## **Steel Valley Dolphins**

Monthly Newsletter







**USS Growler SSG-577** 







#### The USSVI Requin Base supports the National Creed

"To perpetuate the memory of our shipmates who gave their lives in the pursuit of duties while serving their country. That their dedication, deeds, and supreme sacrifice be a constant source of motivation toward greater accomplishments. Pledge loyalty and patriotism to the United States of America and its Constitution."

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### Meeting Information

Meetings are held on the second Saturday of the month, normally at the Baden PA American Legion. Quarterly meetings are held around our membership area.

### Our next meeting will be

February 17, 2024 @ 1230 hours

At Baden American Legion Post 641

#### **Base Location**



American Legion Post 641 271 State St Baden PA 15005

#### From the Editor

Please send ideas for articles or copies of articles, with full credit information to me for consideration of submission in the SVD.

We are a SUBMARINE group. As such, the articles should be SUBMARINE or NAVY related.

Lou Hamill - itgeek8088@gmail.com

### MAKE A DIFFERENCE, ATTEND A MEETING!

#### Our Website

For additional information about what is happening at **YOUR** base, go to https://www.requinbase.org/



### **USSVI National Officers**

Office National Commander	<b>Officer</b> William Andrea	Phone	eMail wcandrea@bellsouth.net
Senior Vice Commander	Jon Jaques	615-893-7800	jjaques@bellsouth.net
Junior Vice Commander	Steven Bell	704-824-3510	usnret82@carolina.rr.com
Secretary	Raymond Wewers	479-967-5541	raywewers@gmail.com
Treasurer	Paul Hiser	910-691-5650	paulhiser664@gmail.com
Past Commander	Wayne Standerfer	972-298-8139	lwaynes@charter.net
Chaplain	James Sandman	615-975-4792	Jsandman85@gmail.com
Region Director Northeast District Commander EN3		917-748-2275 301-845-0049	CdrNJNorthBase@hotmail.com gcmfish@verizon.net
National Office	Dennis Nardone	360-337-2978	ussvi@telebyte.net



### USS Requin Base Officers

Office	Officer	Phone	eMail
Base Commander	Hubert C. Dietrich	412-486-2635	hueyfromglenshaw@aol.com
1st Vice Commander	Joe Campisi	412-322-3201	jcampisi654@comcast.net
2nd Vice Commander	Chuck "Bat" Masterson	724-869-1938	mastersoncf@aol.com
Secretary	Jeff Simon	920-217-8633	jeffsimon@zoominternet.net
Treasurer	Lee M. Bookwalter	412-795-8337	booky143@verizon.net
Storekeeper	Frank Nicotra	412-835-6540	nicotrafrank@gmail.com
Chaplain	Eric Bookmiller	724-485-2341	ebookmiller@comcast.net
Past Base Commander	Joe Campisi	412-322-3201	jcampisi654@comcast.net
Newsletter Editor	Lou Hamill	412-445-3998	itgeek8088@gmail.com
Webmaster	Lee M. Bookwalter	412-795-8337	booky143@verizon.net
COB/Historian	Chad Underkoffler	724-809-6830	candj981@verizon.net
Photographer	Rick Flaugh	412-779-0497	flaughre@comcast.net
Holland Club Chairman	Joe Campisi	412-322-3201	jcampisi654@comcast.net
Asst. Holland Club	Dick Geyer	724-822-0401	dgdiving@gmail.com
Technology Chair	Lou Hamill	412-445-3998	itgeek8088@gmail.com
Eagle Scout Chair	John Held	724-331-2479	petecompost@aol.com
Awards Chair	Dick Geyer	724-822-0401	dgdiving@gmail.com
Master at Arms	Chuck "Bat" Masterson	724-869-1938	mastersoncf@aol.com
Public Affairs Chair	Ed Derr	724-854-0781	rredde@gmail.com







### **Tolling of the Boats for January**

#### USS Argonaut (SS-166)

Lost on Jan 10, 1943 with the loss of 102 officers and men off Rabaul, on her 3rd war patrol. While attacking a convoy, she torpedoed a Jap destroyer who along with 2 other destroyers depth charged her. As she tried to surface, the destroyers sunk her by gun fire.

