



The Dolphin Brotherhood

British Chariots or "Human Torpedoes"

No history of submarine warfare in World War Two could be complete without a mention of the "Human Torpedo" or "Chariot".

The sheer drama of their story, which could not be revealed at the time, introduced a unique level of selectivity into naval warfare. The target was chosen and plans made well before the actual deployment, when they, just as their bigger brothers the midget submarines, or X-Craft, were towed into the area by a full-sized submarine.



A British "Chariot" or "Human Torpedo" rides on the surface.

The human-torpedo was "expendable"; it lacked the power to return to the open sea for a rendezvous with the parent sub-

(See "Chariot" on page 6)

Commander's Corner

by Patrick Householder, Base Commander



It's been an interesting couple of months since our last paper. Igor Kolosov's

participation in our April meeting to discuss his service on Russian and Soviet submarines was very well attended. My son Adam was inducted into the US Army that same day so I was unable to attend. Darn! The District 9 meeting was held in Silverdale with attendance of about 1/2 dozen Seattle Base members. The next one will be in Portland, OR. For those who may have

wondered where all my emails have been, my hard drive crashed! Nuff said. Cliff Nutter and I were flag bearers in the Memorial Day ceremony at Tahoma National Cemetery, and Bob Oppele was the featured speaker at a similar service at Greenwood Memorial Cemetery in Renton. The Foxtrot is starting to look real spiffy, thanks to the

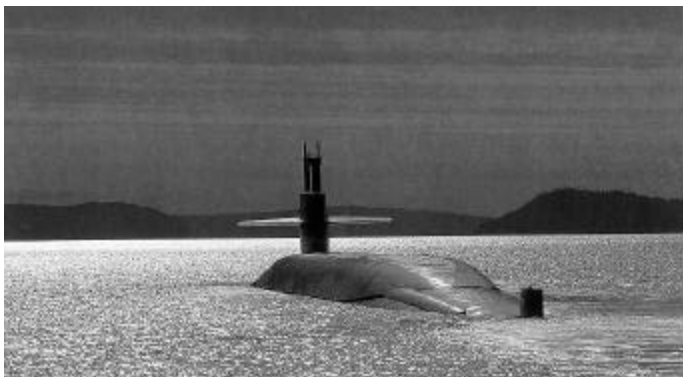
("Corner" - Continued on page 11)

A Gray Day on Georgia Blue

by Charlie Ryan

On drizzly 23 April eight Seattle Base members (Pat Householder, Dave Goodson, Cliff Nutter, Don Gentry, Don Smith, Peter McCafferty, Steve Shelton, and Charlie Ryan) rendezvoused at the Bangor Sub Base Main Gate to visit USS Georgia (SSBN-729). Dave Goodson arranged this event through the graces of his relationship with Blue Crew CO, Christopher Ratliff, Commander, USN. Captain Ratliff (USNA 1983) is the son of Dave's CO when he served on Seahorse (SSN-669), and the idea for a visit came up when Dave showed the Ratliffs through the Rusty Ruski a few months back.

After a Navy-style hurry-up-and-wait delay getting through main gate security we reached Georgia in the dry dock beside Delta Pier on Hood Canal. Captain Ratliff and XO LCDR Burian greeted us, handed out souvenir enameled USS Georgia coins and escorted us across the gangplank. Ohio Class boats look big in the water, but in dry dock they appear truly GIGANTIC. For perspective, consider that each torpedo door is twelve feet long!



USS Georgia (SSBN-729) cruises through Puget Sound country

We descended traditional ladders about 25 feet into the boomer, although the hull opening used for resupplying in port is a very untraditional 8 feet in diameter to accommodate full pallets of supplies and

other large objects. With her next patrol only two weeks away, Georgia's interior was a hive of activity as crew and yard workers moved through a maze of cables and temporary ducting to get everything shipshape.



Captain Ratliff showed us his stateroom, stowed our jackets and hosted us for lunch in the ward room. During a leisurely meal the Captain and XO answered questions about SSBN capabilities and ship board life, and told us some of their Navy experiences while we told a few tales – some even true – from our sea days.

After lunch two Senior Chiefs guided us through an extended tour of all compartments forward of the engineering spaces. Sailors and Chiefs in each part of the ship briefed us on their areas and explained

some of the operating machinery. One amazing bit of technology was the conventional flush toilets with porcelain bowls! On a submarine!?!

Despite busily preparing for patrol, everyone from the Captain down was exceedingly friendly, informative and generous with their time.

After our tour Captain Ratliff escorted us back on deck. He spent another half hour explaining Georgia's deck features and walking the length of the dry dock to point out and discuss exterior hull details.

Discussing the day's on the ferry back to Seattle, all of us felt we had "hit the jackpot" by not only being able to visit an Ohio Class boat, but by spending four hours on board, having the chance to get acquainted with the Captain and XO and being able to see the vessel up close in dry dock. To this "citizen sailor" who patrolled WestPac in GUPPY and Tang Class boats in the late 1960s, Georgia's technology and capability are nearly inconceivable. Even more impressive is the profes-



CO Chris Ratliff

sionalism, performance and pride exhibited by every crewmember we observed or spoke with. Don Gentry observed, "Those guys seem a lot more civilized than we were." Oh well, after their hitches they can join USSVI and we'll change that!

