

Falkland Islands 2008 Expedition Report



A Darwen Sub-Aqua Club Expedition

Featuring

Patricia Booth	Darwen Sub-Aqua Club	Dive Leader, AOWI
Paul Brown	Darwen Sub-Aqua Club	Dive Leader, ADI
Simon Campbell	Ribble Valley Sub-Aqua Club	First Class, National Instruct
Ian Dearden	Darwen Sub-Aqua Club	Advanced Diver
Jill Dearden	Trafford Sub-Aqua Club	Dive Leader
Keith Dearden	Darwen Sub-Aqua Club	Advanced Diver
Leslie Fellows	Darwen Sub-Aqua Club	Sports Diver
Lisa Gill	Darwen Sub-Aqua Club	Dive Leader
Charlotte Holden	East Lancs Dive Club	PADI Divemaster
Jonathan Holden	East Lancs Dive Club	PADI Divemaster
Mike Holroyd	Darwen Sub-Aqua Club	1 st Class Diver candidate, AI
Rosemary E Lunn	British Sub-Aqua Club	Advanced Diver
Paul Targett	Darwen Sub-Aqua Club	Advanced Diver, ADI
Simon Taylor Watson	Ribble Valley Sub-Aqua Club	Dive Leader, OWI

Overview

As part of the fiftieth anniversary celebrations of Darwen Sub Aqua Club, it was decided to plan an expedition to somewhere unusual and a real challenge, with the possibility of previously unexplored dive sites. The Falkland Islands were chosen because of its remoteness and it being the furthest south we could go without reaching Antarctica. The expedition was eighteen months in the planning and included months of consultation with The Falklands Museum, Maritime Trust and the Falklands Receiver of the Wreck. Permission was also sought from the Admiralty to dive the UK protected wrecks, this was denied due to the fact that navy divers were due to visit all the wrecks as part of the 25th Anniversary of the Falklands conflict.

Eventually it was agreed that while the expedition members were in Port Stanley we would survey the wreck of the G.F Handeal lost in 1880 and a Falklands protected wreck, subject to receiving a Falkland Islands Wreck Licence. No licence was issued prior to departure of the expedition members.

Falkland Islands



The Falkland Islands are located in the South Atlantic approximately 300 miles east of the South American coast and some 600 miles from Antarctica. There are two main islands (East and West Falkland) and over 200 smaller islands with a total land area of approximately 4,700 square miles

The majority of the 2,379 people that live in the Falkland Islands are of British descent. 1,989 live in the capital, Stanley, and the remainder lives in settlements or on family farms around the islands. English is spoken on the Falkland Islands. Stanley,

built on a sheltered north facing harbour, has the air of a Scottish coastal town but has expanded rapidly in recent years as new houses and roads have been constructed to accommodate the drift of Islanders from the farms to the town.

Everywhere outside Stanley is known as "the Camp". (Camp comes from the Spanish word for countryside.) Camp life retains many of the cattle rearing traditions from South American gauchos who worked vast tracks of land in the 1850's.

The Islands were first sighted in 1592 by English seafarer, Captain John Davis. The first recorded landing on the Falkland Islands was by Captain John Strong in 1690.

It can be expected to see a variety of wildlife including five species of penguin that breed in the Falkland Islands, there are 17 different mammals, including elephant seals, sea lions, fur seals, dolphins and an amazing variety of over 70 birds from the tiny dark faced ground tyrant through to the magnificent black browed albatross.

Expedition

This expedition was planned on the basis that when we got to the Falklands, due to its remoteness we would have to be totally self-sufficient. Therefore the expedition size was limited to fifteen members, who flew out in two separate groups, one of eight and the second of seven members. Each group was then divided into two teams and each team was then assigned a RIB. As all but two of the members taking part were boat handlers, this assured that at all times experienced boat handlers were on the RIBs.

Only having four divers per RIB provided for more comfortable passage around the Falkland Islands, better diving comfort and in the event that one RIB should become unavailable then the expedition members will still be able to dive but in relays.

To ensure self-sufficiency, all the necessary equipment was shipped out from the UK in a 40ft Steel Container in December and arrived in Stanley in early January. The container contained both RIBs and trailers, spare parts for the boats, spare engines, two portable air compressors, 16 full size Oxygen cylinders for Nitrox, gas analyzers and blending kit, four O2 kits, the divers dive equipment, safety kits, emergency repair kits for divers and boats, spare dive equipment, petrol containers, water containers, comprehensive first aid kit, backup navigation aids and a basic supply of food stuffs.