#### USS Swordfish (SS-193)

Lost on Jan 12,1945 with the loss of 89 officers and men somewhere near Okinawa, on her 13th war patrol. Probably was lost to a mine.

#### USS S-36 (SS-141)

Lost on Jan 20, 1942 with no loss of life, on her 2nd war patrol. She ran hard aground on a reef and radioed for help. The entire crew was rescued by a Dutch ship after they scuttled her.

#### USS S-26 (SS-131)

Lost on Jan 24,1942 with the loss of 46 officers and men in the Gulf of Panama, on her 2nd war patrol. She was rammed by the USS PC-460 and sunk within seconds. The CO, XO and one lookout on the bridge, were the only survivors.



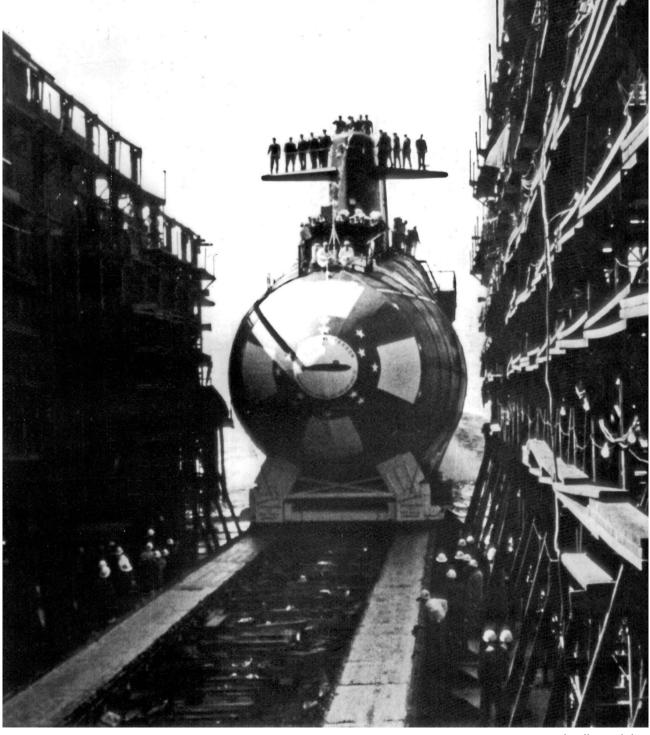


## **Submarines commissioned during the month of January**

Adder SS-3	1/12/1903	Wikipedia	NavSource	
Bonita SSK-3	1/11/1952	Wikipedia	NavSource	
Moccasin SS-5	1/17/1903	Wikipedia	NavSource	
G-4 SS-26	1/22/1914	Wikipedia	NavSource	
H-3 SS-30	1/16/1914	Wikipedia	NavSource	
K-2 SS-33	1/31/1914	Wikipedia	NavSource	
T-1 SS-52	1/30/1920	Wikipedia	NavSource	
T-2 SS-60	1/7/1922	Wikipedia	NavSource	
R-2 SS-79	1/24/1919	Wikipedia	NavSource	
S-3 SS-107	1/30/1919	Wikipedia	NavSource	
S-11 SS-116	1/11/1923	Wikipedia	NavSource	
S-15 SS-120	1/15/1921	Wikipedia	NavSource	
S-27 SS-132	1/22/1924	Wikipedia	NavSource	Eternal Patrol
S-41 SS-146	1/15/1924	Wikipedia	NavSource	
Shark SS-174	1/25/1936	Wikipedia	NavSource	Eternal Patrol
Pickerel SS-177	1/26/1937	Wikipedia	NavSource	Eternal Patrol
Pollack SS-180	1/15/1937	Wikipedia	NavSource	
Sculpin SS-191	1/16/1939	Wikipedia	NavSource	Eternal Patrol
Tuna SS-203	1/2/1941	Wikipedia	NavSource	
Greenling SS-213	1/21/1942	Wikipedia	NavSource	
Finback SS-230	1/31/1942	Wikipedia	<u>NavSource</u>	
Trigger SS-237	1/31/1942	Wikipedia	<u>NavSource</u>	Eternal Patrol
Bream SS-243	1/24/1944	<u>Wikipedia</u>	<u>NavSource</u>	
Jack SS-259	1/6/1943	<u>Wikipedia</u>	<u>NavSource</u>	
Lapon SS-260	1/23/1943	<u>Wikipedia</u>	<u>NavSource</u>	
Pogy SS-266	1/10/1943	<u>Wikipedia</u>	<u>NavSource</u>	