Captain Ratliff's command philosophies of "honor, courage and commitment" are not mere buzz words but

principles that actually guide Georgia's crew in their daily activities. Georgia was commissioned in 1984, and her current patrol will be her last one as an SSBN. After returning to Bangor she will transfer to Norfolk for conversion from 24 ICBM silos to an SSGN capable of launching 168 Tomahawk missiles.

[Editor's note: At the end of our visit and drydock walk-around, Captain Ratliff escorted our group to the Navy van and our driver (another fine Georgia crewmember). Once we were all inside and the van began to roll away, I took once last glance back at Georgia. There was her skipper, standing at attention in the drizzling rain, giving us old seadogs a perfect salute. Thanks Cap'n, I'll never forget that....]

2003 USSVI DISTRICT 9 MEETING MINUTES

Minutes of District 9 Meeting 0900 on 10 May 11, 2003 located at the Red Lion Motel in Silverdale Washington

Meeting was called to order by Elliott Abram, Bremerton Base Commander.

Lost boats USS Runner (SS 275) 28 May 43 and USS Lagarto (SS 371) 3 May 45

Invocation by Bremerton Base Chaplin Mike Donovan. Everyone introduced themselves, giving their Name, Base and Qual boat & date. Elliot introduced District 9 Commander Cliff Nutter and turned the meeting over to him.

National Office Manager Fred Borgmann was then introduced by Cliff Nutter. Fred made a report of what they do at the office, its location and he spoke of his philosophy in treating our members as customers. He let us know that there are over 10,000 members and that approx 800 are still on the dink list. While this is better than last year's situation, USSVI is going to take a harder line with those members not paid up by April 1. They will be removed organizational rolls and from the AmSub magazine list until and unless they are paid up. They are asking the Bases to work harder to keep the dink list down.

In response to a question, Fred let everyone know that the member number they received on joining is a permanent number that stays with them while on or off the dink list. If a MAL joins, his name will be forward to the closest base so they can try to get him in and working with the group. There is some interest in making those member numbers available to the Bases so that the numbers can be recorded by the Base on the member renewal cards when the member renews.

Cliff introduced Don Mac Smith, Web Master for the Western Region's seventeen sites.

National Junior Vice Commander Bud Berg was then introduced. He spoke of going after those on the dink list. There is a proposed amendment to increase dues due to the cost of the Magazine "American Submariner" in the pending national election. There was discussion of having "American Submariner" done commercially even though it is currently done by four Texas volunteers. Either way the cost has gone up, and although it would be more expensive to produce commercially, the quality of the product would probably be better

National Secretary Pat Householder was introduced and he explained how the USSVI Charitable Foundation was setup as a 501 (c)(3) so that individual members can make tax deductible donations to the full extent of the law. . He explained the six subsidiary groups, which include the General Fund, Museums Sub Fund, Library Fund , Scholarship Fund, Brotherhood Fund and Memorial Fund. He mentioned that some bases do 'fund matching' of their member contributions. When the base makes a general contribution there is no tax break. (because the base is not taxed). For the tax break it must be from the individual and can be earmarked for the Charitable Foundation general fund or one of the specific funds.

He let everyone know that the new and expanded 2003 Policy and Procedure Manual is available for purchase from the National Office (\$10.00 including mailing) or may be downloaded from the USSVI web site at no cost.

Cliff Nutter explained the national USSVI web site has all forms needed and the Chaplain's Manual has been recently revised. He let all know that we have a new Base this past year in Central Oregon. Cliff was happy to let all know the "end of year reports" of Dis-

Reactor SCRAM aboard the USS John Marshall SSBN-611

By Phillip A Carlson

The year was 1974 during the “Cold War” era, a time of extreme Soviet suspicion. The United States regarded its silent Nuclear Submarine Ballistic Missile Force as a tool of “Nuclear Deterrence.” Onboard the John Marshall, I was a junior Electronics Technician (ET) 3rd class, assigned to the Engineering Department, Reactor Controls Division, believing this would be a normal patrol mission.

While operating in our assigned patrol area somewhere in the north Atlantic, a reactor SCRAM (Super Critical Reactor Axe Man) suddenly occurred, that instantly shuts down the Reactor, disabling the ship, and leaving her without main propulsion, and very limited electrical power. I would soon discover, the Reactor SCRAM happened under highly unusual circumstances.

It was 1200 hours, so I had just completed a long six-hour watch in the engineering spaces. On a submarine most of the crew spends six hours on watch, and twelve hours off. With one third of the crew getting off watch, everyone heads for the mess decks and lines up for chow. I was looking forward to lunch because I had not eaten very much for breakfast that morning. Today’s menu was roast Turkey with all the trimmings, a favorite for everyone. I loaded up my plate and taken a seat with my shipmates to enjoy the meal. Suddenly we heard “Reactor SCRAM”, “Rig ship for reduced electrical” over the 1MC announcing system, two orders passed by Control.

