 242050-11 white) at £29.55 + postage and VAT. In time the valves leak and water trickles into the bilge. An excellent replacement is marketed by www.penguineng.com p/n 'Asia' straight white trigger shower handle at £14.29 for two, including postage and VAT. Both prices are trade to the Nauticat Association.	Oras Shower Heads		Domestic	56-2010	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-56-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-56-2/</a>
109		All	Aerials	All NCs: Aerials made by the Danish company Procom are marketed in the UK by www.procomuk.co.uk. They are of commercial quality and the product range includes multi band versions that provide marine VHF, AIS and mobile phone from one aerial. The extended range of mobile phones at sea could be advantageous to some members so it may be worthwhile having a chat with Michael Hudson. Some basic CXL 2-1s are already in our fleet.	VHF aerial		Electronics	56-2010	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-56-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-56-2/</a>
110		NC 52	Aux Generator	NC52 in Croatia: Auxiliary Roheico generator powered by 35hp Bukh diesel. Alternator failed and there was an exorbitant quotation for a replacement. After consultation with Veli Karja at Nauticat we could confirm that it was original equipment but the alternator manufacturer was no longer in business. Advised owner to remove alternator and return it to UK where it is now being repaired near Leeds.	Aux alternator fail		Electrics	57-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-57-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-57-2/</a>
111		NC 33 Mk 1	Oil Cooler	NC33 with Ford Gustafson conversion: Internal oil cooler failure allowing seawater into gearbox. The marinisation parts for these engines are no longer available but new heat exchangers of a similar size can be supplied by Bowman of Birmingham. In fact, they can supply a complete kit for the Ford 2712E (4 and 6 cylinder) engines. The owner was advised to have the gearbox reconditioned.	Oil Cooler failure		Gearbox	57-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-57-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-57-2/</a>
112		NC43	Window Leaks	NC 43 windows leaks: The original windows were made by NC Berg (Denmark) and leaked badly. Repair of this type of window is not possible because the frame is very difficult to prise apart and the rubber seal round the glass is no longer available. NC Berg is still very much in business and retains all the original drawings so a decision was made to have a complete new set made to the latest specification. The cost was surprisingly reasonable and they are easy to remove and install. All Nauticats have 10mm thick forward windscreens and 6mm elsewhere.	Window Leaks NC Berg		Hull	37-2005	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-37-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-37-2/</a>

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113		All	Log Fitting	NCs speed logs pre 1995 – hull fitting: For some reason Nauticat did not fit hull tubes with a flap that limits the ingress of seawater when the paddle wheel is withdrawn. It is so much better to insert the blank when moored for long periods and substitute it for the clean paddle wheel when cruising. The new hull fitting is an Airmar P17 from Neil Robertson, nrobertson@airmar-emea.com (St Malo). Cost about £40 complete.	Log tube water flap		Hull	57-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-57-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-57-2/</a>
114		NC 44	Fresh Water Leak	NC44: Severe fresh water leak. All Nauticats have their plastic fresh water pipes installed before the floor is finally secured with screws. Other furniture is then installed over the floor and each screw hole neatly concealed with a circular leak plug. If the leak cannot be located it is often impossible to pull through new lengths of pipe as the original is trapped beneath the floor. When looking for the cause of the problem first examine the calorifier pressure relief valve and associated drain. Water expands as it is heated but the increased pressure is prevented from dissipating by non return valves in the pressurised cold water supply and sink taps on the hot water delivery side. The stainless steel tank is protected from rupture by the relief/drain valve which releases a little water into the bilge area every time it heats up. If the fresh water pump runs continuously (water will be cold) or just 'ticks over' occasionally during the night do check this valve as they sometimes get debris from the immersion coil stuck under the seal.	Fresh water pipes leaking		Domestic	58-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-58-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-58-2/</a>
115		NC 52	Gearbox Failure	NC52: Failure of the Borg Warner gearbox. This is a well maintained syndicate owned boat in a foreign port. The internal fault was identified and spare parts sent out from Lancing Marine. All went well until the 'engineers' found that the replacement damper plate that connects the gearbox drive to the engine flywheel wouldn't fit. The following email was received from the local agent: 'There is a possibility to even out the base of your flywheel and to drill new holes with a thread which is going to fit your damper plate. But, this is going to change the weight and balance of the flywheel, what might cause a less easy working engine'. Despite instructions to the contrary they removed the flywheel and sent it ashore for the work to be done. In the meantime, Lancing Marine were consulted and requested a photo of the flywheel from which they would be able to identify the correct spare part. This report is interesting because it shows how a simple problem can escalate into a very expensive and technically most unsatisfactory solution. The flywheel was eventually returned to the boat and the correct spare part fitted.	Borg Warner failure		Gearbox	58-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-58-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-58-2/</a>
116		NC 331	Engine smoking	NC331: Report: Smoking exhaust leaving a dirty ring around the aft end of the boat - late model with Yanmar 4JH4-TE engine (4 valves per cylinder). Yanmar engineers carried out various tests and concluded that it was being caused by lack of air to the engine compartment. Nauticat didn't have any adverse reports from their dealer network and therefore couldn't understand why this particular boat was experiencing the problem. A three inch ventilation fan was fitted in the compartment air intake and the smoky exhaust disappeared. Someone didn't read the installation instructions as it was a new low emissions engine that needs more air and supersedes all previous 75hp models.	Yanmar smoking ventilation required		Engines	58-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-58-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-58-2/</a>
117		NC 331	Water Maker	NC331: Water maker. A member is fitting a water maker to his Mediterranean based boat. We became involved through our trade discount facility but the technical facts are most interesting. Things have come a long way in this area and the model being fitted is not only reasonably small but is capable of producing 30litrs of good quality fresh water per hour using only 9 amps current drain. A report will follow with pictures and test results. Ref. www.schenker.it	Water maker performance		Domestic	58-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-58-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-58-2/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
118		NC 33 Mk 1	P Bracket and prop	NC33. Hull 'P' bracket removed and realigned before bedding down again in fibreglass matt. Work was visibly acceptable and the boat returned to the water. Some time later whilst running the engine in reverse, the propeller fell off. It was fortunate that the boat was securely tied to the pontoon and not out at sea. Technical advised lifting out and checking for damage to the skeg as the propeller would have travelled backwards with some considerable force. The propeller was recovered by a diver but the retaining bronze nut was lost. All Nauticat fixed pitch propellers have the same retaining nuts which must be tightened up after a 'locking solution' has been applied to the thread and face edge. Never allow the yard to fit a split pin as the nut will take up a slightly different position after each successive installation.	P Bracket and prop fitting nut		Propeller	59-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-59-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-59-2/</a>
119		NC 52	Prop Shaft slip	NC52. Out at sea during a Mediterranean cruise the propeller shaft slipped out of the gearbox flexible coupling and embedded on the skeg. Since rotation was impossible and there was no excessive leak from the gland, the cruise continued under sail alone. Technical: The gearbox had been removed for overhaul but on installation the flexible coupling clamps had not been tightened to the correct torque. The yard was negligent.	Coupling not tight		Propeller	59-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-59-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-59-2/</a>
120		NC321	Main Sheet failure	NC321 (2002). We have a very comprehensive report on the failure of the main sheet system in heavy seas off Barfleur. Whilst the full report is available on request it is sufficient to summarise by saying that a) the traveller is possibly undersized, b) the main sheet block is also probably undersized, c) the purchase (ratio) should be increased from 3:1 to 4:1 in line with Harken's recommendations. Whilst the calculated load on the original sheet system was just sufficient to meet Harken's recommendations, the margin of safety was not sufficient for the original rig onto which it was fitted. We recommend owners of all NC321s to read this report.	Main sheet block		Fittings	59-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-59-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-59-2/</a>
121		All	Rudder fairing	All NCs with flexible fairing panels between rudder and skeg. These 75mm wide sheet fibre glass fairing panels get damaged by pressure washing or are completely missing on some boats. Be very careful not to direct the pressure washer jet directly against the aft edge as it often causes delamination. The panel material is not commercially available and was specially produced by Nauticat themselves. Quite easy to make: Take a base sheet of clear polyester film to which the resin will not stick and build up 5 layers of M1239 75mm Silane Tmt Woven Tape obtainable from Scott Bader Ltd. Use standard type A resin and the final sheet should be nice and flexible and approximately 1.3 -1.5mm thick. For those without experience of working with fibreglass contact a local 'Fibreglass Moulder' (Yellow Pages) who should make it up for a modest price.	Fibre Glass fairing on rudder		Steering	59-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-59-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-59-2/</a>
122		All	Fuel Injectors	Yanmar diesels: Injectors with seized up nozzles seem to be prevalent at the moment. If the engine will not achieve maximum rpm or runs roughly it is usually due to poor atomisation of the diesel spray. Yanmar engines destined for the EU are assembled in the Netherlands and it is reported that spare parts are cheaper brought on the internet/phone from a dealer in Rotterdam. Service manuals are available to download in 'pdf' format from <a href="http://www.yanmarcenter.nl">www.yanmarcenter.nl</a> and pump parts and service information from <a href="http://gnarodious.com">http://gnarodious.com</a> which covers Zexel/Bosch VE distributor FIP, albeit from an automotive application.	Yanmar injectors		Engines	59-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-59-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-59-2/</a>
123	2012	NC 44	Prop Coupling failure	N44 Shaft coupling pins sheared Large vibration experienced when under power. The pins in the coupling on the propeller shaft were found to be sheared. No explanation or cause found.	Shaft Coupling sheared		Propeller	60-2012	Not online

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
124	2012	NC 44	Fuel Injector	N44 Injector Pump Grit found in the fuel pump. Is this possible fuel contamination? Concern over boat having been kept inside heated shed during winter. This could have been idea conditions for the diesel bug? No conclusive answers yet. Suggestion was to get fuel checked, if possible from bottom of tank. If I hear on the outcome will report in next	Fuel pump grit		Fuel	60-2012	Not online
125	2012	All	Wiper Blades	N44 Wiper Blades This problem of where to get replacement wiper blades applies to most Nauticats. I found they are made for American Trucks (flat front windscreens) and there are several outlets in the USA. I used Ryder, but had to find a willing person ( who happened to be joining a Little Ship Club/Continian's The details for the 15 inch blade are: ANCO Heavy Duty flat blade part number 51-15, available in the USA and on Amazon or from Ryder Fleet Products Ltd, Atlanta, GA 770 277 9629 - about \$5 each. There is a TRICO equivalent which I think has a part number of 61-150, but not certain.	Replacement wiper blades		Fittings	60-2012	Not online
126	2012	NC 33 Mk 1	Fuel Cap	N33 Fuel Cap Lever Sheared The flip up lever on the fuel filler cap sheared off. Most chandleries will sell the complete fitting socket and cap. Fortunately Plastimo will sell the cap separately as a spare and also a plastic (polyamide) version which would avoid any problems with dissimilar metals.	Fuel Cap lever sheared		Fittings	60-2012	Not online
127	2012	Nc 351	Mid Cleats	N351 Mid-Cleat Sheared Mid-cleat sheared off under heavy load while berthing. Trying to source similar style. No success yet. Nauticat have changed their deck hardware supplier to a German company, Pfeiffer. Some years ago Berthon at Lymington fitted additional mid-cleats to Jenmyardots which are the same design, so I will continue the search and ask Richard on his return.	Mid Cleat failure		Fittings	60-2012	Not online
128		All	Sea Water in Engine	There have been two reports of sea water in engine sumps with the oil turning to a thick milky emulsion; the affected engines were Lehman and Yanmar. Although there can be several causes, the common factor was that the raw water anti-siphon outlet had become blocked. In each case the local engineers changed the oil filter and attempted to flush out the salt with three engine oil changes. An engine that has salt water in the oil lubrication system will eventually suffer severe bearing corrosion and its service life will be greatly reduced. Members must check that the tell-tale raw water is flowing out of the hull fitting whenever the engine is running and always close the engine sea seacock on leaving the boat.	Syphon Blocked		Engines	58-2011	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-58-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-58-2/</a>
129	2012	NC 33 Mk 1	Heat Exchanger	Heat exchanger found to have serious corrosion (40 years old), provided contact details of specialist Ford suppliers	Heat Exchanger Corrosion	Many thanks for the contacts you gave us some 2 months ago for the above. We finally got it sorted about 10 days ago. I followed up contacts and at Hendy Power (Ken Belcher) found myself talking to Stephen Atkins who claimed to be familiar with Nauticats and what was required; his wife (Angela) has a company Seahorsepower in Bournemouth (01202 526030) and he advised that she and he would be able to look after it if corroded unit was sent to them. They first tried to repair old unit but after about 2 weeks (some delay perhaps in our engineer in Ipswich sending it) advised it was irreparable. Then after discussion with our engineer, they modified a 2nd hand Bowman unit with new tubestack and sent this and separate oil cooler to Ipswich, but engineer found this could not be fitted. Eventually acquired another 2nd hand unit from Sweden by e-bay but this required extensive overhaul and then pressure testing which it initially failed. Finally unit reached Ipswich 27 June, was fitted, and appears satisfactory. Costs, after refund for Bowman unit, totalled about £1050 (excluding fitting costs by our engineer in Ipswich). We still wonder if we should have insisted on speaking to Ken Belcher, but Seahorsepower insisted Hendy only dealt with new items. Perhaps this experience might be useful for others with similar problem.	Engines	61-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-61/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-61/</a>