Tinosa SS-283	1/15/1943	<u>Wikipedia</u>	<u>NavSource</u>	
Moray SS-300	1/26/1945	<u>Wikipedia</u>	<u>NavSource</u>	
Perch SS-313	1/7/1944	<u>Wikipedia</u>	<u>NavSource</u>	
Capitaine SS-336	1/26/1945	<u>Wikipedia</u>	<u>NavSource</u>	
Guitarro SS-363	1/26/1944	<u>Wikipedia</u>	<u>NavSource</u>	
Pintado SS-387	1/1/1944	<u>Wikipedia</u>	<u>NavSource</u>	
Pipefish SS-388	1/22/1944	<u>Wikipedia</u>	<u>NavSource</u>	
Trumpetfish SS-425	1/29/1946	<u>Wikipedia</u>	<u>NavSource</u>	
Argonaut SS-475	1/15/1945	<u>Wikipedia</u>	<u>NavSource</u>	
Remora SS-487	1/3/1946	<u>Wikipedia</u>	<u>NavSource</u>	
Barbel SS-580	1/17/1959	<u>Wikipedia</u>	<u>NavSource</u>	
Halibut SSGN-587	1/4/1960	<u>Wikipedia</u>	<u>NavSource</u>	
Gato SSN-615	1/25/1968	<u>Wikipedia</u>	<u>NavSource</u>	
Thomas Jefferson SSBN-618	1/4/1963	<u>Wikipedia</u>	<u>NavSource</u>	
George Bancroft SSBN-643	1/22/1966	Wikipedia	<u>NavSource</u>	
Pargo SSN-650	1/5/1968	<u>Wikipedia</u>	<u>NavSource</u>	



Sea Devil SSN-664	1/30/1969	<u>Wikipedia</u>	<u>NavSource</u>
Bluefish SSN-675	1/8/1971	Wikipedia	<u>NavSource</u>
Tunny SSN-682	1/26/1974	<u>Wikipedia</u>	<u>NavSource</u>
Indianapolis SSN-697	1/5/1980	<u>Wikipedia</u>	<u>NavSource</u>
Boston SSN-703	1/30/1982	<u>Wikipedia</u>	<u>NavSource</u>
City of Corpus Christi SSN-705	1/8/1983	<u>Wikipedia</u>	<u>NavSource</u>
Augusta SSN-710	1/19/1985	<u>Wikipedia</u>	<u>NavSource</u>
Alaska SSBN-732	1/25/1986	<u>Wikipedia</u>	<u>NavSource</u>
Scranton SSN-756	1/26/1991	<u>Wikipedia</u>	<u>NavSource</u>
Springfield SSN-761	1/9/1993	<u>Wikipedia</u>	<u>NavSource</u>
Santa Fe SSN-763	1/8/1994	<u>Wikipedia</u>	<u>NavSource</u>



Binnacle List	Eternal Patrol	In Remembran	ce	
Dan Phelps Ron Campbell Charlie Warren Cassandra Sewel	All Hands Present and Accounted For	Thomas E. Stewart Edward D. Cramer Earl E. Wood John Good Edgar H. Paul Robert L. Godley Jr. Vincent B. Segeleon Robert Stahl	SN(SS) TM2(SS) QM2(SS) IC3(SS) FTG1(SS) TME2(SS) YNC (SS)	1/2/2017 1/5/2018 1/9/2017 1/13/2004 1/14/2018 1/17/2013 1/20/2018 1/26/2019