Agreement had previously been made with the Stanley Harbour Master to store the container at the docks and to secure the RIBs whilst in Stanley.

In order to get overland, a Land Rover and Transit Van were hired and both had tow bars to allow for moving the RIBs overland.

Diving Conditions

The expedition members' ranged in grade from highly experienced Sport Diver to First Class Diver and featured wreck, scenic, kelp forests, pinnacles and drift dives

Kelp banks surround the islands, which covers the entire rocky foreshore and isolated rock shoals. It grows from 40m and can be 6 to 8 inches thick. One recommendation was to carry a carving knife as it may help to get through the kelp, as boat recovery may be difficult in places due to the kelp cover. However it did aid boat navigation as the kelp tended to mark the edge of clear channels, pinnacles and wreck sites.

The sea temperature was in the region of 10/12°C so dry suits were a must. There is no recompression chamber on the islands. Therefore all divers were limited to a maximum depth of 30m and all divers were diving on Nitrox to BSAC Nitrox Decompression Tables. Redundancy was a must and all divers used twin cylinders and or a pony cylinder, again filled with a nitrox mix as a minimum.

There is a small dive shop in Stanley, which is used primarily for dive charters, but nothing is available throughout the Falklands. Therefore all expedition members had to be self-sufficient in diving equipment and spare parts, which were loaded in to the container for shipping in December.

Boats

We took two RIBs, the first, Judy II, a Tornado 5.7m RIB with a 90hp two-stroke engine and a 9hp backup engine. The second, Andromeda was an Osprey Viper 5.75m RIB with 140Hp two-stroke engine again with a 9hp backup engine. Both RIBs had GPS and were chipped for the Falkland Islands. Both RIBs also carried safety equipment as outlined in SOLAS. In addition they carried spare fuel and survival supplies for the expedition members should we have needed to shelter onshore. We also took a magnetometer and a side scan sonar to help identify clear wreck sites.



In the Falklands there are no lifeboat stations or coastguard however the Royal Navy and Cable and Wireless both watch and listen to channel 16 so it is highly unlikely that a distress call would go unheard.

Some areas of the Falkland Islands are heavily mined or subject to naval patrols so guidance was sort from the harbour master on arrival as to the up to date situation on both. We were provided with a map of all known land mined beaches and shores, but these were mainly around Stanley and we therefore had to assume that ordinance may be found on other parts of the islands.

Because of the wind chill factor, all expedition members had to take with them windproof, waterproof clothing, gloves, hat, preferably full face, goggles or mask (or sunglasses) and some lip balm. A small waterproof box was used for personal effects and an unbreakable flask for liquid refreshment.

Weather and Tides

Surrounded by water and at the same latitude South as London in the United Kingdom is North, the Falkland Islands enjoy average daytime temperatures of 15°C in January and February and average nighttime temperatures of 6°C.

The prevailing winds are from the west, and they are stronger in the summer than the winter, with an average yearly wind speed of 17 knots compared to an average of 4 knots in southern England. The strongest winds were by day with dramatic calms at sunset and force 3 or 4 overnight. The worst gales tended to be those from the north and northeast.

Generally it is wetter on the east than the west, and the recorded annual average rainfall at Mount Pleasant is 566mm.

The Islands are relatively sunny, and average 7.5 hours of sunshine similar to southern England coastal areas.



Tides

There is a real danger of tides being reversed by strong and prolonged winds, also it is not unknown for the greatest range of tides (springs) to occur up to 5 days after the full or new moon. High water full and change for Stanley is 5hrs 30mins with a spring rise of 2m. Within Stanley Harbour the tidal streams are minimal but reach 1 knot in the narrows. Around Cape Pembroke the flood stream to the north can reach 4 knots. Offshore the tidal streams are negligible beyond the 3 mile limit but wind induced currents may occur.

Port San Carlos high water full and change is 7hrs 00mins with a spring rise of 2.5m. The tides in these waters are minimal.

Tide Rock in the North Falkland Sound has a change of 6hrs 45mins with a spring rise of 1.5m. The tides here can run at 5knots with the flood to the south. There are local tide sets into the two main bays, Foul Bay and Middle Bay.

Accommodation



The expedition was divided in to two weeks, the first week was spent at Stanley in hotel accommodation namely The Malvina House Hotel and the second week at Port San Carlos in self catering accommodation, Smylies Self Catering Cottage.