Since there were no engineering drills scheduled for today, something was seriously wrong. Leaving my lunch on the table, I jumped up and darted back to my station as quickly possible. I was one of the first persons to arrive in the engineering spaces. I quickly stopped to speak with the first person I saw, a fellow ET who was performing maintenance on the Reactor Protection and Alarm electronics system. He looked up with fear in his face, then telling me he was only closing the drawer. I looked down at the electronics drawer he was working on, noticing a partially severed wire bundle. This was indeed a very bad situation, and my first reaction was this was no accident.

Captain Dunn arrived a minute later asking, “What happened?” I informed the Captain, and my supervisor that the reactor SCRAM was caused by severed wires at the rear of the drawer. He asks everyone “can it be repaired.” We all looked and each other in a moment of silence thinking we can do anything, and not wanting to tell the Captain no, I said “I believe so, if we splice the wires” while not really being 100% certain. At this point, the Captain realizes there is no authorized Naval Reactors group procedure to cover the situation, then telling us its okay to proceed based on his direct approval as commanding officer. That was good enough for me.

Next who should perform the repair, the most senior ET on board or the junior third class who quickly announced he knew how to make a “Western Union” wire splice to the Captain? ET-3 Carlson had learned how to solder a Western Union splice, not in the Navy, but in a high school electronics class, so I was chosen to make the repair. I remember being very nervous, tackling a repair that had never been attempted, by anyone, to my knowledge.

The Captain ordered the crew to provide whatever support or assistance needed as quickly as possible. I was able to successfully complete the repairs in less than four hours, using a standard Western Union splice invented during the days of the overland telegraph. I would latter receive an award for my performance.

The patrol ended as being anything but normal, and my success awakened a new sense of confidence with in me, just waiting to be born. I had also gained a sense of pride as the junior 3rd class ET who was chosen to make, perhaps a historic repair never before attempted, at least within the world of Naval Reactors. While in off-crew status following the patrol, I was awarded a “Commanding Officer’s Letter of Commendation” for outstanding performance of duty and ingenuity displayed while completing the successful repairs.

The World's First Fuel Cell Propelled Submarine Starts Its Sea Trials

(Source: HDW; issued April 7, 2003)

The world's first submarine with a fuel cell propulsion system starts its maiden voyage on 7 April 2003.

U 31, the first of the four 212 A Class submarines to be delivered to the German Navy, is now beginning its sea trials in the Baltic Sea following extensive port tests at the construction yard of Howaldtswerke-Deutsche Werft AG, Kiel.

In an initial phase from Kiel, U 31 will undertake shallow water trials in the western part of the Baltic Sea. The entire marine engineering system and operation is to be checked on. Aside from the crew, both shipyard and supplier staff as well as the inspection personnel of the German Office for Defense Technology & Procurement (BWB) will be on board.

The other half of the trials mainly revolves around deep-water trials. It is expected that U 31 will be leaving home waters for the first time at the end of July 2003, heading for Norway. The main ports of call will be Kristiansand, Stavanger and Bergen, with assistance being given by the Norwegian Navy through its facilities. Acoustics, sonar and the fire control system (FüWES) will be tested during the depth diving trials, preferably in the Skagerrak. And the first practice torpedoes are to be fired as well.

With the trials over, U 31 will return to Kiel in mid-March 2004 for any remaining work to be dealt with in the yard. The submarine will then be commissioned by the German Navy.

The new submarine class developed by HDW features air-independent propulsion based on the hydrogen fuel cell. Thus, as the world's first company, HDW provides a production-stage fuel cell propulsion system which enables the boat to operate submerged for several weeks at a time. Moreover, as the boat neither generates any noise nor heat from exhaust fumes it is virtually undetectable.

The development of the new Class 212 A generation of submarines was necessary in view of progress made in detections technology, increasing anti-submarine weaponry and the extended deployment areas. Extremely favorable electronic codes, the fuel cell propulsion system and locating and weapons technologies will ensure the success of the new submarine type in all conceivable operational areas. At the same time, a high degree of availability and low maintenance costs are a feature of the submarine's design.

District Nine Conference Report

by Don Baessler

The annual District Nine Conference was held at the Red Lion Hotel Silverdale on May 8-10 with about 40 present at one time or another. Members from Yakima Base, Hawbill Base (ID), Blueback Base (OR) Seattle Base and Bremerton Base were onboard. Hospitality room, barbeque, base tour and Tolling of the Bells Ceremony, Business Meeting, H&C lunch and banquet rounded out the event. Organizer John Gardner, D9C Cliff Nutter, WRD Jim Foote, and Bremerton BASE CDR Elliott Abram can be complimented on doing a fine job.