Bii Member	rthdays Spouse	Anniversaries
John Sutherin, Sr 2/3 Ronald Weaver 2/3 Russ Osborne 2/5 Paul Coyle 2/10 Richard Keys 2/10 Dan Bagley 2/11 Carl Capito 2/13 Luke Walters 2/13 Joshua Sewell 2/14 Stephen McKinney 2/15 James Cowher 2/18 Lawton Gaines 2/19 George Dolgos 2/26 James Harris 2/26	Linda Gaylor 2/9 Rosemarie Riley 2/9 Lynn Gourley 2/10 Rosemary McCarthy 2/12 Cassandra Sewell 2/18 Kim Bittner 2/19 Barbara Sorbie 2/23 Adele Wise 2/28	Flo & Michael Hemming 2/6 Julie May & Edward May 2/13 Debra & Arthur Davis 2/14 Yvonne & Paul McKenzie 2/15 Barbara & Andrew Sorbie 2/23

### Commanders Corner

Shipmates – Our January meeting had over forty (40) members and guests in attendance. It is so refreshing to see our new members! And a big thanks to all the first mates and guests, who honor us with their presence.

The year of 2023 was a mile stone for the base – we had 17 new members. That is a new record for our base. We are starting the year with a base membership of 201. Congratulation's Shipmates.

Our February base meeting will be held on Saturday, Feb 17! We were originally scheduled for Feb 10<sup>th</sup>, but the American Legion scheduled another event, so we moved to Feb 17<sup>th</sup>.

There are two very important events that I hope all submarine veterans will participate.

FIRST – Thursday, April 11<sup>th</sup> is SUBMARINE BIRTHDAY! Through my efforts to connect the Carnegie Science Center (home of the Requin) and Veterans Breakfast Club, they are jointly planning the event. It will be held in mid-week (make adjustments to your work schedule). More information will be made available ASAP!

SECOND: Shipmate Dan Bagley is doing a project to tell the story what an impact and how valuable submarine service has made in the life of sub-vets. His introduction letter is INCLUDED in this edition of our SVD! Dan is working with NAVSEA. The Requin base is the beginning of Dan's project. He also will be scheduling interviews at our submarine convention, which is being held in Cleveland, Ohio.

PLEASE READ DAN'S "ALL HEAR THIS" "ALL HEAR THIS" LETTER!!!!!!!



### Annual Board Meeting Minutes

Executive Members Present: Lee Bookwalter, Joe Campisi, Huey Dietrich, Bat Masterson, Jeff Simon

Appointed Members Present: Eric Bookmiller, Dick Geyer, Lou Hamill, Frank Nicotra, Chad Underkoffler

#### **Topics Discussed:**

**Base Budget:** As required in the Requin Base By-Laws, the following budget for 2024 was approved by the Executive Board. All other significant expenditures will be brought to the membership at monthly meetings.

<u>Activity</u>	<u>Expenditure</u>
Scholarship (Eternal Patrol)	\$400.00
Website Hosting 3 yr (due 2023) Base Website Domain	\$505.00 \$18.00
Boat Sponsorship	\$30.00
Eagle Scouts (coin/patch/	\$300.00
USS Requin Memorial Ser-	\$500.00
Guest Speakers (gifts)	\$100.00
Holland Club hats/pins	\$156.00
Loyalty Pins	\$200.00
Advertising (Veterans Day,	\$525.00
SVD & Office Expenses	\$3600.00
Nautilus float expenses	\$1000.00
Nautilus storage	\$200.00
American Legion Home As-	\$200.00
Christmas Party	\$1000.00
Total:	\$8734.00

**Meeting Locations:** Unless indicated normal base meetings are on the second Saturday of the month at American Legion Baden PA. The practice of holding one meeting per quarter at a location other than Baden PA will continue this year. Shipmates responsible for coordinating these meetings are listed.