Dive Planning

Although there are over 300 known wrecks in the Falkland Islands, a large number of these lie abandoned on beaches and the shoreline. Of those underwater only a dozen or so feature on Admiralty Charts and most of these are protected. There is some local knowledge of the whereabouts of the wreck sites and we had numerous conversations with military divers and knowledgeable locals as to the locations of the better wrecks and those not yet dived. It was expected that each group would spend two days surveying the G. F. Haendal and if a licence granted explore Billy Rock, which was reported to have up to fifteen wrecks on it. All Divers followed BSAC safe diving practices and all dives were planned the night before taking in to account the following days weather forecast.

Bad Weather Back Up

In the event of serious foul weather, the RIBs would have been taken overland to Mare Harbour, a military harbour that offers a slipway and sheltered coves. However the expedition was lucky enough to have good weather apart from the strong winds.

Roles and Responsibilities

EXPEDITION LEADER: Ian Dearden, overall responsibility for organisation, Risk Assessment

PUBLIC RELATIONS: Paul Brown, communication, website, liaison, publicity

BOAT SKIPPER: This was divided among the boat handlers on a daily rota.

DIVE MANAGER: Diving operations, records, safety, dive pairing, appointed on a daily rota

ASSISTANT DIVE MANAGER: to assume the role of DM when DM diving, again on a rota.

AIR MANAGEMENT: organising the filling of cylinders, again on a rota basis.

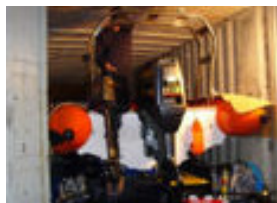
Travel

Was by EasyJet and LAN Airlines.

Details of flight times and the journey out are included later in this report.

Dive and Boat Equipment

All dive equipment was serviced and in test, where appropriate. The RIBs and trailers were serviced prior to loading them in the container for shipping. All available expedition members met to load all the equipment for the expedition in to the container, at the beginning of December 2007.



Personal Equipment

All personal equipment traveled by plane and overland when moving between Stanley and Port San Carlos. As the container was away for our winter months, it meant that expedition members had to consider what dive equipment to send via container, if they intended to dive prior to departure or on return to the UK. With the limit on baggage allowance most members sent their Falklands clothing and personal effects in the container.

Costing

	Predicted	Actual
Flights	£870	£870
Container	\$11000 shared	£430
Accommodation	£500	£558
Fuel, o2, food, safety, other	£320	£527
Total	Approx £2,000	£2,385

Emergency Procedures

Prior to departure the expedition leader recorded emergency contact details and hired a pair of a satellite phone for emergency use.

Emergency transport home would have to be via the RAF, so all expedition members had their insurance details recorded and checked.



For the purpose of this report, it mainly features the expedition for the first group.

Getting There

Day 1

We were all collected by a minibus and sent off to arrive at John Lennon Airport for our 13.15 Easyjet Flight to Madrid to arrive at Madrid Airport at 16.50 local time. To get to the departure lounge involved a twenty minute bus ride to the award winning Terminal four. We checked in at the electronic terminal with the aid of a LAN Airlines employee and waved goodbye to our Luggage. We passed through passport control and found somewhere comfortable to while away our seven hour wait. After much alcohol for some, it was time to board our plane only to find it was a 5 minute walk and 10 minute train ride to our departure gate. When we arrived there was huge queue, which we joined. Two of the expedition members made it on to the plane as the third started to board they and the rest of the group were prevented from boarding??? The reason given was that we had traveled from London and our baggage had not been put on the plane?? We explained that we had to be on that plane to catch our once a week flight and we had traveled from Liverpool and after 35 minutes they agreed to let five of the six on the plane and send our luggage later. Simon Campbell immediately offered to stay so he could “sue their arses”.

Day 2

It was a long 13 hour flight where we discussed what we had in our hand luggage, how we would manage and what may have happened to poor old Simon. We decided to check for our baggage on arrival and joy of joys it was there, so we gathered Simons luggage and headed to meet our guide and go to the hotel. We were not due to fly to the Falklands till the next day, so took the opportunity to explore an 82 degree day in Santiago. We found the Cerro San Cristobal Cable Car and went to the top of mountain to enjoy a panoramic view of the city. Contact was made with Simon to hear that he had been put on a flight to Peru and that he would meet us in time to get the next mornings flight. That night we enjoyed a meal in one of Santiago's famous restaurants knowing that the group would be complete in the morning.