(Chariot—continued from page 1)

marine and the crew had the bleak choice of attempting to escape ashore or, as they were usually exhausted at the end of the attack, surrendering. The first countries to plan special submarine operations were those which had made the worst use of the orthodox submarine: Italy and Japan. John P. Holland, the American submarine pioneer, had sketched a midget submarine back in the 1890s, but the first attack craft to be seriously proposed took shape in Italy. In October 1935 two young Italian naval architects, T Tesei and E Toschi, submitted plans for the first human torpedo - the *Siluro a lenta corsa* (SLC) or 'slow



An Italian Human Torpedo, taken by the Royal Navy after the Italian surrender, being tested.

course torpedo'. A working prototype had been built and tested at La Spezia by the end of 1936 and a special department undertook research and training until Italy's entry into war on 10 June 1940.

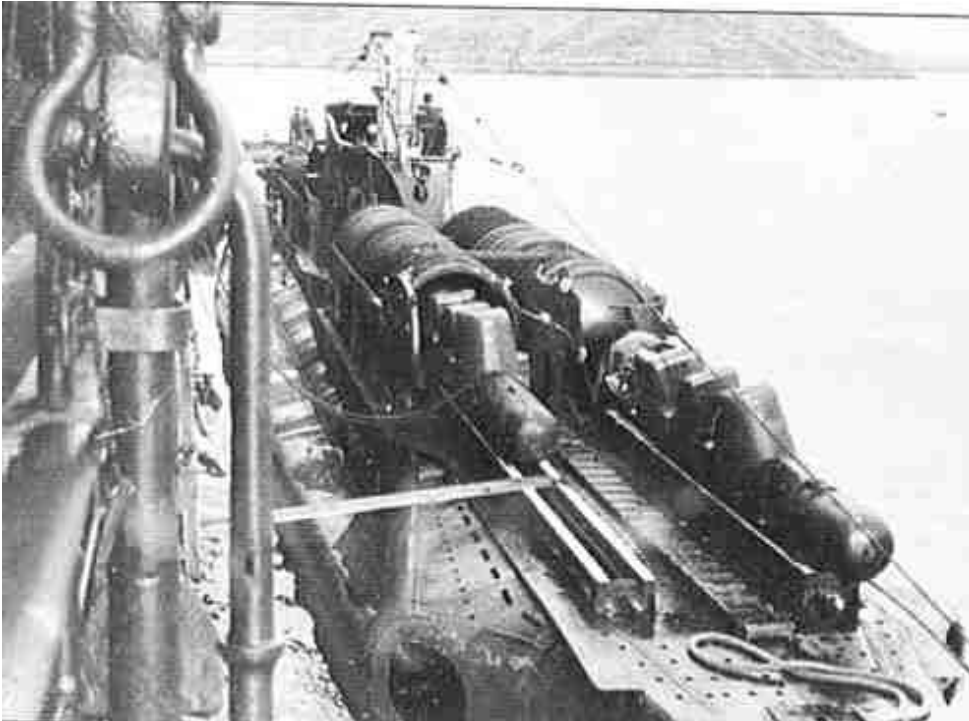
The role envisaged for the SLCs, or *maiali* ('pigs'), was that of clandestine attacks on the British naval bases at Gibraltar, Malta and Alexandria, and submarines were modified to carry the SLCs. From the beginning a long string of failures revealed the hazards of the concept. The first attempt was made in August 1940: a raid on Alexandria, with the Italian submarine *Iride* carrying the SLCs. This ended in fiasco on 22 August when *Iride* was spotted in the Gulf of Bomba and sunk by aircraft from the carrier *Eagle*.

But the secret of the SLCs was still intact and a double operation was planned for September,

with *Sciré* carrying SLCs to attack Gibraltar, and *Gondar* was similarly equipped to attack Alexandria. *Sciré* found no worthwhile targets at Gibraltar and returned to base. *Gondar* had no better luck at Alexandria but was depth-charged and sunk on her return journey. Although the SLC crews were captured with *Gondar's* crew the British learned nothing about the SLC programme and a further attempt on Gibraltar was made in November 1940, again with *Sciré*. This time a rich prize was spotted in Gibraltar: the battleship *Barham*. Two of *Sciré's* three SLCs broke down after launching; their crews scuttled the SLCs and escaped into Spain. The crew of the third, piloted by Lieutenant Birindelli, nearly succumbed to oxygen poisoning from their highly dangerous breathing apparatus, but not before Birindelli, on the edge of unconsciousness, dragged his SLC to within 30 yards of *Barham*.