130	2012	NC 33 Mk 1	Water Pump	Water pump had failed in France, provide a couple of possible contacts to get replacement.	Water Pump failed		Engines	61-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-61/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-61/</a>

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131	2012	NC 33 Mk 1	Taps	Trying to source supplier for the seals on the Oras taps as supplier previously used is no longer in existence, provided details of Transvac in Sussex who are UK suppliers for Oras Taps	Oras Taps		Domestic	61-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-61/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-61/</a>
132	2012	NC 33 Mk 1	Cutlass Bearing	A sound like a helicopter is coming from the aft cabin, it could possibly be the cutlass bearing failing, so provided size and supplier of the cutlass bearing, so on lift out if it does need replacing then a new one will be on hand.	Cutlass Rumble		Propeller	61-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-61/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-61/</a>
133	2012	NC43	Guard Rail	Some rectification work required on stanchions around gate area, looking to source stainless steel sections in Orkney, supplied several contacts of stainless steel suppliers to the marine world, which I have used. Baseline Marine and Sea Screw.	Guard Rail stanchions		Structures	62-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/</a>
134	2012	NC43	Wiper Shafts	Wiper shafts or motors need replacing, looking for who makes them? Believe the motors are an American make AFI (Marinco) 001 262 293 1700. Vetus supply same type under their own name, Vetus UK tel 02380454507. They supply a replacement shaft, part No: RW15 1320-1540. I have heard that the shaft can cost as much as a new motor so beware.	Wiper Blades Shafts		Fittings	62-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/</a>
135	2012	NC 33 Mk 1	Tank Cleaning	Tank full of sediment, needed flushing out, Express Lube, Chris Roos used, a good job cost around £350 plus VAT.	Fuel Tank Cleaning Flushing		Fuel	62-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/</a>
136	2012	NC 33 Mk 1	Diesel Bug	Bad case of diesel bug, owner made own system to clean and polish fuel. Needed to source "O" ring for fuel gauge, suggested to try Polmax a supplier of "O" rings.	Diesel Bug Fuel Cleaning		Fuel	62-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/</a>
137	2012	NC 33 Mk 1	Window Rubbers	Getting black streaks from window rubbers also comes off very black when polishing around windows, is there any fix? I don't think there is any real fix for the black coming from the rubber seals, the rubber deteriorates due to UV and various pollutants in the air, most noticeable on rubber more than 10 years old. I have heard that the deterioration can be slowed by applying silicon based products but I have no experience of how successful this is. Caravans experience the same problem and various car type cleaners are used to try and reduce the amount of black. In the USA boat owners use a West Marine product called Aerospace Protectant to try and protect the rubber, but again I have no personal experience.	Black WindowRubbers		Structures	62-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/</a>
138	2012	NC 33 Mk 1	MicroWave	Is there a replacement to the Electrolux microwave EMM1260? The Electrolux EMM1260, is h-235mm, w-444mm, d-337mm, there is a couple of cheap options which may fit, Sharp make a model Compact R272(SL)M approx £70 and dimensions h-258mm, w-439mm, d-355mm. Panasonic have a similar range, NN-E281, h-255mm, w-440mm, d-340mm. It appears that the EMM1260 is still for sale from various distributors in Finland, Sweden etc, at around 150 euros, I guess plus tax etc. Nauticat appear to fit Siemen models now, see attached photo, they use a Siemens 15M562 model, around £300, dimensions h-280mm, w-453mm, d-320mm. (see attached photo) Lot depend on how much you use the microwave, I would certainly be looking at the exact dimensions of the hole and seeing if one of the £70 compact range ones would fit.	Micro wave replacement		Domestic	62-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/</a>
139	2012	NC 33 Mk 1	Hydraulic lock	Engine locked up, it turned out that the cylinders were full of seawater, managed to remove the water by taking out the injectors and cranking the engine. The engine now runs but I am worried about a repeat of water syphoning into the engine. There should be an anti syphon valve somewhere but I cannot find it. The valve was found under the pilot house seal on the port side with a hose running to a skin fitting which was blocked with some sort of wax. It looks as if an insect had crawled in there and secreted sufficient wax to block it. It was cleared it but still no water coming out of the outlet. I advised, you may have already done so but suggest as precaution to change oil and filter encase there is any sea water contamination into the oil, if the oil has turned milky then several oil changes may be required. This reminds us all to ensure the anti siphon valve works, especially as it is buried away behind lockers etc on most Nauticats.	Engine Water Locked		Engines	62-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
140	2012	NC 33 Mk 1	Smelly Holding Tank	2006 331, the vent hose connects to a 90deg elbow on the tank top, then runs aft, downhill under the port berth and into the forward head. There it is uphill to an anti-syphon loop before going down and out of the hull side. If the holding tank is near full or over filled the waste can enter the vent pipe, where it will lie causing a stink !!! Installed a carbon smell filter before the loop which removes the stick found outside, but the hose inside starts to smell even though it is 'non-permeable'. Cannot see a possible routing that will take the hose uphill to the anti-syphon, the panelling in the forward cabin precludes any piping being routed. Any suggestions, short of ditching the Siltala SS tank and installing a plastic lower tank ?? Any idea why Siltala did not a level gauge? Sorry, I don't have enough detail knowledge of the 331 to help, I have looked up similar aged vessels as yours and they may be able to help, they are: Tempus no. 1242 2005, Dovetail no. 1267 2007, Dreamcatcher no. 1275 2008. I am in the process of designing a holding tank installation for my NC 35 and have found Tek Tank 01420 525478 very helpful and knowledgeable with respect to combating smells. Have no idea why Siltala did not fit a level gauge, the simplest one is the Tankminder, supplied by Tek Tanks, just warns you when tank is getting full but requires a hole in the tank to fit it, another option is a ultrasonic level indicator, OK for stainless and requires no hole in tank.	Holding Tank Vent		Domestic	62-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/</a>
141	2012	NC 52	Bow Thruster	Query from France with a new owner of a NC 52, trying to work out who made the bow thrusters as it's not working. Pictures supplied to help identify. Pic 4 Unidentified Bow Thruster Pic 5 Bow Thruster Works From the pictures you sent and the research I have carried out the best I can provide is: I believe the system you have is a hydraulic tunnel thruster, the hydraulic motor is in the tunnel and the hydraulic pipes are connected directly to the motor, this is controlled by a hydraulic valve, the white painted hydraulic equipment made by Danfoss, the valve will be controlled by the joy stick in the wheel house. The hydraulic pressure will most likely come from a pump driven by the engine. There may be an oil cooler as part of the system. This type of system appears to be rare today on leisure boats and has been replaced with the gearbox type drive. Danfoss still make bow thruster systems, but for commercial ships, the company has changed over the years and the company that makes bow thrusters is Sauer Danfoss (French office +33164379133 they may be able to help, but their current range is for commercial boats) There is an American company that makes similar systems, but again mainly for larger boats, its Thrustmaster in Texas, 713 937 6295 <a href="http://www.thrustmastertexas.com">www.thrustmastertexas.com</a> The latest information the system was declared not repairable, so the system has been removed along with the hydraulic pump and replaced with a side power thrusters.	Bow Thruster Unknown Hydraulic		Fittings	62-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/</a>
142	2012	NC 331	Flood Light	Looking to source the deck flood light. The led light is an American 4 inch diameter GE4411, or Lucas SB4411, should be around £9.00 can be bought through most Lucas suppliers (its used on Tractors!) A supplier used by Nauticat Association Members is Elta Lighting Ltd,	Deck Flood Light		Electrics	62-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
143	2012	NC 33 Mk 1	Fuel Filters	I am the unfortunate Nauticat owner with a case of 'diesel bug'. As a result I have been changing filters to try to get a reluctant/non-starting engine to fire up. The cost of the Yanmar & Separ elements has been annoying me, so I took a look at alternative sources and came up with some interesting information. In the current financial climate I guess we are all looking to save £'s. As far as I am aware there is nothing special about Yanmar filters, (they are made in Japan). I took a look at alternative sources for my 2006 4JH3-TBE. This has become an important issue as I have got 'diesel bug'. Engine mounted Fuel Filter with base tapped hole for water sensor, Yanmar price £43+, eBay 'Fram' £25, Baldwin BF7858 £9.22 saving >75% 'Separ' fuel filter 00530 (30 micron), Marine Power £20.17, SVB Hamburg Euro16+, Oil filter: Yanmar £10.84, Baldwin B1421 £4.58, >50% saving Baldwin filters is an international company the above claim to be made in Italy. I have purchased one off each of the above from In-line Filters as a trial, there does not appear to be any external difference between Yanmar and Baldwin elements. The Fleetguard element has a metal frame where the Separ is plastic. I offer these observations, I do not have any connection with In-line Filters, they can be found on the internet at : <a href="http://www.inlinefilters.co.uk/index.php?main_page=product_info&amp;cPath=935_938_943&amp;products_id=9807">http://www.inlinefilters.co.uk/index.php?main_page=product_info&amp;cPath=935_938_943&amp;products_id=9807</a> I placed my order on Thursday and the parts arrived next morning !! I have also built a 'polisher' using a spare Separ filter assembly and a pump purchased from A.S.A.P. As the pump is only 2L/min I had to run it for several hours to move the quantity of diesel in the tanks ! Examination of the SEpar bowl revealed a quantity of black gunge, but the element was not blocked.	Fuel Filters Information		Fuel	62-2012	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-62/</a>
144	2013	All	Door Wheels	Nauticat 44 Door Wheels The standard wheels we hold as NA stock did not fit this NC44, Nauticat have confirmed that as far as they know the wheel design has always been the same, though there is a possibility that a slightly different diameter spindle could have been used in 1980 but this is not known to the current production team at Nauticat. There was a modification carried out by the USA Nauticat Association members which used a smaller spindle 3/16" diameter, someone in the past may have done a similar modification as the Nauticat wheels are made by a Finnish company and only supply large quantities ( hence why we have a stock of them).	Replacement door wheels, not standard		Structures	63-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/</a>
145	2013	NC 52	Flexible Coupling	Nauticat 52 Aux Generator Flexible Coupling The aux generator is driven by a Bukh engine via a Centa coupling, the engineers have fitted several couplings incorrectly following the generator being reconditioned. A request by the owner sent to Nauticat for any fitting instructions, but they could not help. From the information now held on the NA Forum, a copy of the Centa fitting instruction was supplied, along with some general information about setting up the "A" type coupling and the "M" type along with a general guide to CENTA "A" type couplings.	Aux engine Flexible Coupling, Centa type A		Engines	63-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/</a>
146	2013	NC 33 Mk 1	Samson Post	Nauticat 33 Samson Post On a 1977 NC33 the Samson post had serve wood rot and had broken away, owner looking for any suggestions on how best to fix. Unfortunately, I don't have much personal knowledge of the early 33 models which had two wooden samson posts (bollards) on the aft deck area. This was changed to stainless steel posts when Nauticat changed to the all fibre glass cabin structure hull number 500 in 1978. The posts go down to the keel; to replace them will depend on the amount of internally panelling that would have to be removed to gain access. 1. Complete removal of post and replace with new wooden post. 2. Depending how far down the rot has gone it may be possible to graft/join a new section of post. Both these will probably require a fair degree of carpentry expertise, especially if the internal panel work has to be removed without causing too much damage. Not much help I am afraid, if you have any pictures of the inside of the aft cabin or any access panels which allows you to see the post, I may be able to help a bit more. I did ask a company in Hamble, Southampton (who have some Nauticat experience) if they have any experience of this problem, but they have never been involved in a NC33 of this age.	Wooden Samsopn Post Replacement		Structures	63-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
147	2013	NC 38	Aft Cabin Windows	Nauticat 38 Cabin Window Glass broken in the aft cabin window, owner going to try and replace with Perspex.	Aft cabin Broken window, replace with perspex		Structures	63-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/</a>
148	2013	NC 33 Mk 1	Oil Filter	Nauticat 33 Oil Filter Looking for correct Oil Filter for the 2722E engine, found that ASAP stock the filter under their own part number of 157060, probably a Fram PH8A.	Replacement oil filter part number		Engines	63-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/</a>
149	2013	NC 33 Mk 1	Oil Pressure Sender	Nauticat 33 Oil Pressure Sender Oil pressure sender failed on Ford 2710, which was a Motometer 5403. Unfortunately Motometer (a German company) don't recognise the part number 5403-1000, but have attached their current product range in case it helps, your range is 0 to 5 bar. I replaced my oil sender a few years ago, different electrical configuration (VDO instruments), but the company may be able to help Furneaux Riddall, (general electrical suppliers to auto and marine world) Portsmouth 02392668621. From the picture I see you have two terminals, it could be a) an earth terminal and sender (ie body of sender not earthed) or b) its one terminal oil pressure warning light (usually about .8 to 1 Bar) and the other the pressure sender with the body being earth, the later (b) is more likely. Assuming you have a oil low pressure warning and a pressure gauge. Furneaux Riddal, where able to help and were very helpful	Oil Pressure sender replacement, motometer 5403		Engines	63-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-63/</a>
150	2013	NC 33 Mk 1	Samson Post	Nauticat 33 Samson Post In the last Cat-A-Log there was a query regarding replacing a wooden Samson Post, which at the time we could not provide much help, but a member read the article and sent the following, which was his experience in replacing a Samson Post. Repairing a Wooden Samson Post on a Nauticat 33 I can offer the following repair suggestion for a Samson Post which I have successfully carried out on my own Nauticat 33 ( 1976 ). I first looked at a complete renewal of the post, and concluded it would be a nightmare, not only for the lack of access through the deck hatch, but to disturb the internal panelling would be a difficult job, and on my boat the posts are fibre glassed into position, which I did not want to disturb. The rot on these Samson posts usually occurs around deck level to several inches below deck. I cut mine off 6 inches below the underside of the deck, using the "I am Houdini technique" of head in the locker with a short tenon saw.....Cut the post as neatly and as square as possible to get the best result. Using replacement timber of the same section, I used Oak because I had it available, or Iroco or Teak (very expensive) cut to length required. Working through the hole in the deck, you will need a long 25mm wood drill bit, (you can hire one almost anywhere) drill a hole 3 to 4 inches deep in the centre of the cut off post below deck, then a similar hole in the new replacement post. Purchase , beg or scrounge a piece of 25 mm stainless steel bar 6 or 9 ins long. The bar is inserted into the holes and the replacement section is fitted in place through the deck. It will need final fitting with epoxy resin but not yet. Next... The stainless bar which retains the mooring rope on the Samson post can be cut out of the old section and refitted to the new timber...Drill a hole with a little tolerance and fix it in with Epoxy resin. The wooden posts are notorious for leaking where they fit through the deck, and from my experience will never seal successfully long term using Sikaflex or similar products as the movement of the post if not rigidly fixed through the deck, will exceed	Replacement Samson Post		Structures	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>