Day 3

It was a 5.15 start to head for the airport where we met Simon, who had traveled non stop and treated us to some very tasty chocolate coated coffee beans. The 4 hour flight to Punta Arenas gave us some magnificent views as we traveled south down the Andes and a 40 minute break before the 2 hour flight to the Falklands.

On arrival we were met by Mark Insance (RAF Air Traffic Controller and DO of the MPA BSAC club - on a four month posting) and John Colquhoun. John is attached to the military working for a private telecommunications company. He is a SADS (Forces Diving Supervisor) and part of the military BSAC branch based at MPA. Also there to meet us were Peter & Veronica McKay with the Land Rover and Transit van.

We set off on our 40 mile gravel and tarmac road to Port Stanley, enjoying the scenery and minefields, where we booked in at the Malvinas House hotel. Once everyone had refreshed we had a quick look round town and went to locate the container which we unloaded for the next day. That evening we all enjoyed a meal in the hotel.



Day 4

It was another early start as we set off to find the private harbour we had been offered the use of for the length of the expedition. We unloaded the Land Rover and van. The land rover went back to the container to tow the boats and two members went in the van to fill the jerry cans. There is only one petrol station in Stanley and they charge an incredible 70p for petrol and 47p for diesel. Once everyone was back at the harbour the boats were prepared for entry into the water. There was a 16knot NW wind at this point and kelp at the slipway, so it was decided to get the first boat out on the little engine and using ropes prevent it from drifting in to the kelp, once in open water it would then pull the second boat out. After an hour or so both boats were secured in the harbour using a system of ropes and pulleys. Unfortunately the trip didn't get any better for Simon as he managed to trap his finger in the tow hitch. Mike our nominated first aider and vet had brought with him a comprehensive first aid kit and was able to tend to Simons wound. The rest of the morning was used to set up the compressors and gas blending equipment.

Dive 1

(shake down dive) Hambin Cove (51 39.6S 57 48.7W approx)

Visibility 3/4m. Max 10m, 32 minutes.

Kelp, sand, squats, nude-branches (big) ghost crabs, crayfish, mussels, squat lobsters, conchs' (purple grey), scollops, hermit crabs, funny two to three inch isopods things on the sand.



Day 5

The morning was set aside to meet the various people we had consulted with and to gather information on the Falklands. First visit was to see Mr. Robert King, the receiver of the wrecks, to check on the progress of the wreck licence and the legalities of diving in Falklands waters. Our information was you could only dive on wrecks if you held a wreck licence and that only a few people held a licence. This turned out not to be the case as no one had a licence, no licence was required except for the protected Falklands and UK wrecks and if items on the seabed were not from a debris field they could be recovered. Our own application for a wreck licence had not been submitted to the governor in case we did not make it. So we formally completed the process and then had to wait.

Next visit was to the Fisheries Department to check on local tides and currents, only to be told that the tides around Stanley were negligible and there were no currents or drifts except for our second week on the west island. Whilst there we saw Paul Brickle from the Shallow Marine Survey Group, who had invited the expedition to take part in a survey, and arranged a briefing for the following day.

Finally off to the museum and maritime trust stopping off on the way at the supermarket where we caused a traffic jam, only to be told by a nice police man there was no parking on the "High Street" OOPS!!

The museum provided us with all their information on the G.F. Haendal, which we could not survey till, granted a wreck licence. The rest of the group had prepared the boats and cylinders, so it was sandwiches from the island's only bakers and off.

Once out from the shelter of the harbour we were greeted by a pod of Peale's dolphins. First job was to test the side scan sonar which could only been seen under a coat. The second boat had got bored so went off to check out Seal Rock (51 4.594S 57 41.609W), the most westerly of the islands.

Dive 2

When we arrived a Seal Rocks the first boat had put in its first pair of divers, and the next pair soon followed, when asked how long the first pair had been down, 35mins came the reply, why no blobs?? Policy for this expedition was 30 mins down and DSMB's up. The first boat circled the rocks, no sign!! Diver recall brought back the second pair but no sign of the first pair. 50 mins now so a circular search pattern was started, another 15mins no sign so a call went out to Fish Ops who launched a boat and light aircraft, the military also sent a helicopter. The first boat and divers returned to the original marker as there were "no currents" when a call came on the radio to say they had been recovered by a fishing boat. The skipper of that boat, a diver went straight to the spot 1.29nm away as it had happened to him. It seems there is a deep sea current known as the Falklands Drift that only happens under certain conditions and we got it. Both divers had deployed their dsmb's as planned and got dragged along in the drift of 4 knots.