On the night of 25-26 July 1941 the Italians attempted a combined attack on the naval base at Malta. It was an audacious plan, reflecting highly on the courage of the Italian volunteers. High speed explosive motorboats were to blast breaches in the protective booms and nets allowing two SLCs to penetrate the harbour. Radar alerted the British defences and the attack was smashed; one of the SLCs blew up but the other was salvaged and examined. Even this disaster did not lead to the abandonment of the SLC programme and on 20 September 1941 the tanker *Denbydale* was badly damaged in Gibraltar by an SLC charge fixed to the bilge keel. The attack was by Visintini and Magro, launched from *Sciré*. The most famous SLC attack of the war was also launched from *Sciré*, two months later - the sinking of the British battleships *Queen Elizabeth* and *Valiant* in Alexandria on the night of 18-19 November 1941. Three SLCs penetrated Alexandria, two of which laid their warheads correctly. The attack commander, Count Luigi de la Pene, was captured with his second in command, Bianchi, and interrogated aboard *Valiant* while the warhead's time-fuze was still running. As they would give nothing away, they were imprisoned deep in the battleship until de la Pene, knowing that nothing the British did now would be of any use, sent Captain Morgan

(See "Underway" on page 7)



HMS/M Trooper with her Chariots

the message 'Your ship will blow up in five minutes.' The Italians were on deck when the two battleships shook to violent explosions and settled on the harbour bed. They were as sunk as ships could be in such shallow water, and the Italian Navy now had the domination of the Mediterranean within its grasp, but the opportunity was wasted. Both battleships still had their upper decks well above water, and were able to simulate readiness for sea by emitting funnel smoke. With the four men from the other two SLCs all captured ashore, it was not until months later that the Italian Navy learned what a chance they had missed. For the time being, the British had no answer to SLC attacks apart from vigilance and the formation of special diving parties to search ships' bottoms for unexploded charges.

Another method of attack tried by the Italians was by swimmers from the *Folgore*, an Italian ship interned at Algeciras, across the bay from Gibraltar. Yet another interned ship, the *Oltterra*, was modified to create a special underwater compartment from which SLCs could be launched and proceed directly across to Gibraltar. The first SLC attack from the *Oltterra* (7 December 1942) was another

disaster. The three craft were spotted during the approach; one was damaged by depth charges, the second came under machine-gun fire and returned to *Oltterra*, and the crew of the third was killed by explosive charges. It took until May 1943 before enough parts and personnel had been smuggled through Spain to the *Oltterra* for another three-craft attack on Gibraltar. On 8 May 1943 three SLCs evaded the British patrols and fixed their charges to three merchant ships at Gibraltar, sinking one of the ships and badly damaging the other two. All three SLCs returned to *Oltterra*, but as it took so long to replenish the SLC team through Spain, there was only time for one more attack, in

August, before the Italian surrender. This last attack yielded two cargo ships and a 10,000-ton tanker sunk.

The Royal Navy decided to make some effort to emulate the success and, with limited resources, groups were formed to study the tasks. The first of these groups was the UWWP (Under Water Working Party) formed at Gibraltar under Lieutenants "Bill" Bailey and "Buster" Crabbe (of later fame in 1956) and in 1941 they had nothing better to work with than the Davis Submarine Escape Equipment (DSEA). However, the British rapidly brought their own human-torpedoes - dubbed "Chariots" - into service in less than a year, with the initial intention off attacking the German battleship *Tirpitz* in Trondheim Fjord, Norway. Trials in Portsmouth and then in the cold waters of Loch Cairnbawn, Scotland, were successful - despite some bizarre events including a party held by "Charioteers" beneath a train and an evasion exercise against local Home Guard members which resulted in a flare pushed through the letterbox of a local Police station.

(Continued on page 9)

Binnacle List

Jan "Bear" Stiffey had a heart attack at work on 5/5/2003. Last report is that he has recovered nicely and is doing well.

Sub Facts—Continued from our last issue....

- The USS NAUTILUS steamed 60,000 miles on a lump of Uranium the size of a golf ball. A diesel powered submarine would have required 3,000,000 gallons or 300 railway tank cars of oil.
- Two wives of Presidents of the United States have sponsored submarines. Mrs. Dwight D. Eisenhower christened the USS NAUTILUS, and Mrs. John F. Kennedy christened the USS LAFAYETTE.
- A submarine often navigates by sound when submerged. Sound can travel 3,000 nautical mile or more through water.
- On August 17, 1958, the USS SKATE circumnavigated the globe in about fifty minutes. The SKATE was at a radius of about two miles from the North Pole at the time, and the distance traveled in the circumnavigation was about twelve miles.
- USS TRITON, the only American made twin reactor ship ever built, on May 10, 1960, completed the first totally submerged circumnavigation of the world when she followed the route of Ferdinand Magellan for 36,000 miles during 84 days beneath the surface.
- When the nuclear powered submarine USS SEADRAGON surfaced at the North Pole while charting the Northwest passage in August 1960, the crew organized a baseball game. Because of Polar time differences, when a batter clouted a home run it would land in either the next day or in 'yesterday'.
- The USS SKIPJACK was the first submarine designed from the keel up for top underwater performance using nuclear power. An earlier SKIPJACK was the first submarine to cross the Atlantic ocean under her own power (Newport, Rhode Island to Ponta Delgada, Azores, in 1917).
- Coronation ceremonies of Emperor Alexander II of Russia in 1855 were enlivened by a submarine concert. Wilhelm Bauer, a Bavarian inventor, took three musicians under the waters of Kronstadt Harbor in a submarine he had built, where they played appropriate music during the coronation. The music was distinctly heard on the surface.
- United States Submarines destroyed a total of 1314 Japanese ships during World War II, including one battleship, eight aircraft carriers, fifteen cruisers, forty-two