April 13 - meeting at American Legion 902 Houston PA (Bookmiller/Underkoffler)

June 8 - meeting at American Legion Post 290 in Columbiana OH (Sutherin/Warren)

August 10 - meeting at American Legion Post 820 in Monroeville PA (Pellegrino)

October 12 - meeting at Golden Coral in Hermitage PA (Derr/Cochenour)

#### Parades/Memorials:

March 17 - St Patrick's Day Pittsburgh

May 10 – Fish Rodeo

May 26 - Memorial Service USS Requin

May 26 - Carnegie Parade

May 27 - Sewickley Parade

May 27 - Lawrenceville Parade

May 27 - Coraopolis Parade

July 4 - Canonsburg Parade



July 4 - Leetsdale Parade (tentative)

July 19 -Deichler change of command

Aug 19/24 - SubVets National Convention

Sept 1 - Requin Birthday

Oct 5 -Columbus Day Parade

Oct 11 – Navy Ball

Nov 11- Veterans Day Parade

Dec 7 -Pearl Harbor Day

#### **Additional Activities:**

Road trip to Groton CT, USS Idaho

Land based steaming in the engine room – January

Christening – March

Float off - spring 2024

Sea trials - 2025

VFW 3945 Fish Rodeo - May 10

#### **Appointed Committees:**

#### **Standing Committees:**

Storekeeper – Nicotra

Chaplain - Bookmiller

Newsletter Editor – Hamill

COB/Historian – Underkoffler

Photographer – Flaugh

SVD – Hard Copy – Masterson

Holland Club Chair - Campisi

Asst. Holland Club – Geyer

Eagle Scout Chair - Held

Technology Chair - Hamill

Webmaster - Bookwalter

Awards Chairman - Dick Gever

Master At Arms – Masterson

Public Affairs - Derr

Active Duty Go-Between - Vacant

Requin Sailor Go-Between - Vacant

**Fund Raisers:** Parades, candy sales, 40-40-20 raffle, Booster Club donations, small stores sales, challenge coin sales, etc.

#### **Miscellaneous Topics:**

Mush Morton Award status

Parade trailer status

Members where dues were waved or promised

Members dropped for base

Members on Eternal Patrol in 2023

Holland Club inductees

New members

Life Membership - National 83, Base 67

#### Discussion of Base matters.

Setting up and take down at American Legion meetings

Motion to allow simultaneous participation in parades (i.e. Lawrenceville and Sewickley) was approved with one no vote.

Motion to purchase one table at the October 11 Navy Ball was approved by all attendees.



# .....

### **Meeting Minutes**

Base Commander Huey Dietrich called the meeting to order.

**Attendees:** Willard Ashmore, Eric Bookmiller, Lee & Patsy Bookwalter, Clair Bouts, Don Bright, George Brown, Tom & Denean Calabrese, Ron Campbell, Joe Campisi, Frank Certich, Paul Coyle, Ken Crosby, Huey & Edie Dietrich, Rick Flaugh, Dick Geyer, Bob & Lynn Gourley, David Halliday, Lou Hamill, John Held, Jean Lemieux, Bill & Sandy Lindsey, Pete & Nancy Loskosh, John Mack, Bat Masterson, Vince Metz, Joe Monteleone, Bob & Jude Myers, Frank Nicotra, Chuck Schrump, Jeff & Eileen Simon, Keith & Connie Small, Jack & Karen Sutherin, Chad Underkoffler, Don Wood.

**Quote Of The Day:** "Helm, Bridge ... what are you doing 60 degrees off course? Coming back from 90 degrees sir."

**Requin History:** Launched January 1, 1945. January 20, 1948 given hull classification OSSR-481 and modified to the Migrain II radar picket configuration. January 15, 1951 entered Mediterranean until May when she returned to normal operations on the US east coast and in the Caribbean. January 1, 1953 maintained her schedule of Second and Sixth Fleet operations but at the end of the year put into Philadelphia PA for extensive modernization overhaul that among other things removed her last remaining anti-aircraft cannon.

**Base Commander Huey Dietrich:** Let us at this time, with a moment of silent prayer, remember our Shipmates who made the supreme sacrifice that we may gather here in Peace. We dedicate this meeting to our Shipmates on Eternal Patrol, to perpetuate their memories in our lives and to honor our Shipmates on active duty in the service of the first line of defense of our Nation.