Day 6

From now on, all dives would be treated as virgin sites and fully prepped.

Before that though we had a radio interview to conduct and an interview for the local paper the Penguin News. The whole island wanted to know who we were, why we were there and what had happened?

Dive 3

Kelly Rock (51.40.405S 57 45.647W) North West Side

Visibility 6/8 m max depth 17m

Dived with a pod of dolphins including baby, through kelp and saw banded shrimps and more.

Evening presentation by shallow marine group on what we may see, the things they would like recorded and how to identify bull kelp which they were researching. We were advised “when the sea lions come to play, tap them on the nose and they go!!”

Day 7

Dive 4

Kelly rock (51 40.424S 57 45.631W) SE side:

Dolphins / baby & kelp forest, nudibranches, serolid isopods that swim on their backs.

Slowly shelving bottom Sand ending in small boulders virtually on the shore in 3m

Dive 5

Kidney Island (51 37.218S 57 45.568W) North side

Sea Lions. Penguins diving. Falklands sprat, millions of them, 6-8m deep from the 25 m deep wall, when they all moved you knew a sea lion was coming. Jill snorkeled to video it all. Amazing sea life. No one dare tap the large male sea lion who was christened Darth Vader, scary !!



Day 8

Dive 6

Wolf Rock (51 43.716S 57 44.823W) Northerly side

Very kelpy but approached carefully deploying divers in the Kelp areas. Seals, penguins, Octopus and tons of lobtser krill. Again another amazing dive with 20m vis

Day 9

Last day in Port Stanley, the logistics of getting everyone to Port San Carlos the next day would be almost impossible so two expedition members went there in the van and took four large O2 cylinders all the spare jerry cans of fuel, no fuel anywhere else on the island, and anything not needed on that day.

Dive 7

Kelly Rock Yorke Bay: Find wrecks (GPS: 51 40.442S 57 45.544W probably the John R Kelly and a smaller one (possibly a part of the same vessel) at 51 40.469S 57 45.587W. Both lying in between 15/5m in kelp. The American 2300 tonne John R Kelly was holed 15 May 1899. The Kelly appears to be copper bottomed with wooden hull. Strong NW Wind. Joined by Mark Istance, military diver.

The boats were removed from the water and all kit packed for the over land journey the next day. In the evening we went by Land Rover to Gypsy cove to see the penguins.



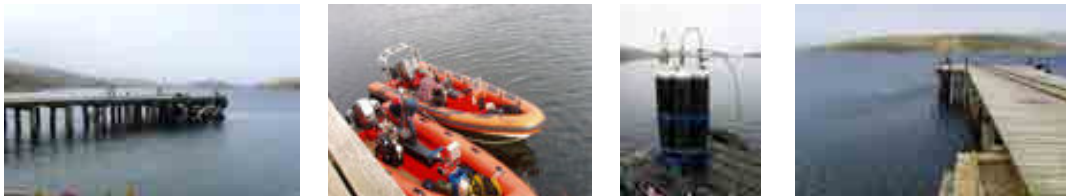
Day 10

Finished breakfast to be met by Mr King, the receiver of the wrecks, to be informed that we had been granted a wreck licence. Too late for us but the second group could do the surveys when they were in Stanley.

The vehicles were loaded with the dive stuff, more fuel and all the food for a week.

Went to pick up the boats and then made way to Port San Carlos via the north road. Its a long way with very dusty and dangerous roads with gusty winds and loose gravel. Passed burnt out Argentinean Chinook helicopter and strange rivers of rock (thought to have been caused by the disintegration of hills by frost and heat.) After four and a half hours we arrived at Port San Carlos; a very small settlement of two farms. Race Point Farm and Smylies Farm owned by Andrew and Georgina Smith, the life here is very austere. When we arrived Georgina asked if we would like coffee. We went in to find her not used to interacting to people averting eyes etc. They have a 4.5Kw wind turbine which powers the farm and kerosene boilers for heating and propane/butane for cooking. Main business is in sheering sheep but now selling the farm to an unknown party.

No television!! Poor Les!!



The jetty at Port San Carlos was built by the Falklands Government specifically for big boats to come and collect the wool. We launched the boats via a rocky slip.