2003 Seattle Base Officers and Chairs

Commander:	Patrick Householder	425-392-0440
Sr. Vice Commander:	Bob Oppe	425-747-1247
Jr. Vice Commander:	Peter McCafferty	206 784-8920
Secretary:	Charlie Ryan	206 525-0935
Treasurer:	Jim Harper	425-357-6485
Membership Chair:	Peter McCafferty	206 784-8920
Ceremonies Chair:	Don Masoero	253 941-4133
Base Chaplain:	Mike Bennett	206-767-1934
Chief of the Boat:	Ted Taylor	425-228-3764
Newsletter Editor:	Don Gentry	425-227-5410
Base Storekeeper	Bill Giese	425-355-5590
Webmaster	Ric Hedman	

Upcoming Meetings—Seattle Base

Location: VFW Hall, Redmond

6:30 Social Gathering

7:00—10:00pm Mtg

Wednesday - June 18, 2003

Wednesday - July 16, 2003

Welcome Aboard to New Crewmembers

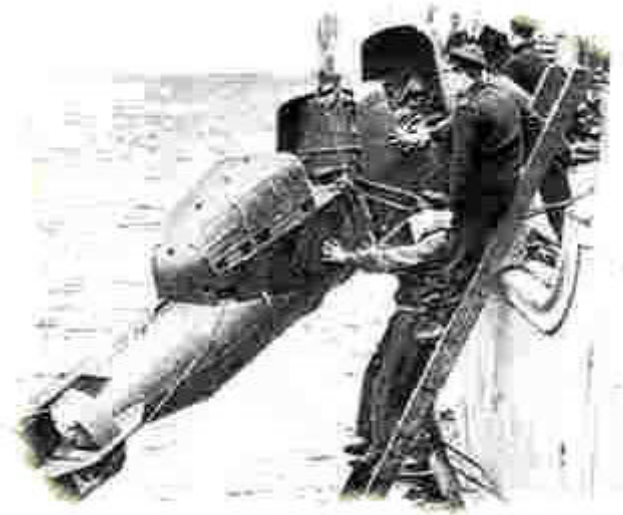
Name	Qual Boat
Steve Freeman	USS Guitarro 1984
Jon B Jolly	USS Chopper 1945
Lincoln Loehr	USS Wahoo 1972
Dave Butterfield	USS Diodon

destroyers, and twenty -three submarines. Against this score, fifty -two U.S. Submarines were lost.

- The USS SKATE (SSN 578) was the first vessel ever to surface at the North Pole, when on March 17, 1959 she surfaced there to conduct memorial services for the renowned Arctic explorer Sir Hubert Wilkins.
- USS SKATE and USS SEADRAGON, after affecting a historic rendezvous under the ice, surfaced together at the North Pole through an opening in the ice on August 1962.
- The first diesel engines built by Electric Boat for submarines were installed (1913) in the USS NAUTILUS and SEAWOLF, namesakes of the first nuclear powered submarines, also built by Electric Boat.
- The USS NAUTILUS made history by cruising submerged from the pacific to the Atlantic Ocean, passing under the North Pole at 11:15 p.m. EDST on August 3, 1958.

(Continued from page 7)

However the final trials against defences of HMS *Howe* were completely satisfactory, three Chariots out of four reaching their target and attaching their dummy charges. Unfortunately during a third trial run, Sub-Lieutenant Jack Grogan SANVR suffered a fatal blackout while beneath *Howe's* keel, probably due to O₂ poisoning. The two operators were equipped with basic breathing equipment and rudimentary dry-suits (known as "Clammy Death") consisting of a one piece rubber hooded overall. Gloves were meant to be worn, but in practice often weren't due to their cumbersome nature, the men smearing thick engine grease over their exposed hands in attempts to keep out the chill.



Chariot hoisted inboard after trials

British Chariots took part in five European operations:

1st November 1942

Operation Title:

This was an abortive assault on the German battleship *Tirpitz*, moored in a Norwegian Fjord. They would be transported by the trawler *Arthur*, under the command of the legendary Leif Larsen - 'Shetland Larsen' - of the Royal Norwegian Navy, with Engineer Bjørnøy and Seaman Kalve. The three chariot teams (two operational and one spare) consisted of Lt. Jock Brewster RN, with AB Jock Brown as his No.2; Sergeant Donald Craig of the Royal Engineers and AB Bob Evans were the second crew; ABs Malcolm Causer and Bill Tebb were spare crew and dressers. The range of the attack, compared to the Italians' jaunt across the bay at Gibraltar, was immense, but the *Arthur* set off from Shetland on 26 October 1942 carrying two chariots which were subsequently put over the side and towed. With the chariot crews hidden in the hold the skipper of the boat, the legendary Leif Larsen - "Shetland Larsen" - bluffed his way past the German patrols and entered Trondheim Fjord - but with barely ten miles to go it was found that both chariots had broken free in rough seas and were lost. There was nothing for it but to sink *Arthur* and make for the Swedish frontier. All made it but for AB Evans, wounded and captured near the frontier and subsequently shot - though not in uniform, he still had RN identity tags.