151	2013	NC 331	Fuel Cap	Nauticat 331 Fuel Cap Siezed Fuel tank filling lid had become seized and eventually it had to drilled out. After visiting several chandleries it would appear that it is non standard, there is no writing on the deck fitting, which is aluminium, to identify it, and the filler cap is red plastic with a thread. Would be gratefully for any ideas. The fitting could be from a Germany company Pfeiffer Marine, a copy of their catalogue supplied, but a couple of other possibilities is that Plastimo provide a range of deck fillers, which in chandleries are sold as filler and plug, but they do supply replacement plugs which could be ordered from plastimo, copy of relevant catalogue supplied.	Fuel Cap Siezed, replacement part number		Fuel	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>
152	2013	NC 331	Stern Packing	Nauticat 331 Stern Packing Only one ring of packing material can be fitted into the prop shaft stuffing box. The only solution I have found is to cut the packing material in half, and have managed to get an extra ring in the stuffing box. The more eloquent solution is to fit a much larger stuffing box as seen in the photograph below.	Stern Packing Number of Rings		Propeller	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
153	2013	NC 33 Mk 1	Fuel Cap	Nauticat 33 Mk 2 Fuel Caps Same as above, another Nauticat with a fuel tank filler cap problem, tried to buy a new red plastic fuel filler cap, bought two from Port Solent Superstore and they look identical but are a slightly different thread and therefore don't fit, these are made by uni-part. The ones I have, have made in Sweden written on the underside.	Fuel Cap Replacement		Fuel	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>
154	2013	NC 33 Mk 1	Door Locks	Nauticat 33 Door locks Looking for key blanks for Schwepper lock, there is a UK agent, Bill of Marine & Engineering Supply Co. Ltd, tel 01674 850250 and mobile 07885 490824.	Door Locks Keys, schwepper		Fittings	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>
155	2013	NC 33 Mk 1	Air Filter	Nauticat 33 Air Filter Looking to replace the polyurethane foam in the engine air filter, ASAP suggested as a potential supplier.	Air Filter Foam, what type		Engines	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>
156	2013	NC321	Rudder Stock	Nauticat 321 Rudder Stock Noticed movement in rudders stock, how much should it move. The design is similar on most Nauticat models, this was the answer from Nauticat. The normal amount of play is 0.5mm at build time. The bottom bearing is adjustable, as it comes in two halves (not obvious at first sight as its gel coated over) and can be sanded to achieve a good fit, the top bearing does not have any adjustments, other than the packing in the top of the rudder stock.	Rudder Stock Play Adjustment		Steering	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>
157	2013	All	Wiper Springs	Nauticat 39 Wiper Springs Looking to replace the wiper springs or the complete wiper arm. I replaced my springs on my NC 35 a few years ago, I bought the springs from Entextstocksprings ( <a href="http://www.entextstocksprings.co.uk">www.entextstocksprings.co.uk</a> ), they had a minimum order of about £10 and the springs were about 60p to £1 each, so I bought a selection to find the best match, I think the ones that fitted are 9.53mm diameter and 65mm long, but not sure. Replacement arms can be bought from Vetus, they have a UK outlet. I have attached a copy of a page from their catalogue, the ones you would need I believe are the parallel spline type (SSA) not the taper type (DINS).	Wiper Blade Springs		Fittings	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>
158	2013	NC 38	Fuel Gauges	Nauticat 38 Fuel Gauges Fuel gauges not working, reading zero. (VDO) The fuel gauges and all your other engine gauges are made by VDO a Germany company, the good news is there is a very good supplier in Portsmouth, Furneaux Riddall, (general electrical suppliers to auto and marine world) Portsmouth 02392668621, they have been very helpful to me and other NA members. Furneaux Riddall Alchome Place Portsmouth Hampshire England PO3 5PA It sounds like the sender unit has failed, (most likely the rheostat (variable resistor) has got saturated with fuel and has failed or the wiper arm is not making electrical contact.) another check to confirm this is to remove the wires from the sender and measure the resistance and see if it changes when the float is moved. You would expect a range of around 10 ohms to about 300 ohms, if you see no change in resistance then the sender is faulty. Depending on the detail design it may be possible to clean the rheostat but most likely you will need a new one.	Fuel Gauges Not Working		Fuel	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>
159	2013	NC 38	Dirty Fuel	Nauticat 38 Dirty Fuel Fuel, from picture its hard to tell, but it does look dirty, an indication would be the state of your fuel filters when you change them, ie if they are very dirty after a seasons use, as eventually they could become blocked. Some members have tried cleaning their tanks my making up a pump and filter system to circulate the fuel through filters and back into the tank, see Cat-A-Log Winter 2012 Number 62 "Hunting the Fuel Bug". Maurice used a company called Express Lube (Chris Roofs) 01444254115, they charged £350 + VAT to flush the tank, I believe Maurice was happy with them, also I think they put an extra inspection panel in top of tank.	Dirty Fuel Tank cleaning		Fuel	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
160	2013	NC 52	Auto Pilot NECO	Nauticat 52 NECO Autopilot Autopilot works, but occasional goes round in a circle. Just a few bits to start with, it looks like Derek Coventry (ex NECO employee who has test gear and some parts) was still active in 2011, and I have found two e-mail addresses for him: derek.g.coventry@talk21.com and derek207@btinternet.com also a phone number which could be well out of date of 0705 379687 There is another person who appears to be fairly knowledgeable that is Daniele Fua, e-mail daniele.fua@uniroma1.it Some general points, if the fault is erratic, it going to be hard to resolve, but if the system works OK generally then it could be due to: 1. Bad earth connections or just a bad connection between units, possible changing with vibration. 2. A dirty feedback potentiometer, probable from the rudder, or wind vane if you have it fitted. 3. Could be an intermittent signal from the compass. 4. The worst outcome, would be if its an intermittent fault on the circuit card, a component breaking down due to heat or old age.	Auto Pilot NECO Circles		Electronics	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>
161	2013	NC 331	Smoking Exhaust	Nauticat 331 Engine Smoke Loss of power and lots of smoke, report from owner; The engineer/owner of Meca-Offshore did very well in his initial diagnosis that is a faulty low pressure feed pump in the injection pump. He removed it quickly & efficiently, helped by the fact that I had the tool to remove the drive gear on board. There then ensued day after day with little communication. I do not know if the lost days were because the injection pump repairer took many days to return the pump, but it became very frustrating. When the refitted pump did not fix the engine smoking Lionel G. agreed with me that the injectors had to be cleaned. Cleaned, the engine started better, and ran to full rpm, but with smoke. After adjusting the pump timing, it was said the engine was ok. The next day as we prepared to leave the engine very smoky, so asked the engineer to return. After about 2hrs of adjusting everything he declared he would call Yanmar in the morning, and return. He arrived 12:00 next day & adjusted the timing by about 1mm at the pump flange. Result is that it smokes a little at idle, quite a lot at revs no load, very little on load. It is thought that there could be some issues with the valves or the cylinder bore/piston rings, but the engine should run ok.	Loss of Power Smoking		Engines	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>
162	2013	NC 33 Mk 1	Max	Nauticat 33 Prop Fouledprop The symptoms were of a fouled prop, little power in forward and no power in reverse; follows a report by the owner. Dear Maxprop, When I began to cruise under sail with my Nauticat 33 Ilkiva (built 1981, hull 787), I soon set up a program to improve performance under sail. One of the actions was: change the enormous propeller for a self feathering one. So I profited that a discount was proposed at the Paris Boat show, to purchase one. I had a few problems when came the time to mount it on the shaft : the propeller cone of the shaft was not standard, so the Maxprop went back to factory for modification. Then a few weeks later it was eventually mounted without problem. It was in April 2006. Then I had many years of happiness with my Maxprop which, I think, allowed me to gain at least a half knot if not more under sail. Handling in harbor oblige you to be zen, because when going into gear or changing from forward to reverse or the opposite, you hear the sound of the blades which lock in the new position, and you guess it shakes the shaft up to the gearbox. So you must have a velvet hand, and anticipate. It educated me. A few days ago (end of May 2013) I was coming back to Cherbourg from Alderney, single handed, and before arriving to the marinas, having to get sails down, I started the engine (Ford Lehmann 85hp), directed the boat towards the wind and switched the auto pilot on, and then put the engine into gear slow forward. I began to get the mizzen down (Ilkiva is schooner rigged) and then I heard the alarm signaling that the engine had stopped. I hurried back inside and restarted the engine. It went OK. Ten minutes later, as I was motoring, approaching my place at the pontoon. I wanted to give the boat a little more speed, and moved the handle forward. The engine speed increased, as well as the boat, but the stern seemed to zigzag and vibrate. I managed however to get into my place without problem. Then I put some order into the boat, and this being done, the boat being tied to the pontoon, I tried to make slow ahead and slow reverse with the	Maxprop failed		Propeller	64-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-edition-64/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
163	2013	NC 331	Prop Anode	NC 331 Prop Anode Can you advise me where in the UK I can obtain prop shaft nut anodes for a 331 ? I sourced some directly from Siltala when I bought the boat, but that stock is about to run out ! The anode is 38mm Dia x 32mm long from the nut face, the threaded part is 10mm long and seems to be 24mm dia threaded. Provided general anode suppliers, but no definitive source, anyone have a UK source?	Prop Anode replacement		Propeller	65-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/</a>
164	2013	NC 331	Stuffing box	NC 331 Stuffing Box Do you have any data on what size stern gland packing, 2006 331? Veli Karja states that the 331 packing is 10x10mm with 2 rings. Which seems to conflict with the article in Cat-A-Log where it was reported 1 ring? The size is 10 x 10mm, and like myself most have difficulty in getting two rings in the stuffing box and get the nut back on again.	Stuffing Box size of Packing		Propeller	65-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/</a>
165	2013	NC 33 Mk 1	Vibration	NC 33 Vibration when turning Having just returned from cursing the South Coast of Spain/Portugal Compromise is now ready to be lifted out in Lagos for servicing hull etc. Although there were no problems while motor/sailing for hours there goes a strong vibration through the boat at very low speed and when turning around in the harbour, or getting ready to drop the anchor. Could this be the gear box (gear shifting is OK) - rudder blade - lose propeller - bent shaft? There is no rope around the prop. I do not know if anything will be noticed when she is out of the water. But whatever the problem is it should be seen to it when she stands on the dry. There are several possibilities which could cause the vibration: 1. The propeller could have been damaged and is now out of balance, unlikely if you have not hit anything or got something caught around the prop. 2. The cutlass bearing could be wearing, this is a strong possibility and can be checked when boat out of water. 3. The flexible coupling between gearbox and prop shaft could be wearing, or coming loose, can be checked boat in or out of water. 4. The gearbox rear bearing could be worn, this is the least likely as I would expect more rumblings from it at all speeds. Thank you for your thoughts. Another possibility is that there is air in the hydraulic steering pump. It all happens when making a sharp turn and slowing down after a long passage. As soon as the boat is out of the water we shall go through the different options to hopefully remedy the problem.	Vibration Prop Gearbox Turning		Propeller	65-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/</a>
166	2013	NC 33 Mk 1	Water Impeller	NC33 Water impeller Would you be able to help with identifying a supplier for the seawater intake impeller on my Ford engine. I have failed to get one having tried several suppliers. It is not a Jabsco pump. The impeller is on a key way on to a 16 mm shaft, 9 paddles, 57 mm long, approx. 65 to 70mm diameter. I have tried Hendy ford, but they do not stock any parts for the engine marinisation. Not having much success in tracking down the sea water impeller, all the information I have shows that generally the pumps used were Jabsco, which you say it is not, any ideas what pump it is, it could be a Johnson pump which was produced in Sweden at the time your engine was made, which would fit with a Gastavson marinisation. The following lines of enquiry pursued: 1. A company called Boso Motor AB in Sweden took over the Gastavson company back in 2008 they were still supplying marinisation parts, the owner (no English) is on 004687671940, (no e-mail found), but there has been contact with his brother in the past, Anders Carlsson (speaks English) e-mail anders.carlsson@projectpartner.se. They may know the type of pump fitted. (I have sent an e-mail to see if they know) 2. Looking through my data it looks like Gastavson used the Johnson 10-2410-1 model of pumps on the Ford 2711 & 2713 (no info on 2712), this had an impeller 09-1028B fitted, which is similar size to yours, 65mm dia, 50mm long, 16mm shaft, but the drive is via a spline shaft not key. So this does not look like yours. 3. Taking your description and sizes of the impeller the nearest I can find is a Jabsco (Part list attached) impeller, part number 4598-0001, shaft size 5/8" (16mm) with a key drive, diameter 2 9/16" (65mm), width 2" (50.8mm), but its only 8 blades, Pacer Marine, Hampshire 01252317100 have them in stock at £20.41. If you have any clues to who you think made the pump I can do some more research, I will let you know if I get a response from Boso Motors. Your suggestion is the closest I have come to getting a replacement. I don't know what performance difference there would be with one less	Sea Water Impeller Dual pump		Engines	65-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
167	2013	All	Air Filter	NC 33 Air Filter I require a new plexiglass sliding roof, any ideas were I could buy one? also having trouble locating an airfilter for my ford Lehman 90HP any suggestions The air filter fitted on the Ford Lehman could be either a oil based, which just requires cleaning and replacing the oil, or it can be the paper filter type of which to my knowledge there are 2 types a single element or a double element, a couple of possible suppliers listed below. Hendy Power 0844 5399348 (engine specialists) ASAP Suppliers 01502 716993 (general marine suppliers) The sliding roof, I assume its fitted in a wooden frame, in which case you may be able to buy replacement plexiglass, a good supply of a range of plastic sheets is The Plastic People www.theplasticpeople.co.uk 01133993622, they supply a range of sizes and given dimensions or a template they will cut to exact size.	Air Filter Ford Lehman		Engines	65-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/</a>