Once boats were deployed we moored them at the end of the Jetty assisted by the Northerly winds. We unloaded the land rover and dropped all the scuba kit into the boats with ropes using large mooring posts on the jetty to brake the ropes. Ian and Mike cleaned the boats off that had accumulated a load of dust on route using seawater and a frond of undergrowth. We secured the O2 cylinders vertically to one of the two mooring posts with ratchet straps and arranged the compressors at the other side of the jetty; very neat and tidy... We found loads of mussels on the beach (along with bones of sheep and four disgorged fuel pods from a jet fighter).

Just as we left the boats the local farmer informed us the wind was going to change and so we re-moored the boats using long ropes and a large rock on shore.

Day 11

Although the weather was overcast winds were virtually nil, in the afternoon it became very hot.

Dive 8

We left to dive 'wreck bay' which was a few Nm to the west south west of the Port San Carlos settlement (Aprox: 51 30.7S 59 06.1W). We did look for the wreck of the Helen A Miller that is supposed to be located here. Following a brief search on the sounder we decided to dive the site anyway as it was essentially a check out dive following the move to the new location. The dive commenced at 15m and gradually ascended into kelp in 8m. Piles of small squat lobsters, krill on the surface, spider crabs and of course the ubiquitous kelp!

We returned back to base and decided to prepare for a big trip out to the Taymar pass in the morning. This involved greasing all the nipples, checking and filling two stroke oil, loading the emergency rations, filling the fuel in the main tanks and the little engine tanks.

To say that fresh food was difficult to obtain in Port Stanley is an understatement. Fruit, vegetables (even potatoes) are at a considerable premium as they rely on the regular delivery of staples by boat. Following dinner the team studied the charts for the morning and some learnt to play bridge - finally resorting to whist (is this really a British BSAC diving club??)...

Day 12

Down at the jetty, final arrangements were being put into place including a quick briefing on the fuelling of the boats and other safety information it being such a long way to the very remote dive site.

We set off to a little rain and light south-westerly breezes.

The journey was pretty and uneventful until Judy II ran out of fuel 7/8th of the way to the 'Tamar pass'. Fortunately we had loaded enough fuel to complete the journey three times so we carried on.



The entrance to the channel was announced by 200m of confused water with rocks on either side. This was followed by up-wellings punctuated with rock-hopper penguins having breakfast. In the distance a series of triangular mountains dominated the horizon.

We turned into a piece of calm water and had a sandwiches and coffee amongst this awesome landscape.

Looking at the depths and speeds of the potential drift (7/50m at up to 10Kn), bearing in mind our nitrox mixes (32%) we decided to move on to another potential site the

Purvis narrows which looked quite promising. Once

reaching there the speed of the drift was disappointing and so we made our way back to the South Atlantic to find a site.

Dive 9

We had passed a lone rock (51 21.975S 59 18.827W), swept by the lazy two meter swell on the way out and this looked an ideal candidate for a dive... Most divers went in and found piles of weed with occasional kelp towers reaching to the surface. The visibility was around four meters. It wasn't a great dive... Following surfacing two other divers reported two octopuses and a lovely wall; they were only 20 meters away from the others.

The journey home was interrupted by the engine on the 'Andromeda' starting to cut out intermittently. On further investigation it appeared there was water in the fuel. We had experienced this problem before with one of the compressors. Following the bleeding of the water/fuel filter, the engine came on song again.

Once back at base we decided to dive the Bueno Concardinia, an Argentinean supply ship that had been sunk in the 1982 conflict, and thought this may be a great dive for the next day.

Day 13

Mark Istance, the military diver, turned up having driven two hours from MPA.

Dive team today was made up of six divers, with two staying at base, that set off in light westerly winds and overcast skies.

Dive 10

The journey to the Argentinean supply ship 'Bueno Concardinia' was 44Nm south down Falkland Sound; estimated time 150 minutes. The journey was lovely and we didn't see another boat or house over the whole journey. Interestingly enough the topography on the eastern side was decidedly flat with large hills on the western bank.

We arrived at the site from the position we had established from the 1:75000 chart the evening before at approximately 51 53.8'S 59 33.3'W and commenced to look for the wreck. We came across the wreck after about 20 minutes. It was obvious on the depth sounder but was also marked by a patch of Kelp at 51 53.866'S 059 33.581'W.

Elated at finding it so quickly, we shot the top (10m) and started to kit up. The first pair planned to go in and mark the bow/stern with a DSMB to establish the orientation on the wreck. We descended into kelp growing on the deck quickly finding that it was lying on its starboard side.