The British eventually modified three T-class sub-

marines to carry Chariots - the *Trooper* (3 chariots), *Thunderbolt* (2) and *P311* (2).

2nd January 1943

Operation Principle

(sometimes reported as 'Principal'): The Italians had their own weapon turned against them when three British chariots attacked Palermo. The British T-Class submarine *Traveller* (Lt.Cdr D. StClair Ford RN) had been lost on 4th December while making a preliminary reconnaissance of the harbour, while *P311* (Lt. R.D. Cayley RN) was lost prior to the attack itself, having gone on ahead through the mined Sicilian Channel to Maddalena. In addition, the smaller *Unruffled* was also along as the rescue submarine for the crews. Five chariots remained for the attack, on the night of 2/3 January 1943. One chariot crew - Sub.Lt H.L.H. Stevens RNVR and Ldg.Seaman Carter - had five hours of struggling to find the entrance of the harbour, when Carter's breathing bag failed and ran out of oxygen. Stevens decided to leave Carter on a buoy, to continue alone. However, he was still unable to find the harbour and went back for Carter and to look for their parent submarine. But there was no sign of *Trooper*. After more hours in the water they saw, in the darkness, the outline of the *Unruffled* (P46). The vigilant lookouts on the *Unruffled* saw the chariot and they were rescued. One chariot had a battery explosion: AB W. Simpson was drowned but the other, P.O. Miln, swam ashore and was taken prisoner.

The driver of a third chariot, Lt. H.F. Cook RNVR had ripped his suit on a net and was suffering from severe seasickness. His number 2, AB Worthy, drove the craft ashore to leave Cook and carry on alone, but he found the craft too difficult to handle alone and abandoned it in deep water. He swam back to where he had left Cook but failed to find him. Worthy was also taken prisoner. Of the two chariots that remained, *XXII*, manned by Lt. R.T.G. Greenland RNVR and Leading Signalman A.M. Ferrier, succeeded in penetrating the net by night and, crossing the harbour undetected, dived underneath the new Italian cruiser *Ulpio Traiano*. Once there, the two men successfully placed their charge under the ship's bottom. A second chariot, *XVI*, with Sub-Lt. R.G. Dove RNVR and Leading Seaman J.M. Freel in the saddles, also got through the net and, like the first chariot, crossed the harbour without being observed. There they selected the 8,500-ton transport *Viminale* as their target, dived beneath her stern and successfully fixed the charge. They made their way ashore and were taken prisoner. Greenland and Ferrier were feeling more optimistic and tried to make their way to sea. They crashed through a net at full speed but came to a sudden halt when they bumped into a merchant ship and further damaged their compass. They eventually abandoned their craft and swam ashore and were captured, joining the four others - P.O. Miln and AB Worthy, Sub.Lt Dove and L/Sea Freel - in captivity, firstly in Italy and then moved to a *Marlag* in Germany when Italy surrendered. As a sad footnote, on release in May 1945, they found that their special pay for diving and chariot duties had been stopped from the time of their capture. *Principle* was a hollow success - Of the eight chariots that set out from Malta, none returned. Three chariots and their crews were lost with P311. One two-man crew were brought back (Stevens and Carter) while, of the remaining four crews, six were in captivity and two more were dead. The operation caused the loss of two valuable T-Class submarines, *P311* and *Traveller*. Against this were the sinking of a new Italian cruiser, which may not have been able to put to sea anyway, due to fuel shortages, and damage to a troopship (which had nowhere to take any troops to). Other charges were laid by Greenland and Ferrier but were either made safe by Italian divers or were incorrectly set.

18th January 1943

- A successful attempt to sink German merchant vessels destined for use as block-ships to choke the harbour after the German withdrawal at Tripoli by two Chariots. Both British Chariots were launched from HMS *Thunderbolt*. One chariot - Lt. Geoff Larkin and P.O. Cook Conrad Berey - was damaged on launching, making it unable to dive, though this was not discovered for half an hour, by which time the chariot was nearly at the harbour entrance. These two men got ashore just to the west of Tripoli, destroyed their chariot and diving suits and, by way of several adventures over seven days, including being captured by Germans, escaping and being looked after by an Italian, made their way back to Malta via Cairo and Castel Benito.

Chariot *XIII*, driven by Sub.Lt. H.L.H. Stevens RNVR, with Chief ERA S. Buxton, pressed on. They arrived off the harbour just as the Germans were sinking the first of the ships. Nevertheless, Stevens managed to attack his secondary target, the merchant ship *Guilio*. Both men were later captured and after a series of adventures met up with Greenland and Dove in a POW camp near Rome. On escaping amid the confusion of the German takeover of the camp after the Italian surrender, they sought refuge in the Vatican, where they enjoyed a safe war until liberated 15 months later by the US 5th Army.