#### **Boats Lost:**

 USS SCORPION (SS 278)
 January 05, 1944

 USS ARGONAUT (SS 166)
 January 10, 1943

 USS SWORDFISH (SS 193)
 January 12, 1945

USS S 36 (SS 141) January 20, 1942 USS S 26 (SS 131) January 24, 1942

We also honor our departed shipmates of the Requin Base, John Good, Robert Goodley, Tom Stewart, Earl Wood, Ed Cramer, Ed Paul, Vince Segeleon, Robert Stahl, and Charles Hilgendorf Finally let us remember all the brave submariners who died performing their duties aboard submarines, some individually and some in groups, but where the submarine itself was not lost.

#### Chaplain Eric Bookmiller gave the Invocation

**COB Chad Underkoffler** lead the base in the Pledge Of Allegiance Members introduced themselves and the boats they qualified on.

**Secretary Jeff Simon** reported that Minutes of the previous base meeting were published in the SVD. With no objections, the minutes were approved as published.

**Treasurer Lee Bookwalter** gave an accounting of base assets, expenditures, and deposits are available upon request. With no objections, the report was approved.

#### Other Reports:

Binnacle List: Cassandra Sewel, Dan Phelps, Ron Campbell

Eternal Patrol: None

Base membership stands at 204. Old, new, and perspective members were discussed.

Storekeeper Frank Nicotra reported on available small stores items.



Shipmates John Held and Lou Hamill reported on Eagle Scouts presentations.

#### **Social Events:**

VFW Post 3945 Fish Rodeo on May 10 was discussed. Motion to donate \$100 was approved by the members present.

American Legion Baden Home Association. Motion to donate \$200 due to cancellation of December meeting was approved by the members.

#### **Old Business:**

Mush Morton Award challenge coins project is funded for 6 years.

#### **New Business:**

Next base meeting will be on February 17<sup>th</sup> due to scheduling conflict at Baden American Legion. St. Patrick's Day parade on March 16<sup>th</sup>

Christening of USS Idaho will be held in March, which may conflict with St. Patrick's Day parade. Motion to donate \$100 to Morningside VFW for their Fish Rodeo on May 8<sup>th</sup> was approved by the members present

Per the approved budget, \$200 is being donated to Baden American Legion Home Association Veterans Breakfast Club will meet at Science Center on April 11<sup>th</sup> which is the Navy Birthday. 2024 budget was read.

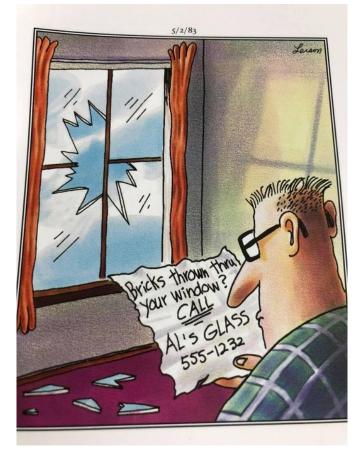
#### Good of The Order:

Letter from Don Bagley was read regarding NAVSEA interviews with submarine veterans to encourage future Navy enlistments.

COB/Chaplain Eric Bookmiller gave the Benediction and blessing of today's meal.

Adjournment: The meeting was adjourned.

Next meeting: American Legion Post 641, Baden, PA at 1230 hours on February 17, 2023





#### All HEAR THIS... All HEAR THIS...

We are doing a project to tell the story of how valuable submarine service is in the life of SUBVETS to help parents, district superintendents, company owners and CEOs and others get on the rope for the US national submarine build. We need vets to provide their stories through interviews. Submarine veterans can make a difference to others – by telling the story of how it mattered in YOUR life and MY life. This can be anything that sub service meant to you – technical, values, honor, service, etc. but the most interesting to our audiences is what you went on and did with your experience from sub life in your CAREER.

I am calling on all 7,000+ US SUBVETs to support this project by participating.