We continued towards the stern looking into the aft holds, which were all empty perhaps indicating salvage? After ten minutes we found the propellers, which after a bit of investigation established they were, cast iron, not brass. We found missile damage on the port side. It was full of marine life, fish, and flora and has to be one of the best wreck dives you can ever do, intact, explorable and full of life

Once all the divers were on board we made our way back steadily but the Andromeda boat started to develop the same problem as before. The engine starting to 'hunt' as though there was air/water getting into the fuel. This was rectified temporarily by opening the water/fuel filter bleed valve and blowing the impurities out. If the boat was full of fuel it tended not to happen; very strange. It was rather boring as it happened around seven times on the return leg.

Once back at base we attempted to drain the bottom of the main fuel tank of the Andromeda boat in the hope that the water would be removed. Unsuccessful we filled the boat, omitting to use the last 5cm of fuel in the bottom of the cans just in case it was contaminated.

Day 14

Today we split into two groups. One to dive Sunk Rock (51 24.353S 59 09.272W) which is the northerly outpost of the Falklands Sound, the other to complete a land rover safari over mountains and down valleys to Paloma Beach.



Dive 11

Tides around the island vary drastically and there is very little tidal information on the charts. As we were diving at the head of the sound we didn't really know what the tides would be like but made an estimate that if we were in the water around 0930 we should be around the time when

the flood tide began (FMT HW Stanley 1121 + 1:00 for summer time then +2:55 for Port San Carlos = 1516). The wind was SW 10/15 Kn and the passage out was easy going. Today there were only four divers: One boat for the journey making sure the land based team had a satellite phone just in case. The top of the rock was in around 12m with large towers of kelp making their way to the surface. It was clear from the kelp that the tide was still running so we waited half an hour before we entered the water. We tied the painter to a large clump so we were securely anchored on the site. Tide was still running a little (0.5Kn) as we descended the kelp. The experience is fantastic as it gradually goes dark just like in a forest lending considerable atmosphere to the proceedings. At the bottom we saw an array of sea life around the kelp roots; we proceeded west down a sandy bottomed channel until we reached 20m where the channel opened out into a delightful 'garden' packed with a carpet of living things. We saw a number of varieties of hermit crab and nudibranch. We continued NW until we saw the shear wall which is charted at 70m to the bottom. We levelled out at 30m; water temperature was a typical 11C. What an amazing dive!!! We surfaced using the kelp as a shot line and then Ian and Jill kitted up and entered the water at 1109, just as the tide turned (indicated by the kelp swinging around direction). They reported up-wellings on the wall towards the end of their dive in the North East. Rather than go straight home we motored over to Paloma Beach (Middle Bay: 51 26.012S 59 02.674W) where the others had gone over land to see the King Penguins and Steamer Ducks. The beach was surrounded by very dramatic scenery with pure white sand and clear waters. Sun was very intense but masked by the light breeze. The dive party returned back to base through slightly choppy seas (around force 5) so it took a little longer than we expected. The rest of the group went 'hunter gathering' up the San Carlos river (apparently the best fishing on East Falkland) to collect fresh mussels for the evening meal.

Day 15

The plan this morning was to go and visit the Bueno Concardinia' again for those who had not dived it. We called at the farm again for the weather forecast. Disaster, the nice man at the met office gave us bad news: 25mph winds veering NW later. After a brief chat we decided to dive the wreck of the Helen A Miller, which was in Ajax bay on the western side of San Carlos water. We didn't know where it was but had a pointer from the excellent book Falkland Islands Shores (Ewen Southeby-Taylor) to a barge 1 cable NE of the jetty. We arrived in Ajax bay and looked for kelp (the friend of the Falklands wreck hunter) to help us find the barge which was located quickly at 10m to the SW of 51 33.676'S 59 04.643'W.



Dive 12

The dive was disappointing with 2m visibility and eight dolphins further messing up the visibility by buzzing us close to the muddy bottom!! One of our divers exited the water and noticed that their suit inflation cylinder was missing. They thought this could be a problem, as they had to fix one of the straps securing the bottle to the back plate with a cable tie the day before, as they had lost one of the screws. Immediately a shot was deployed and a circular search found it partially buried in the hideous mud. As we were there we landed at the bombed jetty of the old meat refrigeration plant, which was closed in the 1950's following financial disaster. The site was used as a field hospital and command centre for the Royal Marines in 1982.

It was at the middle of the action and was a busy port all through the conflict. There are two beaches either side of the jetty, the north one being populated by penguins. In other bay there were up to 20 dolphins playing in the warm water.