168	2013	NC 33 Mk 1	Windlass Replacement	NC 33 Windlass I am about to replace my manual windlass on my 33 Mk11 and would like to know if anyone has recently done this, and if so what one did they use? I am told it needs to be a 1000w windlass as the Nauticats punch above their weight, and the 700w motors are to light. Any info would be greatly appreciated. I think most Nauticats of the 33 to 35 ft range use the 1000w windlass, that's what I have fitted to my NC 35. There was an article about fitting a windlass in a recent yachting magazine, can't lay my hands on it at present but will let you know if I find it. PBO had an article in the January 2012 issue, which you can buy on line, that may help. A couple of points you need to consider: 1. You need to make certain the gypsy on the new windlass is the right type for the anchor chain you have, otherwise you may suffer with the chain jamming. The gypsy on the manual windlass would be useful to take along when buying the new one, or take a section of chain along to make double sure it will fit. 2. You need to think about the electrical power required, some boats fit a separate battery up near the bow, so keeping volts drop to a minimum, and run the charging cable up to bow, this may be easier than trying to run heavy duty battery cables from engine area up to the bow. 3. The type/manufacture will probably be determined by the physical space you have and were the current chain runs to chain locker. Let us know how you get on with the windlass.	Electric Windlass Size		Fittings	65-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/</a>
169	2013	NC 331	Crankcase Pulley	NC 331 Removing Crankshaft Pulley I am struggling to pull off the above hub front the front of the crankshaft. Do you have any suggestions or know of anyone that has accomplished this? The background, I need to access the gear A-B-C marks to confirm injection pump timing, possibility French engineer might have assembled incorrectly ! To see these marks the front cover has to come off, meaning the damper & hub removal. Hub bolt torqued to 176Nm, & on a taper with woodruff key. I have tried a 3-leg puller, and a 'HD' Sealey twin leg puller. The former bent, the latter sheared it's 5mm bolts. I am trying again with the Sealey, replacing 5mm bolts with 8.8 grade, & then trying 6mm. If that does work I really don't know what to expect use the engine as an anchor !! Incidentally the Yanmar Service Manual for this engine & the backup from Barras is rubbish! Unfortunately I don't have any personal knowledge of removing a crankshaft pulley (or removing a fuel pump) on a Yanmar engine, and most manuals just say remove pulley, not very helpful. As you think the French Engineer may have assembled the gear train incorrectly following a fuel pump removal, I assume he accessed the fuel pump gear through the small end plate on the front gear train housing to undo the drive shaft for the pump. Have you tried looking through the this end plate to see if you can see the gear train alignment marks through this small end plate, if so this would save you removing the pulley and the complete front gear train housing. Attached a couple of drawings from Yanmar may help. I know from other engines the pulley can be hard to remove, and finding a good pulley puller is not always easy. I also thought that it was just a case of aligning the marks visible with the injector pump cover plate removed. I tried this but did not seem to be able to get the marks aligned. A talk with Pieter Taylor at Barras revealed that a 10% check requires all the timing marks on 3 gears to be aligned with No.1 12deg BTDC compression. Note that Yanmar label No.1 cylinder as that closest to the flywheel !!!! !! let you know the	Removal Crankcase pulley timing marks		Engines	65-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
170	2013	NC 33 Mk 1	Stern Gland	NC 33 Replacement Stern Gland I am after some advice, the boat is coming out this Monday, the stern gland is leaking badly I was hoping to replace it with a more modern design just wondered if you have any recommendations or suggestions? There is no clear answer to what sort of stern gland to fit, various members have used a variety of different makes. When Nauticat were asked why they still use the traditional stuffing box gland, the production manager said they are overall a safer option, as the modern dripless ones can have a catastrophic failure in his opinion. (the flexible bellows may split) There are basically two types, lip seals and face seals, both usually need some form of lubrication, feed from the engine water cooling system to provide constant supply of water, some popular makes are PSS (Packless Sealing System), Deep Sea Seal and Sure Seal, all available from various chandleries. Article on the different glands and previous Cat-A-Log article provided.	What type of Dripless stern gland		Propeller	65-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/</a>
171	2013	NC 331	Fuel Tanks & Pipes	Fuel Problems on a NC 331 (2006) One of our members has been plagued with fuel and engine problems, here are two reports he has provided. Fuel Tank The addition of fuel tank access plates to my fuel tanks is rather a cautionary tale for boaters who leave 400L of diesel in their tanks for any length of time !! I have been suffering from engine failures for several seasons, stuck injectors twice, and general poor engine running. The problems were traced to 'diesel bug', which typically causes filter plugging, something I have never experienced. Several solutions were tried, fuel treatments, fuel 'polishing', and the addition of a second primary filter. The fuel was analysed, 5% bio, with little water which was a surprise. However, the 'bug' gave rise to very sticky black deposits which was the cause of the injector problems. Matters came to a head in Dieppe this May when starting the engine for a passage to Fecamp. The engine started with clouds of smoke, and would not rev up. After consulting the marina office a local engineer was called, who arrived hours later. This was to set the pattern for the next 16 days ! The engineer did correctly identify that the low pressure pump in the injection pump was not working correctly. Thanks to the fact that I had the injection pump gear removal tool on board the pump was quickly removed and sent off to be repaired. The next days were full of frustration as the pump took many days to return. In the meantime both fuel tanks were emptied and the fuel ditched. The red diesel that was removed was found to be surprisingly clear. We filled the tanks with a minimum of 'white' diesel treated with Grotamar 82. With the fuel pump returned, fitted, the engine was started. On idle there was a little smoke, when revved a lot of smoke and on load little smoke. After cleaning the injectors, and tinkering with the injection timing the engine performed considerably better. We managed to nurse the boat back to our home port always keeping the fuel level as low as possible. It is quite challenging to add fuel to a tank in mid-channel ! On return the decision	Fuel Tank Inspection Plates Pipe connectors		Fuel	65-2013	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-65/</a>
172	2013	NC 33 Mk 1	Engine Hours	My engine hours meter has gone on the blink (it works sometimes!). It cannot be dismantled without damage because the front seal is rolled over. I have been trying to source a replacement but the modern ones are smaller in diameter (generally 2 ins.) whereas mine matches the other VDO instruments in the panel and has a 64 mm diameter dial fronting a 60 mm diameter body. E-Bay has not helped so far! Any ideas would be gratefully received. Further to my last, and for the benefit of any members who have a similar problem, I have now discovered that the hours recorder will not work when a battery charger is connected! When at my berth, I have a Constavolt charger connected. If I start the engine with the charger still switched on, the hours meter will not work – and it takes some time after switching it off for the effects of the charger to dissipate from the clock's electronic circuitry. The same thing happened when I tested the meter at home with a standard car battery charger. No bright ideas other than keep looking on e-bay, you could try talking to Furneax Riddall in Portsmouth PO35PA 02392668621, they have been very helpful in the past to several members trying to sort out VDO instrumentation problems. I did not find this out until after I had dismantled the meter by prising back the fascia ring. Happily, I was able to put it all back together reasonably well. We live and learn!	Hours Gauge, Charging interference		Electrics	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
173	2013	NC321	Water Heater	- I have a problem with the immersion heater in the calorifier on my 2002 321. The calorifier is the IsoTemp type 0400 (orange coloured unit) which is now no longer produced. When the immersion heater is switched on it trips both the boat's 240 Volt RCCB, but also the RCCB in the marina shorepower box. I removed the earth wire directly on the heater terminals and the unit then stayed on. However this implies that the immersion heater element has a leakage to earth which is what trips the RCCB. I am going to try and replace the heater which may prove difficult because it is tucked away accessible only under the saloon seat locker. Any knowledge about others doing this would be helpful. I ordered the heater element from Evesham Marina (01386 768500 www.webastomarine.co.uk ) They are distributors for Webasto products. It turns out that IsoTemp is a brand of Indel Marine of Italy. Webasto, a German company, in turn owns Indel. I have had to wait months for the part since it seems the supply chain is not very good, however Evesham have been very helpful. The element is part no. SEE0002HA and it cost about £52 including VAT. The old Suppliers list suggested Norfolk Marine but their price was rather higher. Also the list gave the element part number so I guess this element failure may be a common issue. I now have the element and it is clear the only way the old one can be removed is by having a suitable large box spanner to unscrew it (although even getting that on the old one maybe tricky). This is a 41mm spanner and I had to get a local tool supplier to order me one for about £20. If I have any further updates when I do (hopefully) manage to replace the unit I will let you know.	Water heater element replacement		Domestic	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
174	2013	NC321	Mast Wiring	I was intrigued and concerned after reading your article in the latest Cat-a-Log concerning your mast cables. I have a 2002 321 with the same glassfibre box for the cable entry through into the boat. Were you implying that your cables are jointed inside the box which is why they have become corroded and damaged? On my boat I believe the box acts purely as a 'swan neck' and all the cable are then jointed in the ceiling space above the heads using simple 'chocolate block' type connectors. They are accessible by removing the teak trim panels above and alongside the heads door. It is a total rat's nest of cables which in my case I have only had to access because of trouble with my VHF antenna and its subsequent replacement. I have assumed that all the sloop Nauticat's would be the same. So far as I know I have never had any problem with water ingress via the box. My boat has never had the mast taken down and if it does I am concerned about how easily all the cables can be pulled back through the box without damage. Any further comments on your cables and connections may be helpful.	Mast Wiring, connections swan neck		Rigging	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
175	2013	NC321	Fuel Tanks	One further point regarding fuel tanks after reading about 331s having problems. 321s have one plastic tank and I have never had any problems with dirt or sludge in the fuel. My boat is nearly 12 years old and has done about 1150 engine hours and I have only changed the primary fuel filter twice, and never changed the secondary filter on the engine. Whenever I draw off fuel from the filter or from the bottom of the tank it looks perfect. I wonder if I am just lucky or whether it is because the 331s with metal tanks get a lot more condensation inside the tanks. I have used diesel fuel additive for about 6 years now which is what I generally assumed had protected me from the diesel bug issue.	Fuel Bugs, plastic tanks		Fuel	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
176	2014	NC 36	Bilge Pump	I wonder if you could help me to solve a problem that I caused today with what I think might be my automatic bilge pump. On returning to the boat this afternoon after a couple of weeks away, I opened up the forward set of seacocks and the one in my engine compartment before being distracted by something; which meant that I failed to open the aft seacocks. Later, I decided to run the engine as she had been idle for a few weeks. After about 20 minutes I switched the engine off (with no problem) but could hear a humming noise (similar to that you hear when the Eberspacher is running). The noise continued and I got a bit concerned so I called SEASTART who advised me to isolate my batteries which stopped the noise. The chap on the phone said he thought it was the auto bilge pump which may have a "float" or something stuck in the pipes? My auto bilge pump is switched off though!!!! I have kept the battery power off and tried to trace the pipe that would hold a float or something similar but unfortunately I find that I have no clue as to what I'm looking for or what to do next. If you have come across anything similar on a Nauticat (or any other yacht) I wonder if you could advise me what to do next before I call out a Marine Engineer. It transpired that there were two switches the bilge pump was	Mystery Noise		Electrics	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
177	2014	NC 33 Mk 1	Accommodatuion Layout	I bought my 1974 Nauticat 33 about six months ago now and it's been away in a boat yard being repaired (a rather costly bit of work including a new deck as sadly someone appears to have previously put a rather nice new teak deck over a rotten ply one!) That said I am just getting her back now and am preparing to actually start using her. I have a project in mind and wanted to run it past someone who knows a little about these boats, and was hoping you might be able to help me. She currently has twin beds in the aft cabin. The standard setup with the bed to port, with a cupboard next to it, then the door, and a bed to starboard. The beds are partly underneath the seats in the wheelhouse. I am going to spend a lot of time on the boat, and want to convert this room to be a double (which I think was an original option) for me and my partner. The plan is to remove the cupboard and turn that into the other half of the bed. The challenge comes in that by removing the divide between the cupboard and the bed, I remove a piece of wood that looks like it takes weight from above (ie the wheelhouse seats etc). This is not the main support for the wheel house / coach work, there is a good support next to the door, but all the same I need to be careful. I am hoping to be able to remove this divide, and simply strengthen the wood running above the bed to ensure it does not bend - but wondered if you had come across anyone else having tried this? Sounds you have had an expensive start to owning a Nauticat, with respect to converting the aft cabin into a double, I have not seen a NC 33 with two single berths in the aft cabin, so can not offer much help other than to advise to proceed with caution in removing any woodwork which may look structural. I have copied John Claisse on this e-mail as he owns Zarzulea a NC 33 1973, so he may be able to offer some help, his aft cabin is a double. Not certain where you keep Honfleur, but we may be able to find other members nearby with similar boats, which may be useful to look at.	Aft cabin structure		Structures	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
178	2014	NC 33 Mk 1	Shower Drain	Do you have any idea how the showers on these boats originally drained? Mine appears to go down into a box under the shower tray and then out of there into a hole! The only logical option is that the hole simply drains into the bilge, but I have not been able to confirm that! Most Nauticats have the shower flowing into the bilge, my set up is the shower drain is connected to a pipe which runs to the deep bilge under the engine, again John Claisse may be able to advise, I know he has to empty his bilge in the galley area as well as under the engine.	Shower drain bilge		Domestic	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