May/June 1943

Successful beach reconnaissance in preparation for the invasion of Sicily. Three Chariots were used, each one carried on a U-Class submarine (HMS *Unrivalled*, *Unseen* and *Unison*). (The U-class were much smaller than the T-class and were more effective in shallow waters). But the biggest success for the chariots came three weeks after the fall of Rome in

June 1944

A single chariot forced its way through dense anti-submarine nets into La Spezia harbour and sank the last Italian heavy cruiser *Bolzano*, which the Germans had seized at the time of the Italian surrender and withdrawn to the north. Operation 'QWZ', as it was known, was a joint operation with the Italian Navy. Two chariots - Sub.Lt. M.R. Causer (the veteran of the Trondheim attempt on *Tirpitz* and the walk to Sweden), with AB Harry Smith, and PO Cook Conrad Berey with Stoker

Ken Lawrence, were carried in Italian Motor Torpedo Boat *MS74*. Causer and Smith made a textbook attack securing the warhead underneath *Bolzano*. Berey had failed to find the entrance to the harbour and, as dawn was breaking, decided to scuttle his Chariot. Both Chariot teams failed to make the rendezvous with their MTB transports and, by coincidence, succeeded in joining the same group of Italian partisans ashore. Berey managed to cross the River Arno in August 1944 to rejoin British forces, but Lawrence, Causer and Smith were all captured while trying to make the same crossing.

One Chariot operation took place in the

Far East

This was against two Italian liners, the *Sumatra* and the *Volpi*, at Phuket, north of Penang, Malaya. On 27 October 1944, the *Trenchant* (Lt. Cdr. A.R. Hezlet RN) successfully launched two Mk.II 'Terry' Chariots. These were a great improvement on the Mark 1, with the two-man crew sitting back-to-back. The two chariot teams comprised Sub-Lt 'Lofty' Eleridge with Petty Officer Woolcott, and Petty Officer W.S. Smith and Steward A. Brown. The first pair successfully attacked and sunk the *Sumatra* in a text-book raid. The second team found that they unable to attach their charge to the hull of the *Volpi*, due to the deep draught and lack of space underneath the hull and then the barnacle-encrusted hull itself. Brown, therefore, had to place the charge inside the ship's engine-room, a job which took twenty extra minutes. Both crews returned to the *Trenchant* and were able to watch as their targets exploded. This was the last chariot attack of the war.

[The above information and photos used with permission of Geoff Chalcraft who has additional info on his website at: <http://web.ukonline.co.uk/chalcraft/sm/chariots.html>—Ed.]

(“Corner” - Continued from page 1)

hard work of Dave (COBRACOB) Goodson and his merry band and Ric Hedman's efforts to paint white trim on the exterior of the submarine, as it looked in service.

See you all at our next meeting.

Your shipmate,
Pat Householder

(USSVI - Continued from page 3)

trict 9 came in on time and he was happy about it. There was a general discussion on recruiting new members.

Elliott Abram spoke up on recruiting, getting the applications out and some of the suggestions were boat reunions, putting brochures on some of the boats on display, getting out bumper stickers and such. He spoke of the value of getting Speakers for the base meetings to help bring in new members.

Jim Foote Western Regional Director said that on the last election only 22% of the members voted. We need to get the members to vote **and** mail them in. He suggested that getting some of the members to come to the E-board meetings may get them more involved. We need more members to accept responsibility for Base officer positions.

He spoke of maybe discontinuing the District Meeting in favor of Regional Meeting but the general consensus was the District meeting are better for most due to travel time and distance and it was suggested that it be on the week ends so more could attend. Portland Blueback Base was chosen for the District 9 meeting in 2004.

There was a solicitation of ideas for the 40th Anniversary of USSVI in 2004.

Jim told us that there are now over 125 members of the USSVI RV Club, they had a meeting in Reno and are asking for more to join them.

Don Smith made mention of the VLC “Veterans Legation Coalition” and was asking for District help on the fees needed but withdrew the motion when informed it would cost bases in other states as well as Washington.. Not further action was taken.

Elliot reported on the visit to the SAOC convention in Vancouver BC and remarked on how well they were treated. They received a framed print of a Canadian submarine from the Canadian Sub Vets

It was asked if there was anymore for the good of the order.

Benediction by Yakima Base Chaplin Les Sutton.

Closed at 1130 AM by Cliff Nutter.

Submitted by;

E. H. Collins
Blueback Base Commander

USSVI Seattle Base
c/o Patrick Householder
25003 SE 146th St
Issaquah, WA 98027

To:

*"No matter where you travel, when you meet a guy who's been...
There's an instant kind of friendship 'cause we're brothers of the 'phin."*

— Robert Reed, G.W. Carver (SSBN-656)



Base Cdr Pat Householder and D9 Cdr Cliff Nutter serve as flag bearers at the Memorial Day ceremony at Tahoma Cemetery. Robbie Roberson was also in attendance.