Wandering around the site was at times quite moving with the temporary cemetery at the top of the hill the tributes to the 44 service personnel that were killed in the locality.

In the bay to the east is an isolated danger mark, which marks the site of the HMS Antelope, which was sunk by fire and one bomb that exploded after the crew were evacuated. A steward was killed by the original impact; one bomb disposal expert lost his life and his colleague an arm in the explosion. This is a restricted area and no diving took place.

On the return journey the Andromeda boat again had fuel problems. We investigated and hopefully sorted the problems when we returned to base (collapsing fuel feed pipe to the fuel tank).

Day 16

We had hoped to get out before packing up for the journey home and have one last good dive, but the weather had taken a turn for the worst. It was raining and windy and even the sheltered sound was choppy. But it was the last day and some of our members still hadn't dived with the dolphins so it was off to Ajax Bay.

Dive 12

After a very bumpy crossing (force 5/6) and with us all needing our foul weather boat gear, we made it to the shelter of Ajax Bay and had a quick look again for the Helen A Miller while we waited for the dolphins. No joy with the wreck but the dolphins did join us. We played with them using the boat and encouraged them towards where our divers had dropped in. After a 25min dive with poor vis to a max of 12m our divers surfaced to be elated at finally diving with our new friends.

Days 17, 18, 19

The journey home was the reverse of the journey out but with only a short break in Santiago where we all chilled at the hotel. Once back in Madrid there was time for sightseeing and lunch and this time no mishaps with the travel plans. Whoopee!!



Group two

In order to fit most things for this report, group two's experiences have been omitted, however under the terms of the wreck licence they did investigate the debris field at Billy Rock, so that the Falkland Islands Government could debate the reducing of the 1000m exclusion zone around it. This is part of their report submitted to the receiver of the wrecks.

Billy Rock

We did a total of 14 dives between the group on the site. All of these dives were on the north side of the rock. We found approximately 5 wrecks. This is a rough approximation. The reason for this will become clear.

We found two steel ships of unknown length at 51 40 49S 57 42 69W. These are butt up to the bottom of Billy Rock. We did not find the engines, or masts. They are smashed together and essentially a pile of steel plate, girders and the occasional random piece of wood. The only way we came to the conclusion that there are two wrecks there, is that one set of steel is more worn, corroded and blended into the sea bed than the other. One pair of divers did one dive on this site. The swell was too large to do anymore this close to Billy Rock.

All the rest of the diving was done on or around 51 48 41S 57 42 78W. We found approximately 3 wrecks on this site. The debris field extended due north for approximately two cables. The debris corridor is approximately one cable wide. This site had the largest wreck on it.

We think that it is the Octavia, but we have no evidence to support it. The most recognisable section is the mid ships. There is a large open crank cased steam engine, with three boilers 3-4m high and 10m in diameter. Near the boilers was the largest section of intact steel, which looked like the bottom of the hull. This had large amounts of smashed pottery in and around it. The rest of the site consisted of smashed steel plate and girders. The mast was lying east to west approx 1 cable north of the boilers. The depth of the debris was from 5-25m deep.

All the wreckage was covered in marine growth and kelp. The only way we could distinguish between the different wrecks was by the varying degrees by which the steel had been covered and how worn it was by the action of the sea.

To the north of Billy Rock approx 0.3 NM away (51 40.50 S 57 42.67 W) there is a large patch of kelp, which we decided to dive. This turned out to be a raised area of rock, surrounded by coarse sand, approx 4-5m high in 30m of water, approx 50m in diameter. One pair of divers did a lap of this circular feature and found a small piece of old steel but no other pieces of wreckage were found at this site. However there were lots of large bright yellow sponges, and lots of marine growth.

The wrecks on this site are essentially very broken up and difficult to tell apart. A very detailed survey would have to be done to make any sense of the debris field. As only one group had the license to dive this site we couldn't do any of the detailed work necessary.

Summary

For British based divers if there was a top ten places in the world to dive then the Falklands would feature. Similar sea conditions to ours but clear pollution free seas with an abundance of life that we can only see in the southern hemisphere. Was it worth the 18 months planning, the 3 days each way traveling and the expense, well everyone one of the expedition had a fantastic time and dived where few others have and saw a completely different underwater world. If you want to go then contact the Shallow Marine Survey Group of the Falkland Islands and see if you can tag along on one of their trips, you won't regret it.

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Admiralty charts – 2508, 2512, 1614, 2547, 2558, 2507, 2559

The expedition members on the cover page for their write-ups and photographs