179	2014	NC 35	Wiper Blade Supplier	In your technical database, do you have any information on where to source wiper blades for my NC 35? This problem of where to get replacement wiper blades applies to most Nauticats. I found they are made for American Trucks (flat front windscreens) and there are several outlets in the USA. I used Ryder. The details for the 15 inch blade are: ANCO Heavy Duty flat blade part number 51-15, available in the USA and on Amazon or from Ryder Fleet Products Ltd, Atlanta, GA 770 277 9629 - about \$5 each. There is a TRICO equivalent which I think has a part number of 61-150, but not certain. Ryder used to charge a lot for shipping to UK, but I had heard this may be more reasonable now, however some members buy something similar and then modify the fittings using the original part which attaches to the wiper arm.	Wiper Blades		Fittings	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
180	2014	NC 39	Water Tank	I have a question regarding my NC 39, hull number 021 built in 1994, regarding the Port water tank. This water tank is situated under the aft end of the berth in the mid / passage cabin opposite the galley. I have discovered that the plastic/inlet spout welded/fixd on to the tank has developed a small gap where it should be secured to the plastic tank. It looks as if the original plastic weld between the tank and inlet spout has split. Please note this is not the inlet pipe from the deck filler pipe. Whenever I fill that tank I now get a few gallons of water now being pumped out over the side by the bilge pump. Pictures 6; General view of the Port Side Passage Cabin. The water tank is located under the berth and pipe work behind the bottom right wood panel. Picture 7; Location of the Port Side Water Tank. The far bottom wooden panel is held in by two screws which appear to be located in the small locker show on the left hand side of the photo. I could not locate the screw heads to remove them! Picture 8; The position of the Inlet pipe. When I removed the side panel to take these photographs the inlet pipe came completely away from the top of the tank. It would appear that the "plastic" weld has failed. Picture 9; Photo of the inlet pipe pillar which should be welded on to the top of the tank. Ruler and tape measure (50mm) for measurement. I could not see any reason why the weld or glue / sealant has failed. My questions to Nauticat are: 1. What is the best material / glue / sealant to use to stop the leak and secure the inlet socket into the tank? 2. Can it be done / repaired without taking the water tank out of the boat? 3. If I have to remove the water tank from the boat, What parts of the "internal furniture" would need to be dismantled? 4. What plastic material is the water tank and the spout made from? Options to repair! 1. Weld a new inlet pipe on to the top of the tank. This would probably require removal of the tank from the yacht. From the rough measurements I have taken of the tank I consider that it would not fit through the doorway of the Passage Cabin. Hence I may then have to	Factory, water tank connections spigots	The water tank is made of Polyethylen, which is very difficult to glue and very rare sealants get a good contact with polyethylen. A photo would be helpful, but I believe the best solution would be to re-weld the spout back in place. That is fairly easy, if you have the right tools, or know somebody who has. You just need a bit of the same material, which we can supply and a heat gun to weld with. Removing the tank should not be necessary, if the spout can be welded back in place.	Domestic	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
181	2014	NC 42	Stainless steel silencer	The stainless steel silencer fitted to our 42 (No7 built 1995) is beginning to fail through rust. The thing is 9in high and 8in diameter and is fitted to the back of the gearbox by a plate. The question is do Nauticat make them themselves and if so do they have any left or if they now fit a commercial product who makes it?	Factory silencer	The silencer is made here at the yard, but since your boat has been built, we have started using GRP silencers made with vinyl resin, which we also make here at the yard. Without a photo showing the original installation, I cannot tell, does the GRP silencer fit the existing place, but if it doesn't, we can always make a similar stainless one. If you want to, I can give you a quote for both, but a photo would be nice to have before that.	Engines	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
182	2014	NC 33 Mk 1	Circular vents	Are the circular window vents a Finish product? The ones on our '78 NC33 have seen much better days.	Factory circular vents replacement	You asked about the circular windows. The product is not Finish, but I believe we can still get those. There is at least two different sizes, so could you please let me know the dimensions of your window, so we can check the availability and price.	Structures	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
183	2014	NC 33 Mk 1	Window seals	I have a very old boat and the seal for the portholes is a rather complex rubber arrangement which I understand is no longer available. This may mean I have to substitute all the portholes with something new. Have they any suggestions? Maybe they could let me have a contact at the factory, whom I should then contact.	Factory window seals	You asked about the portholes. Unfortunately exactly the same as you have, are no longer available, but do not worry, the portlights we use today are available and I believe the one used on NC-331 is the same size as yours are. Attached you will find pictures showing the portlight we use. If you could give me the outside dimensions of the portlights you have, or even better the opening dimensions on the hull, then we could check, does this one match the opening. Picture 10 & 11 Modern port holes	Structures	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
184	2014	NC 331	Switch wiring	A number of the switches on the main panel have wires connected, but the device is not fitted, e.g. engine room blower, engine room light, sea water pump. I have been unable to trace where the wiring routes or terminates, it is not obvious from the wiring diagrams? Is it simply that the wiring is not connected to the buses ahead of the steering position?	Factory Switch wiring	You are right, there is some extra switches, which are not in use on your boat. That is because we have some standard panels we use on all boats. If you look at the wiring diagram onboard and page 03.2, you can find for example engine room blower. Near that you can find a number X1.44. That number is the number of the connection inside the fuse locker, which you can find in pentry. Inside the fuse locker, you can find numbered fuses and also numbered connections and on connection number 44 should be a red wire coming from the switch, please check. The same goes with the other extra switches.	Electrics	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
185	2014	NC 331	Fuel Tank material	Nauticat fitted mild steel fuel tanks without any cleaning access plates to my 331. These tanks cannot be removed without first removing the engine. As mild steel and stainless are not vastly different in cost why aren't SS tanks fitted?	Factory, fuel tanks steel	Price difference of mild steel and acid proof steel is at the moment app. so, that acid proof steel is 8 times more expensive than mild steel, but the question is not only the price of material. We have been using fuel tanks made of mild steel since we started making boats and I do know, that even some of the very first Nauticat boats still have original fuel tanks without any problem, so we have had the opinion, that if moisture is kept out of the tank, mild steel is material good enough for this purpose. Naturally the conditions do vary a lot, climate, fuel etc. are always different, so some boat gets no moisture / water inside the tank as the other one gets a lot, but if water is regularly removed from the tank, the risk of corrosion is minimum. Therefore we have on all fairly new boats a separate hand pump for removing the water / dirt from the tank before it makes problems. I believe your boat has that pump as well.	Fuel	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
186	2014	NC 331	Fuel Tank Design	Having had 3 years of dirty diesel problems I wish that I had seen Tom Cunliffe's advice, namely 'if the prospective boat does not have fuel tank access hatches/plates, walk away, do not buy! My question of Siltala is therefore why don't they fit hatches as standard?	Factory, Dirty fuel, tank inspection	As told above, our opinion has been, that if one removes the moisture / water from the tank regularly, risk of problems with the fuel are very small. I do not know, what has changed, earlier problems with dirty fuel and bacteria on the fuel were very rare, but today they seem to be more and more common. Even though there is one opening on top of the tank one can use for cleaning, namely the fuel sensor opening, we have decided to add an inspection hatch also on the fuel tanks in the new boats to make cleaning easier.	Fuel	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
187	2014	NC 331	Rudder Servicing	On the NC 331 rudder, how does one service/maintain the lower bearing?	Factory Rudder service adjustment	The lower bearing of rudder is made of bronze and normally does not need any service. However, if the bearing does need service, it can be removed. The bronze bearing is made of two halves, which are bolted together through the GRP skeg. In case you need to remove the bearing, you first remove the epoxy coating on top of the bronze. Then you can find the bolts holding the two halves together. Epoxy gets soft fairly easy, so if you heat the bronze part with a hot air gun, you can get the bolts open and finally also the bronze parts separated from each other and the skeg. In case the sidewise play of the rudder is too big, you can sand the bronze halves slightly to get rid of the play.	Steering		
188	2014	NC 331	Fuel Filler	The deck fuel, water and holding tank filler O-rings. What size, material and supplier?	Factory, fuel filler o ring size	I believe you do have the stainless steel deck fittings. On FUJEL the O-ring is 3,0 x 45 mm and on WATER and WASTE the O-ring is 3,0 x 35 mm. O-rings you should be able to find locally, but in case not, we do have those in stock.	Fuel	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
189	2014	NC 38	Prop Anode	The prop on my 38 has a screw-in anode and I cannot find a source any more.	Factory Prop nut anode	You asked about propeller anode. I believe you mean the anode at the end of the propeller nut. If that is the case and you cannot find a local source for that, we do have those in stock.	Propeller	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
190	2014	NC 35	Speaker switches	The switch that controlled the cockpit speakers for my hi-fi fell apart and I can't seem to find one anywhere on the internet to supply a replacement, perhaps you would be kind enough to enquire on my behalf.	Factory cockpit speaker switch	The question concerned the switch for cockpit speakers. Below you can find a link to the manufacturers site. <a href="http://www.commutatori-palazzo.it/inglese/commutatori/en_11R.htm">http://www.commutatori-palazzo.it/inglese/commutatori/en_11R.htm</a> I hope this helps. If you still cannot get, let me know, we do have those.	Electrics	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
191	2014	NC 331	Feathering Prop	Can you enquire about feathering props for the 331? I would be interested to know if they fit them and/or if they have any recommendations.	Factory, feathering prop recommendations	On NC-331 we have used mostly two different feathering propellers. Max-Prop and Flexofold, both as three blade versions. Max-Prop is the Classic three blades version, link below: <a href="http://www.maxprop.it/site/productShow.php?lang=en&amp;idm=3&amp;ids=1&amp;id=2">http://www.maxprop.it/site/productShow.php?lang=en&amp;idm=3&amp;ids=1&amp;id=2</a> and Flexofold: <a href="http://www.flexofold.com/3-blade-folding-propeller/">http://www.flexofold.com/3-blade-folding-propeller/</a> Those both work fine, but Max-Prop is the one we have used much more. In case you need more information, please let me know.	Propeller	66-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-66.pdf</a>
192	2014	NC 38	Tri colour Light	Looking for a replacement lens for an Auqa Signal Tri Colour light, part identified, but most likely the cost of a replacement lens is nearly the same as whole assembly.	Nav tri colour light lens replacement		Electrics	67-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf</a>
193	2014	NC 33 Mk 1	Stern Gear Overhaul	A member has embarked on a complete stern gear overhaul, what follows is some of the problems: I am in a boatyard in Mallorca. We are trying to get the coupling off the shaft. We have taken out all the allen bolts on the inside, and thought the coupling may then come apart, we have disconnected the flange from the transmission and are unable to get the nut off the end of the shaft. Would you have a drawing of the coupling and how and in what order it is dismantled. Panic over...it's taken 4 hours but now sorted. Been on there 1 long time I suspect. We are unable to get the spider part of the coupling off the shaft. Huge puller and heat has failed and may have to cut it off. I am told by the company doing the job that it is a Vetus coupling which is no longer made or parts available. To be honest I don't know what make it is but information on the internet suggests Vetus. Can you help on this, is there any info on this type of coupling, and is there a supplier that you know of could help us, and did Nauticat fit a Vetus coupling at any stage, and is it likely that we could get the spider and new rubbers. Otherwise it means a new coupling, in which case could you help in identifying a suitable unit and supplier. (Alan) It could be a Nauticat made coupling which looks like the earlier Vetus ones? In library in Falmouth at present so have not got my info with me, will try and find info and hopefully find an internet connection in next few days. A replacement would be a Vetus type. Sorry to trouble you again but I am in a bit of trouble here. The old coupling had to be cut off which was a Vetus Type 10 now obsolete. We have been in touch with Vetus in Barcelona who have not been particularly helpful. Can you please tell me what coupling was introduced on the Nauticat 33, 40 mm tapered shaft, when the old type 10 was discontinued in 1999. We have asked Vetus simply to give us the type of coupling which replaced the old type 10 but they are evasive and are suggesting a replacement which means cutting the shaft to fit, something I am very opposed to, so at the moment we are in a	Stern Gear coupling, propellor stuffing box		Propeller	67-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
194	2014	NC 33 Mk 1	176	I have a 1980 Nauticat 33 and both fuel gauges seem to be faulty, when electric is switched on (to start the engine) the needles go full scale deflection to the right and stay there. Any ideas?	Fuel gage failure	(Alan) It sounds like the sender unit has failed. (most likely the rheostat (variable resistor) has got saturated with fuel and has failed or the wiper arm is not making electrical contact.) Another check to confirm this is to remove the wires from the sender and measure the resistance and see if it changes when the float is moved. You would expect a range of around 10 ohms to about 300 ohms, if you see no change in resistance then the sender is faulty. Depending on the detail design it may be possible to clean the rheostats but most likely you will need new ones. Its most likely that your fuel gauges are made by VDO a Germany company, the good news is there is a very good supplier in Portsmouth, Furneaux Riddall, (general electrical suppliers to auto and marine world) Portsmouth 0239268621, they have been very helpful to me and other NA members.	Fuel	67-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf</a>
195	2014	NC 36	Engine rocker gasket	I wondered if you could help me to source a Gasket for my engine rocker cover; I have a Ford Lehman 90HP 2722E and I've just noticed a slight oil leak on the manifold - my guess is that the gasket is split. I have searched the Internet for a replacement but all the companies I've tried say they cant help. Before I contact the Lehman Power Corporation in USA, I thought you might know of a UK supplier?? Any help you can give would be appreciated - I'm looking at doing an oil and filter change in a week or so and it would be handy to have one by then.	Rocker gasket spare ford lehman	(Alan) The engine model did you mean 2722E? As I don't recognise the 2272E, if it is a 2722E, then ASAP Supplies (www.asap-supplies.com) stock a rocker gasket Pt no. 157007 E8.25, for a Lehman ford 2722E.	Engines	67-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf</a>
196	2014	NC 33 Mk 1	Exhaust Hose	I have an old Nauticat 33, she has a Perkins 85 h.p. engine. The engineer who services and does repairs, and is very good, is having difficulty in sourcing the shortish flexible section of exhaust which connects to the rigid section. Can you advise ?	Flexible exhaust hose	(Alan) Not sure what size rubber connector for your perkins engine, but a good supplier of all things rubber is Portmere Rubber Ltd at Southampton 02380223628, they have a good web site as well. Hope this helps	Engines	67-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf</a>
197	2014	NC 33 Mk 1	Rudder Grease	Also I can find no spec for the heavy oil/light grease for the fixed grease gun for lubricating the rudder. Again your help would be greatly appreciated.	Rudder Grease type	(Alan)The grease needs to be a water repellent type, most chandleries sell a suitable grease used for boat trailer axles, stern tubes etc, ramanol white grease or duckhams keenol are typically used.	Steering	67-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf</a>
198	2014	NC 33 Mk 1	Fuel Pump	I noticed on Zarzula recently that my Perkins T 6.354 engine was idling at much higher revs than usual and that, when moving the throttle from high to low revs the revs dropped when the throttle was half shut and increased again as it was shut further. My engineer checked that there was no problem with the throttle control (a MORSE Marine MT-3) and reckons that the throttle plate within the pump may have some dirt on it or has become corroded. Following my attempt to run the engine on water off St.Vaast last year he has purged the fuel supply and added a cleaning fluid to it in the hope that the problem may be cleared in due time. If the above fails the pump will have to be removed, stripped and rebuilt. The local Perkins engineers quote E600 to find the part and replace it. If necessary I will have the job done in October after the sailing season is over.	Fuel Pump perkins service		Fuel	67-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf</a>
199	2014	Nc 351	Mast wiring	With reference to the comments in the last issue of the Cat-A-Log, the following comments received from our Chairman. The glass fibre box on my 351 just acts as a swan neck for cable entry and the connections are all in the heads' ceiling void behind a removable panel. In 6 years of hard sailing occasionally on very rough seas, some salt water must have penetrated and corroded the terminals and ends of the cables. This winter I am having it replaced with a stainless steel swan neck as used on earlier Nauticats. It will provide more protection. I will have to have the cables replaced as well.	Mast wiring, swan neck water ingress		Electrics	67-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf</a>
200	2014	NC 33 Mk 1	Windlass replacement	My 43 year old windlass has expired following a long illness, worn out by heaving up my 45 lb. QPR anchor, in spite of servicing and, latterly the help of my crew. It has been replaced by a new SWIFT Hector 1500W with foot switch operated motor. Fitting required a new wood pad onto the teak deck and an upgraded protection circuit breaker from 50 to 100A. Existing wiring to the wheelhouse did not have to be replaced.	Windlass replacement swift hector 1500w		Fittings	67-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
201	2014	NC 35	Radar	If you have read my article in this edition about our cruise on Jennyanydots, you will know that the radar failed. The symptoms were that on trying to use it, first time since last year, there was a sweep but no echo returns and then the fuse blew. On replacing the fuse the same sort of thing happened, I could see the sweep but no returns. I tried all sort of settings, but no joy. The manual gave a reasonable set of measurements, which I carried out and could see no obvious fault. I tried all the connections, especially the inline connection at bottom of mast, however I did not venture up the mast to check the connections in the scanner. On returning home I researched the possible problems and the costs to replace the aging Autohelm ST50 (Raymarine RL9). The biggest problem being the interfacing to the existing Raymarine system and if replaced with a Raymarine scanner, I would need a multifunction display, which I don't need (other than the radar display bit) as I have a Garmin plotter and run Sea Pro on my laptop. My research also indicated that it would be most likely be a magnetron or tuning PCB failure, so I decided that before I progress down the new radar route, I should attempt to find the problem with the existing system. Armed with a climbing ascender when we went down to the boat for a day, one of my jobs was to go up the mast to look at the connections in the scanner. If I found nothing obvious I would remove the scanner. As I prepared to go up the mast, I decided I would try it one last time ... it worked!!! I can only think that the scanner got water in it during the winter, and we also had several days of really heavy rain at the start of our cruise. Therefore, when switching on some kind of short occurred due to dampness, hence blowing the fuse, or causing a fault on the PCB. As the last few weeks have been really dry and hot, the scanner could have dried out eliminating any possible problems due to dampness. I do still need to up the mast to see if I can see any signs of water ingress. I will continue my research in how best to replace the system whilst retaining most of the	Radar no signal returns connections		Electronics	67-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-67.pdf</a>
202	2014	All	Hydraulic fluid	What is the correct hydraulic fluid for the steering and where can it be sourced.	Hydraulic fluid type supplier	The steering hydraulic oil, I have used is Shell Donax TF a transmission fluid, only because a bottle came with the boat several years ago. Seastar Capilano systems (makers of steering system) recommend Dexron II ATF (Castrol), which you can buy in Halfords, used in automatic transmissions.	Steering	68-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf</a>
203	2014	NC 331	Deck Drains	Ever since owning a NC 331, it's been difficult to unblock the scupper drains which flow from a deck drain to an outlet on the topsides via an internal pipe. I have tried everything before coming across "The professional power plunger" made by monument tools and available from Screwfix (about £30) amongst others. It works by pressurising an air chamber by hand pumping and then blasting the dirt out after connecting it to the drain (either end) and pressing a trigger. It really works well and has saved me hours of frustration. One of the connectors is exactly the right size. Especial useful, as sailing with a dog, the hairs are particularly problematic.	Deck drains clearing		Structures	68-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf</a>
204	2014	NC 33 Mk 1	Engine temperature	Member trying to locate information on Ford engine temperatures as the temperature gauge is reading low and how to replace thermostat.	Engine run temp thermostad	The information I have on the Ford engines, indicates that the thermostat is set to open at 160 F, and the normal operating temperature would be in the range 175 to 190 F. Some reports from the USA indicate under heavy load temperatures of up to 210 are not un-common, but this may be a bit too hot as the overheat alarm is set at 220 F. The thermostat is normal close to the fresh water pump at the front of the engine, copy of a generic Ford 2700 series engine showing location of the thermostat. Contacted other members with similar aged boats and obtained the following: NC33 1978 fitted with a Ford 2712 marinized by Gustavson of Sweden. An expansion tank (water & glycol circuit) is attached to the front end of the 2712 (eg. opposite to the propeller) and covers the hole where the thermostat sits, that one can clearly see in the Ford 2700 Series.docx provided along with a drawing of that part of the marinization by Gustavson. Even though I have plans to inspect the thermostat, I have not yet removed the two screw that hold the tank on the engine. I have been told it's easy. I have also included a picture I took of my engine annotated with temperatures observed with an infrared thermometer after two hours at 1600 rpm. This may help you too. All temperature are Celsius, 195 °F is 90 °C which is the value displayed overhead after 20 minutes but the engine itself does not reach value higher than 70 °C. On the picture the expansion tank is at the top and is labelled "vase d'expansion"	Engines	68-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf</a>
205	2014	NC 33 Mk 1	Hatch Handles	The forward hatch was carelessly shut with the handle in the closed position and sadly broke the latch - see pictures below.	Replacement hatch handles	My research into the hatches has revealed NC Bjerg are no longer with us. I think I have found a trader who sells the whole mechanism for £160+ for two, plus postal charges, currency conversion etc. These are supplied by HR Spares of Denmark. Hallberg Rassey, another quality Scandinavian boat builder, I believe, also used to use Bjerg hatches. I wonder if you have knowledge of how I may be able to obtain just a single replacement handle at a modest cost? I know the handle you mean, same as fitted on my NC 35, unfortunately the Hallberg Rassey is the only lead I am aware of, but you could try Ertec who took over the NC Bjerg products, but I think they have a fairly large minimum payment, details are: ERTEC DANMARK ApS. EGESTEDVEJ 2B - DK-3320 SK/EVINGE - DENMARK PHONE: +45 48 28 48 91 - FAX: +45 48 28 48 92	Structures	68-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
206	2014	NC 331	P Bracket	I would appreciate any advice you could give on the investigation and repair to the 'P' bracket on my 331. Unfortunately I got a prop wrap while docking in the Mediterranean, as you know generally there are light lines attached to the dock which lead to a heavier line that is anchored to (often) a concrete block that is used to steady bow or stern depending. I got a wrap from the lighter line that was attached to the dock, the disc cutter ahead of the prop didn't do its job so the result was that there was a heavy jerk and the motor stalled as the prop stopped turning. I donned scuba gear and cut the line away successfully however I did not see any obvious damage at the time. A few days later I felt that there was greater vibration than normal at the stern albeit small and decided to limit revs and have the boat lifted as soon as I could practically? The photo below was taken when the boat was lifted and stored ashore recently and shows that the 'p' packet must have moved slightly as a result of the jerk when the prop wrap occurred. The resultant minor mis-alignment of the shaft I presume caused the additional vibration. What investigation should I expect an engineer to carry out? How is the "P" bracket fixed to the boat therefore if it has moved very slightly what is the likely impact? In the light of the above what might the repair entail? In the previous Cat-A-Log there was a report on a suspected bent P Bracket, fortunately it transpired that it was not necessary to remove the bracket, just fit new outlass bearing and carry out an alignment of prop shaft.	Bent P bracket, removal, alignment	I assume the NC 331 is similar to the NC 33 with respect to the attachment of the P bracket. In which case the bracket is held in place by 4 screws, the heads will be filled in and faired in to make a smooth finish. In the past I have heard of other N 33's removing the P Bracket and re fitting and aligning them by bedding them down in a fibre glass mat. The alignment of the engine via coupling to the P bracket would need to be checked by the engineer, this may involve disconnecting the coupling to see how much it's out of alignment, and then removing and refitting the P Bracket. I have asked the factory to confirm that the 331 is a similar construction to the 33 and what alignment should be carried out. Factory Reply The P bracket is fixed in place with four bolts, which go through the hull to the aft cabin. In addition to that there is epoxy filler in between the bracket and hull. In order to remove the bracket, you need to locate the bolts inside boat, open the thin grp laminate protecting the bolts to get access to the nuts. Then you need to heat the bolts and bracket outside to get the epoxy softened, after which you can open the bolts and remove carefully the bracket. If the bracket is bent you can try repairing, but most probably need a new bracket. If it is bent. When reinstalling the bracket, you need to install it in correct place and direction, so the lining of the shaft remains perfect. Thank you very much for this it was kind of you to contact the factory; I have a couple of supplementary questions if you don't mind. Are the p bracket bolts located under the floor in the aft cabin? If not do you know where they are and how to uncover them? (I'm at home and the boat is in Italy so I'm relying entirely on memory as to where stuff is positioned). The bolts are under the floor in the aft cabin, not sure on the detail layout of your boat, (standard or live a board) so not sure how accessible, I know mind NC 35 are buried under step in aft cabin. I will try and find out a bit more for you, at the East gathering this coming weekend I will ask around for some practical advice. Members reply I've attached 3 pictures of the 331 P bracket fixing. There are 4 bolts with flat heads which come into the hull beneath the stern	Propeller	68-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf</a>
207	2014	NC 33 Mk 1	Fuel Tanks	On my Nauticat 33 (now 33 years old) the bottom of the diesel tanks on the outside is rusting. I believe that the iron used is thick (2-3 millimeters), and that it may take time before leaks appear. However, do you know if there is a possible preventive care, or a cure? Further more do you know if tanks replacement entails engine removing? Are there alternative solutions?	Rusting fuel tanks replacement	The problems of rusting steel fuel tanks has been experienced by many members, you may be able to slow down the rust, but like old cars once they start to rust it's nearly impossible to slow the rusting progress down. We have many members who have changed fuel tanks, not an easy job and depending on the layout of the internal woodwork it can be disruptive. We have one member who went for a smaller replacement tank to make it an easier job. I will circulate members to see if we can get some more experiences for you.	Fuel		
208	2014	NC 33 Mk 1	Emergency Steering	Many Nauticat owners laugh at the jury rudder provided by Sillata, which consists in a steel tube to be installed directly on the rudder mesh, in the bottom of the aft cabin, which means that you steer while seeing nothing of what happens to the boat. Do you know if anybody conceived and tried an alternative solution, or a mitigation solution?	Emergency tiller rudder	This topic came up at the East Coast gathering and Tech-Ni-Cat, a member with a NC 36 had a steering hydraulic failure on a crossing from the East Coast to Holland this summer, he had crew with him and he positioned a compass in the aft cabin and one of the crew used the emergency tiller, he was seasick fairly quickly, they did find someone who could cope with the motion in the aft cabin and my shouting commands to the unfortunate crew in the aft cabin they made it into port. Amongst the members at the East Coast gathering, at lot confirmed their boats had been modified, by the steel tube being extended through the aft cabin roof and a tiller fitted above deck, this can work but some said the amount of tiller movement could be restricted depending on the layout of the deck above the aft cabin. My boat NC35 has such an arrangement, but I have not tried out the arrangement, and when I had a safety check carried out by the RNLI, it was something they said you should try out, as if you had to use it in anger, as that was not the time to experiment with the system.	Steering	68-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf</a>
209	2014	NC 33 Mk 1	Charging circuit	After some work on the alternator and electrics the Red charging light does not go completely out, although the batteries are charging. The electrician is going to replace the ignition switch as it seems to have a poor connection to the alternator charging light circuit.	Charging light not going out	The light should go out, so it will be good to hear if the new switch fixed the problem. Previous reported problems with charging light not going out, although several different electricians had looked at the fault and had the alternator tested the fault persisted. Then another electrician took the alternator away and it was eventual found to be faulty, so after a bit of a saga it's now fixed.	Electrics	68-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf</a>
210	2014	NC 33 Mk 1	Rudder control	While the boat is left for a few days the rudder moves over to one side?	Rudder drift, not in use	This sounds like a hydraulic leak, so the rudder is not being held in the last position it was put there by the helm, it could be that the leak is on one side of the hydraulic ram, allowing the rudder to move.	Steering	68-2014	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-681.pdf</a>
212	2015	All	Wipers	On lifting the port wiper arm to tuck the canvas cover under and a spring popped out to greet me, picture below. Picture 1 Broken Wiper Spring. I have been around all my local car bits shops and nobody can help - any ideas? Yes this has happen to me, I bought the springs from Entextocksprings ( www.entextocksprings.co.uk), they had a minimum order of about £10 and the springs were about 60p to £1 each, so I bought a selection to find the best match, I think the ones that fitted are 9.53mm diameter and 65mm long (part number 554), but not sure. I had to modify them by cutting the eye ends to make a hook end.	Wiper Blade Springs		Fittings	69-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
213	2015	All	Seacocks	Do you happen to know where Nauticat source their seacocks? Mine are all OK after 20 years but a friend with a Moody is envious of the free movement of my seacocks; however I have been unable to give him a name. Apart from ensuring free movement reasonably regularly I do nothing else to them. Should I? I don't know the source of the Nauticat seacocks other than they are good quality, I will try and find out and let you and other members know. With required to maintenance of seacocks (the ball type), the important thing is to look at them regularly and operate them, if necessary the spindle can be greased, but if they operate freely and don't leak then that's probable OK. My boat is coming up to 20 years old as well, and the only sea cock which shows signs of deterioration and rust on the operating arm, is the sea cock I change following the surveyors suggestion that should be changed when I bought the boat! I came across the name on one of my seacocks - presumably the others are the same, they are made by the Finnish	Sea cocks fitted by Nauticat		Hull	69-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf</a>
214	2015	NC 33 Mk 1	Handrail	I wonder if you can help me with a problem I have concerning my boat. The marina were I keep my Nauticat 33 MKII have managed to smash the handrail on the port side forward and, as such it needs replacing. I have been in contact with Nauticat and, they can supply a replacement but the cost is quite hefty at over 2000 euro delivered. I was wondering if you have any contacts in the UK where, I may be able to get one at a more agreeable cost. A possible route to fix the hand rail would be to fine a good shipwright/carpenter who could construct the hand rail, the later Nauticats the hand rail was constructed of 3 smaller pieces of wood glued together to form the curve of the hand rail. If any of the stanchions are damaged, then most stainless steel fabricators could re make or straighten the original ones. The fixing of the stanchions to the deck will have been stressed (even if they are not bent), so it may be worth having them re sealed to stop possible leaks.	Handrail damage, repair		Fittings	69-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf</a>
215	2015	NC 33 Mk 1		I have a problem with a leaking HMI seal on my 1978 NC33, when she was taken out of water a notable amount of greyish (milky) oil came out of the hull along the propeller shaft. A quick look at the lubricating oil tank inside the boat revealed discoloured oil which, according to documentation, is the evidence of some lack of waterproof at the back seal. The yard dismantled the shaft and noticed some slight wearing and some used rings (probably O-rings). They are still investigating but clearly some parts will have to be replaced. Do you happen to know a supplier of spare parts for that seal .As you probably know the HMI seal is no longer made, the manufacturer Halyard has said in the past that there are no spares, but it still might be worth a call ( Halyard 01722 710922 ). The lip seals may be a standard part that you could buy from a general seal manufacturer, as long as you have all the dimensions, a couple of suppliers I have used, O rings from www.polymax.co.uk and oil seals from www.bearingsrus.co.uk Two web sites that I have not used but may be another source are bearingboys and simplybearings.	Prop seals, non drip halyard		Propeller	69-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf</a>
216	2015	NC 321	Hydraulic steering	After reading a piece in the latest Cat-a-Log about steering systems, I thought, maybe like you, that modern Nauticats have hydraulic steering systems regardless of whether they are wheel operated or just by autopilot. My NC321 from 2002 has no inside steering wheel just the navcenter option with 3 autopilot positions in the boat. The 2 hydraulic systems operate separately with a single ram on the rudder. However I was surprised to find that the factory spec for the 321 says: STEERING Two independent hydraulic units employed in parallel, one for the pilothouse helm and other for the cockpit helm station. Rudder of GRP, rudder stock of acid-proof steel, support of bronze. Emergency steering by means of a tiller connectable directly to the rudder stock. The boat can also be equipped with Whitlock mechanical steering in case of navcenter interior. From pilothouse the boat can be controlled by an optional autopilot. It's a bit ambiguous but I assume the option means Whitlock in the cockpit and therefore overall a cheaper system can be installed with the autopilot maybe using a motor drive on the Whitlock steering. Other models spec sheets I have only seen to mention hydraulic systems. However I dug out a NC39 one which shows it with Whitlock steering in the cockpit as standard although hydraulic inside. So overall I am a bit confused now. NCs with 2 steering positions, both hydraulic - do they then effectively have 3 systems with the autopilot included or do the 2 wheels act in parallel with both moving in tandem? Yes it all sounds a bit muddled, I will do some more research and try and produce some info for a future Cat-A-Log. I can answer your last point as my NC 35 has the what I understood to be the standard fit, ie inside and outside helm and autopilot all hydraulic connected to signal ram. The system is connected up in parallel. Whichever wheel is turned the other does not move (non return valves in steering pumps) and when the autopilot is engaged neither wheel moves when the autopilot demands a rudder change. So in effect you have three means of	Hydraulic steering systems inside helm		Steering	69-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf</a>
217	2015	All	Electrical Switches	Don't know if you know about these guys, but they sell the electrical switches found on my instrument panel. They come from Malta who I originally emailed. Their website is <a href="http://www.maxparts.biz/">http://www.maxparts.biz/</a>	Replacement electrical switches		Electrics	69-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
218	2015	NC 36	Calorifer	I wonder if you could advise me on where to find a replacement Calorifer to replace the rusty leaking one I have currently. It looks as if it's the original (1984) water heater and it's a 6 Gallon version. Interestingly, it is 118 volts (US) model. I'm trying to find the same model with 240 volts and I've looked on the Raritan Engineering Company website but the layout of the fittings etc, look different. Additionally, the one on their website costs \$1275 and I wondered if I could find one that would be roughly the same price as one here in UK (~£400). I am hoping to find one which doesn't require me to alter the hose configuration to/from the engine into the water heater space - probably wishful thinking though. Any advice you can offer would be appreciated. I guess you are looking at Raritan Engineering as that's what is currently fitted; I have no experience of this range of calorifiers, so not certain of the pipe layout, the following may help. Raritan Engineering has two UK distributors; Lee Sanitation, in Warwickshire, www.lesan.com these folk are usually helpful or Mark Dowland Marine, Wareham, which looks like a spare part distributor. Possible replacement calorifiers to look at to find the closest layout to existing one are: Surejust, www.surecal.co.uk Webasto, Isotherm range (commonly used on Nauticats now), www.webasto.com Aquafax, 3 models Aquafax, Sigmar & Termionox, www.aquafax.co.uk All of the above are available from most chandleries, hope this helps, but I think you may be faced with a bit of modification to pipe work.	Replacement ratitan calorifer		Domestic	69-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf</a>
219	2015	NC 33 Mk 1	Chart Plotters	Looking at investing in a chart plotter this coming season. Bearing in mind the space limitations of the chart table on 33 Mk 1's, and not having too smaller screen and spending around £500 or so do you have any recommendations on either a manufacturer or model. There are several routes to a chart plotter solution: 1. Integrated system with all navigation instruments connected to the chart plotter, this is the RR solution allowing all the clever functions of the chart plotter to work, this is obviously the expensive solution and typically would be a Raymarine product, I should imagine it would provide too many function for what you need and £1000 plus 2. Standalone chart plotter, with no desire to connect it up to other instruments, bearing in mind the comment on screen size and cost, you could look at Garmin 500 or 700 range £700 to £1000 or Lowrance Elite 7" £450 to £550, you get a bigger screen with Lowrance for your £. These are still fairly small screens but are OK once you get use to looking at a small section of chart. Most of these will allow you to connect to an AIS receiver which is good addition. 3. There is the laptop solution, bigger screen, and a range of chart/navigation software to choose from, a very cheap solution for the software could be something like SeaPro starter pack around £100 going up to £350 or SeaClear supplied with the Raster charts when bought through my Harbour £40, most of the packages will take an AIS input. The advantage of this solution is you can play with the chart software at home. 4. The latest trend, which I have no experience on is to use an i pad running one of the many navigation packages, there has been a few articles in Yachting Monthly on using i-pads and tablets, I will dig a few out and send you a copy. My set up, which grew from what was originally on the boat when I bought it, is; Primary GPS position from an old Garmin 120 this provides position to radio and the Raymarine data network. Also as a completely stand alone system is a Garmin 360 chart plotter, small small screen, use in cockpit just to keep check on general	Upgrading Chart Plotter		Electronics	69-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf</a>
220	2015	NC 38	Cabin Leaks	I have a Nauticat 38 from 2009, I have a small leak of water originating from the roof of the wheel house, and it could well come from a few fixtures on the roof or the various fittings of the navigation instruments on top of the roof outside. I have been trying to access the inside of the roof of the wheel house, by unscrewing the small wood laths which run all the sides of the white panels, but that doesn't seem to be helpful as the whole roof seems to be stuck in place. Do you know what is the proper way to remove the roof panels? In the same line of issue, I had been hoping to get access to the inside wall of the stern of the boat so as to check the fittings of the back platform and eventually install some davits. Unfortunately the whole back panel (wood laths) in the aft cabin does not seem to offer any possibility of unscrewing and taking down the laths. Some people have told me you had to carve a hole in the panel and then re-construct it! There again, do you know what the shipyard recommends? I have attached photographs to illustrate my queries. Picture 2 Roof panels Picture 3 Aft Cabin Leaks are always such a pain to track down, when I first bought my NA35, I had a similar leak into the main cabin, which required taking down a section of the roof lining, not an easy job, photo of the roof lining removed in the aft cabin below, which is a similar construction as the main cabin. The thin battens cover the screws which hold up the white panels, but the problem is, Nauticat put this up first then fit the side bits of wood, these cover the curtain tracks, these are screwed up and glued to form joints at the corners, so requires some destructive wood work to remove them. Also the white panels are under the hatches. You may be fortunate to remove some of the panels away from the windows, so avoiding dismantling the curtain woodwork. I have not tried removing woodwork on the stern in the aft cabin so no actual experience, again I expect its glued and screwed to battens which are stuck to the fiberglass, from your picture you can see in the middle that there is some wooden plugs, which may cover some	Fixing cabin leaks and removing head lining		Structures	69-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/09/Number-69.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
221	2015	All	Stanchions	Have had several queries on sourcing the stanchion bases, as the stanchions holders (base units) are alloy and have fused / bonded to the stainless steel stanchions and will require replacement. I believe for a period Nauticat used a company called Jukova Oy, a Finish company; Jukovantie 20 21430 Yliskulma FINLAND Tel. +358 10 474 444 Fax +358 10 474 4290 A link below to relevant page in their product brochure. <a href="http://www.jukova.com/jukova/cms.nsf/pages/ACBEF8D84FF22368C225">http://www.jukova.com/jukova/cms.nsf/pages/ACBEF8D84FF22368C225</a>	Replacing Stanchion bases		Fittings	70-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf</a>
222	2015	All	Copper Pipe	Had a query from a member to what was the additional copper pipe fitted in the anchor locker which went to the galley area. My guess was that it was an additional gas pipe, but the answer from the factory was; 'The copper pipe you have found, is for sea water, when ordered as an option. The other end of this pipe should be found inside pantry locker, somewhere under the pantry sink. We install this pipe as standard, even though no seawater would be ordered, as it is so difficult to get there afterwards.'	Mystery Copper pipe in anchor locker		Domestic	70-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf</a>
223	2015	NC 33 Mk 1	Engine mount	I need to replace the rear engine mountings on the Ford engine and would ask if you have any information where I may get these please.? The engine mounts are usually made by Trelleborg UK Ltd, PO Box 98, Evington Valley Road, Leicester. LE5 5LY. Tel: 0116-267-0300 (Andy Brown, Engineering, andrew.brown@trelleborg.com) (Matt Eastham, Sales, mathew.eastham@trelleborg.com). There is also a supplier which may be able to help, Tony Grover (Sales Manager) Robush Ltd, Bridge Farm, Ash Road, Wickham Market, Suffolk IP13 0AA. Tel: 01728 748336 Fax: 01728 748332 Email: sales@robush.co.uk <a href="http://www.robush.co.uk">www.robush.co.uk</a> The ones fitted to the earlier NC 33 was a round Metalastic mounts fitted to earlier 4 cylinder engines: Front Pn 17/482-45 (blue spot) Rear Pn 17/482-60 (white spot) 6 cylinder engines use all	Replace engine mounts		Engines	70-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf</a>
224	2015	NC 33 Mk 1	Oil Filters	Have had several queries and information on the oil filters for the Ford Lehman engines. I am not an expert on the Ford range of engines, but this is what I understand: The Ford Lehman 2712e, hand a range of filters depending on age etc, also some people may have converted the cartridge type oil filter to the spin on canister type. The spin on type comes in 2 thread sizes 22mm and 3/4 16 unf, there are 2 suppliers ASAP suppliers, 44 1502 716993, who provide a spin on filter C105, a 3/4 16 unf version, also they provide a conversion kit form cartridge to spin on. The other supplier is In Line Filters, 44 1579 321351, ( <a href="http://www.inlinefilters.co.uk">www.inlinefilters.co.uk</a> ) who provide a spin filter FFR-PH2975, 22mm thread and FFR-PH8 spin on 3/4 16unf thread. They also provide a cartridge filter FFR-CH836 (£3.17) which looks as it fits the Ford 2712e with the cartridge type filer. Also just heard the cartridge filter could be a Ford EFL 8.	Replacement oil filters, spin on and bolt		Engines	70-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf</a>
225	2015	NC 33 Mk 1	Replacement	A member in France is changing his engine and hence has some spares, and the complete old engine, the details are; The engine is a 2003T. If anyone in the association could use the engine for parts – let me know. I have a lift pump & injector – new and still boxed. I think they fit the 2003 because the 2003T was just the 2003 with a turbo added. The engine runs but it sounds rough. The problem arose suddenly. It has run 850 hours. I bought a Beta - Yanmar are getting a bad name here for a poor spare parts service and very high prices. The clincher was Beta's service that includes brackets to convert the original mountings to suit their engine. I am also changing the fuel tanks because they are mild steel and corroding. Building a boat in such a way as to require destructive dismantling to remove mild steel tanks is unforgivable. I do wish the European Recreational Craft Directive was a serious bit of legislation that ensured sound boat construction.	Old engine for spare		Engines	70-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf</a>
226	2015	NC 33 Mk 1	Heat exchanger	I have removed the heat exchanger from my Ford 2175e to replace the thermostat and have stripped down the heat exchanger and had it all cleaned (was running to hot), to the starboard side of the exchanger the oil cooler is attached which I need to reassemble with new seals I have contacted mermaid marine for seals who advise me to contact the association to obtain them. A parts list of the marinised Ford Lehman provided, but would welcome any information from other members on sourcing spares for these engines. Thanks for the help and the marinisation maual but the manual does not show an oil cooler, it must have been an add on. I have replaced the seals, I used O rings purchased from ERIKS who specialize in them, anyone contemplating doing the same task would be advised to remove the existing seals as samples before cleaning.	Servicing heat exchanger, seals		Engines	70-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/08/Number-70.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
227	2015	NC 33 Mk 1	Morse Controls	The engine control lever (Morse control) has become very slack and when pushed forward as far as it will go, it only gives 1400 rpm. I had thought that an adjustment where it engages with the engine would sort it out, but my engineer insists that the problem lies with the unit above the steering wheel and that this needs replacing. Do you have any experience of this and if it needs replacing do you know where a replacement can be obtained? I have very limited experience with the morse controls, other than greasing and checking the engine end of the controls, a couple of things to consider. 1. Do you have an outside steering position? If so does the same problem occur when using the outside position. 2. When the throttle is set for engine warming, does the throttle achieve a better range. 3. I have heard of the cam wearing in the throttle unit, but not certain what this would cause, usually associated with engaging gear and reverse. 4. May not be the right manual, but have attached a copy of an old morse control which may be of help. Sorry not to have more useful information, let us know how you get on. Very many thanks Alan for your suggestions and the Morse manual. We don't have an outside steering position, so can't follow this one up. Your mention of the cam wearing might well be the relevant point. Ignition	Limited throttle movement with a morse control		Engines	71-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf</a>
228	2015	NC 42	Starter switch	Any idea where to source the ignition switches NC use, the keyless turn to on then again to start used in the pilothouse (at least on the 42)? I tried Veli at the yard but they are on holiday and he implied that they were readily available in the UK. I believe the switch was made by Telemecanique, now taken over by Schneider and the switches are still produced and available via UK distributors, Farnell being the most likely to be able to help. Farnell, www.farnell.com, have on line purchasing system. Customer service 0344711113 The switch consists of several parts, the frame, including the knob, a contact block then two plug in contact modules. In the past it has been one of the plug in contact modules that has failed. One module is the switch on for the power to the engine start and control system (posn "On"), the other is for signal to the starter relay (posn "Start"). The part numbers are most likely as follows, would need to remove existing switch to check. Frame/Knob ZB4 BD8 Contact block ZB4 BZ101 Plug in Contact modules, ZBE 101, ZBE 102 (these were marked with a red and green spot, depending on switch contact arrangements. Have attached a information sheet on this range of switches, which may help.	Starter switch replacement, Telemecanique		Electrics	71-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf</a>
229	2015	All	Hatches and Windows	Over the last few months I have numerous queries with regard to sourcing parts for hatches, windows and a complete hatch. The hatches were made by a company called NC Bjerg, unfortunately they went out of business and Ertec took them over. They supply similar products but may have a minimum order. Details for Ertec are: ERTEC DANMARK ApS. EGESTEDVEJ 2B - DK-3320 SKÆVINGE - DENMARK PHONE: +45 48 28 48 91 - FAX: +45 48 28 48 92 Another possibility is via the Hallberg Rassy spare parts web, as they use similar fittings to Nauticat, the link is below: <a href="http://www.hr-parts.com/contents/en-us/d18.html">http://www.hr-parts.com/contents/en-us/d18.html</a> This worked for one member purchasing from Hallberg Rassy a Berg Crown Assembly part number 104440 at a cost of £20.	Parts for NC Bjerg hatches and windows		Structures	71-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf</a>
230	2015	NC 33 Mk 1	Refurbishment and fuel	I read in the current edition of Cat a Log that a French Member has got to change the fuel tanks in his Nauticat. I am part way through a "Keel Up" restoration of a 1973 Nauticat 33, and also need to replace the fuel tanks. I have spoken to Veli at Nauticat and he tells me that the engine has to come out. Can you please help with this problem? Up to now all the through hull fittings have been replaced, the hull treated to protect against osmosis, a complete new gunwale as well as a complete change of all ropes and standing rigging. The Cylinder Head has been totally refurbished and a new Perkins starter was fitted, the engine now runs like new. I also need to source a new Rubber Seal for the Clearview Screen, any ideas?	Changing fuel tanks	Veli, is correct about removing the engine, if you want to remove the tank whole and replace with same size. Over the years others have tackled this by cutting the tank into small sections and replacing with smaller or different shape tanks, to save taking the engine out or destroying a lot of the wood work. I have attached two articles from previous Cat-A-Log's which may help. 1. Tanks. I believe Nauticat have used Stainless Steel fuel tanks on some boats, but Veli still thinks the mild steel is OK and cheaper. I don't think stainless is a problem as long as the appropriate spec is used along with the weld. Plastic is another option and Tek Tanks will produce tanks to measure. Tek-Tanks Ltd The Old Stables West End Farm Colthouse Lane Upper Froyle Hampshire GU34 4JR England Telephone: +44 (0)1420 525477 Fax: +44 (0)1420 520840 Web www.tek-tank.com General Enquiries: enquiries@tek-tanks.com Sales Enquiries: sales@tek-tanks.com 2. Clear Screen Seal There are several manufactures of clear view, but below is a few suppliers of rubber seals. www.Sealsdirect.co.uk www.littleportboathaven.co.uk www.technix-rubber.com Many thanks for the info you sent me it made interesting reading but I was a bit concerned about the greatly reduced capacity. I had thought of cutting out what is left of the old tanks (not much) and getting a local farm engineering company to make me some new ones in Stainless Steel, as per the drawings that Veli sent me but Stainless does not seem to be the road to go down according to your man. Can you suggest a manufacturer that could supply tanks in another material as per the drawings? Just a quick mail to let you know that I have solved the Clearview Screen Seal problem. I received from Seals Plus Direct a piece of Rubber Seal (Part No ETS60) and when I tried it this morning it looks to be ideal for the job. The service I have received from this company has been excellent, as was the price £15 and the item delivered to La Manga Spain.	Fuel	71-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
231	2015	NC 33 Mk 1	Redfurbishment	I assume that the one fitted is a NECO system, and the drive is chain on to the wheel house wheel? I would probabbe go for a RAYMARINE system, although expensive they have a good range of drive systems which should be able to meet your requirements. Attached article from PBO on replacing an autopilot, may be of interest. Samson Post Replacement Do you have any info on replacing both Bow and Stern Samson Posts, my bow posts have completely rotted through and the top 18inches can be lifted through the deck while the stern posts are loose but still whole. I have been told that these are bolted through the frames and then fibre glassed for extra strength. Please can you throw any light on this problem? Unfortunately, I don't have much personal knowledge of the early 33 models which had wooden samson posts. This was changed to stainless steel posts when Nauticat changed to the all fibre glass cabin structure hull number 500 in 1978. The posts go down to the keel; to replace them will depend on the amount of internally panelling that would have to be removed to gain access. Depending how far down the rot has gone it may be possible to graft/join a new section of post. Both these will probably require a fair degree of carpentry expertise, especially if the internal panel work has to be removed without causing too much damage. I have attached an article written by one of our members who has carried out a repair on his samson posts, hope it	Samson post replacement		Structures	71-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf</a>
232	2015		Water Blockage	We had a great time this year joining Joel Rogale on the Brittany Cruise. However we had only one technical problem. Our automatic bilge pump started working energetically and after going through many checks we found that we had a hole in a rubber hose on the salt water cooling system. The one nearest the impeller. We managed to get ourselves escorted into Cameret where a local engineer eventually found a blockage of salt and 'crud' in the elbow joint into the heat exchanger. Nauti Lady is a 1989 33 and this build up could have been over many years. We would like to make other Ford Lehman owners aware of the possibility of this happening. We had not realised that the flow of water through the engine had been reducing, either out of the exhaust or our of the starboard indicator pipe, but now this blockage is fully cleared there is much more water going through the engine. We were later advised that every few years one should back flush the primary circuit to obviate build up!	Water exhaust blockage		Engines		
233	2015	NC 331	Rudder construction	I have a few questions. Having applied the antifoul I noticed water appearing from the lower bearing for the rudder stock. As this dried it left a white trail which I assume is salt. Should I be worried, is there trapped salt water in contact with the stainless stock? Is the rudder blade hollow ? Is the lower bearing water lubricated, there does not seem to be any grease coming out whereas the upper shows grease ?	Mystry Stain from rudder		Structures	71-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf</a>
234	2015	NC 331	Bow Thruster	A good tip on bow thrusters, finding that the drive pin for my Max Power CT60 bow thruster was in imminent danger to failing due to 'cavity corrosion'. Luckily the propeller in this design is held on with a grub screw, so even if the drive pin fails no lost prop. You might like to remind owners with this model of thruster to have the pin checked on haul-out. Pins are available from AR Peachment for £1.66, (postage costs more than a single pin).	Bow thruster cavity corrosion		Hull	71-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf</a>
235	2015	NC 331	Stanchions	My stanchion has been damaged. It is the most forward one on the starboard afterdeck, and typically, it is one with a brace, not a simple pole. Do you know of a source (and price!) for these. I enclose a picture of an undamaged one from the port side. Picture 2 Stanchion	Stanchion damage	Generally Nauticat fabricate or have made for them these items, they will provide a replacement, but it will be expensive, so I would use a local stainless steel fabricator, I have used one in Waterlooville called Fabtech who were reasonable priced and need a good job.	Fittings	71-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf</a>
236	2015	NC 38	Air Vents	I need to replace the 2 deck vents, the sun having damaged the fixing points. It looks like they might be from Plastimo, but the dimensions don't fit. The boat is a Nautical 38 from 2009, hull number 276, hopefully you could identify the products and reference number? Obviously, I prefer identical vents rather than drilling new holes on the deck.	Replacing deck vents plastimo	As you say they look very much like the Plastimo dorade box. Plastimo do make two sizes as described below; Pt no 16932 Blue cowl, 11661 Red cowl 260mm long, 160mm wide, 150mm high. Pt no 16933 Blue cowl, 11662 Red Cowl 335mm long, 200mm wide, 205mm high. Nauticat have confirmed they are Plastimo. Although they got the size wrong.	Hull	71-2015	<a href="http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf">http://www.nauticatassociation.co.uk/wp-content/uploads/2015/12/Number-71.pdf</a>
237	2016	All	Window Fittings	Locating spares for Bjerg windows and hatches.	Windows and Hatches	Some succes with the Hallberg Rassey association website - part number 104440.	Fittings	72-2016	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/</a>
238	2016	NC 43	Major refit	Information available on a full refit covering removal of saloon roof, water tanks, engine, internal bulkheads, copper coat, replace engine with zero timed Ford 2722 with rebuilt Borg Warner gearbox.  New tektanks water and fuel New Paguro generator Airconditioning Watermaker Lots of other items.	NC43 Major refit	Contact via Alan Warrell to find out more from the member	Refit	72-2016	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/</a>
239	2016	All	Replacement wiper blades	Where can you get replacement blades from ?	Wiper blade refit	They are made for American trucks with flat fronted windscreens. There are several outlets in the USA. 15" blade are ANCO Heavy Duty flat blade part number 51-15. The arm is stainless steel part 44-01. TRICO also do a replacement (part number 61-150) but no supplier has been found.  Replacement springs can be found from Vitesse Marine in Fareham 01329 323360.	Fittings	72-2016	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/</a>
240	2016	NC 33	Useful article on Fuel tank replacement	<a href="http://www.plaisance-pratique.com/remplacer-les-reservoirs-gasoiil-d">http://www.plaisance-pratique.com/remplacer-les-reservoirs-gasoiil-d</a>	Fuel Tanks replace	This site has a number of Nauticat articles but your French will need to be up to it.	Fuel	72-2016	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/</a>
241	2016	NC 33	Furlings lines	Description of how to replace and lead furling lines back aft on an NC33	Furling Lines	Pictures of block positioning	Rigging	72-2016	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/</a>

ID	Date	Boat Type	Heading	Description	Key Words	Answer	Category	Cat A Log	Link
242	2016	NC 33	Sliding roof	Lots of discussion on the best way to remove a sliding roof across all Nauticats	Sliding roof		Fittings	72-2016	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/</a>
243	2016	NC 33	Removal of internal sliding door between Saloon and Hanging locker	Research on how to remove the door	Internal sliding door	The WC wall has to be removed	Internal Fittings	72-2016	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/</a>
244	2016	NC 33	Fuel consumption	How much fuel does a NC33 use	Fuel	On a Perkins 6534 115 bhp it uses 1.5 gallons per hour	Fuel	72-2016	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/</a>
245	2016	All	Neco autopilots	Where can you get support for these from	NECO replacements	Derek Coventry - derek.g.coventry@talk21.com and derek207@btinternet.co.uk. Tel 0705379687 (we think out of date)  Also Daniele Fua - daniele.fua@uniroma1.it  Or search facebook using "NECO Autopilot Maintenance"	Electrics	72-2016	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-72/</a>
246	2003	All	General article by Richard Bartlett	NECO drives	NECO			72-2016	<a href="http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-35-2/">http://www.nauticatassociation.co.uk/forums/topic/cat-a-log-issue-35-2/</a>