We need volunteers to tell their stories in any of 3 ways:

- 1. PERSONAL INTERVIEWS meet me in person or via Teams remote calls to interview 15-20 minutes.
- 2. EMAIL INTERVIEWS tell me your story in an email. Email and I'll send you the questions.
- 3. SEND ME YOUR RESUME Write an email about how you use submarine service to get other jobs, training, education, etc. and what did you do with it? And what did it do to enable the rest of your life?

#### **BACKGROUND:**

NAVSEA is driving to fulfill a strategic goal of the United States – to more than double the submarine build because of world dynamics. To meet the U.S. Navy's undersea warfare needs under a 2021 force structure assessment, the <u>submarine industrial base must sustain a minimum construction rate</u> of two Virginia-class attack submarines and one Columbia-class ballistic missile submarine per year throughout this decade and into the next — without counting any additional submarines for Australia. So far, builders have not been able to keep up with that workload and are years behind schedule on some Virginia submarines. The U.S. submarine industrial base is producing an average of 1.2 Virginia-class attack submarines a year, short of the two our Navy needs. There are many reasons for this underperformance.

Well known is the shortage of technical and trade expertise to produce not only submarines, but also fighters, ships, weapons and other highly technical manufactured products for US national defense. The US is short of all engineering and trades, from CNC and welding to pipefitting and manufacturing skills. And the world situation demands a strong submarine US Navy.

January 4, 2024 I had a meeting at NAVSEA and am proposing to work with the executive office of submarine build to recruit companies, associations, and industry to assist the effort to ramp up submarine build support.

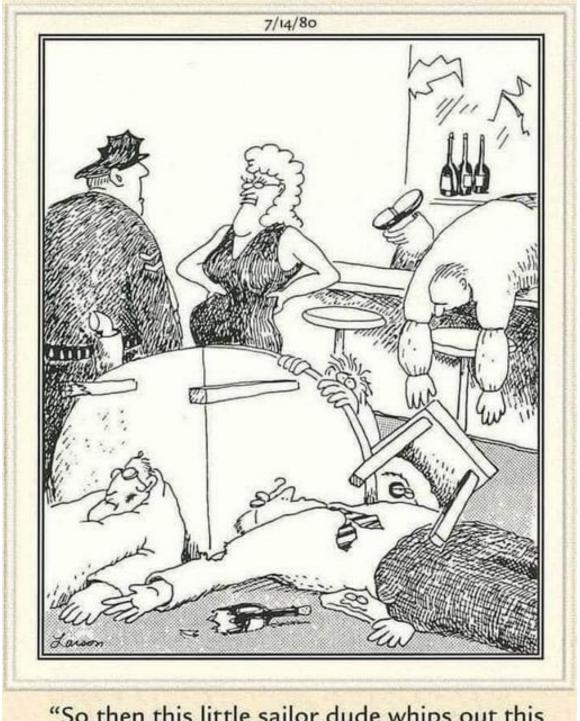
It is also key to know the Navy missed its 2023 recruiting goals by almost 20%. So this effort is also focused on the 7,300 school superintendents, and parents in those districts, too. Why do more parents not guide their children to the trades and to military service, when we know that this was so good for each one of us?

You will see renewed advertising during the super bowl attracting people to the Navy. And if you haven't been to the website <a href="https://www.buildsubmarines.com">www.buildsubmarines.com</a> I encourage you to go see it. Rallying and supporting the industrial base BEFORE there is a conflict is our aim.



Your stories are important. Please personally support this project by agreeing to an interview in any form that is comfortable for you. Participation may be with your name or anonymous, as you prefer.

If you would agree to support this project an interview or email, , you can email SUBVET Dan Bagley, EM1 (SS) USS Guardfish <a href="mailto:rdbagley@me.com">rdbagley@me.com</a> or call me at 412-554-7199.



"So then this little sailor dude whips out this can of spinach, this crazy music starts playin', and ... well, just look at this place."







### Congratulations:

LT Charlie Castiglione SOAC 23050 - 15 December 2023





### PCU Idaho SSN - 799

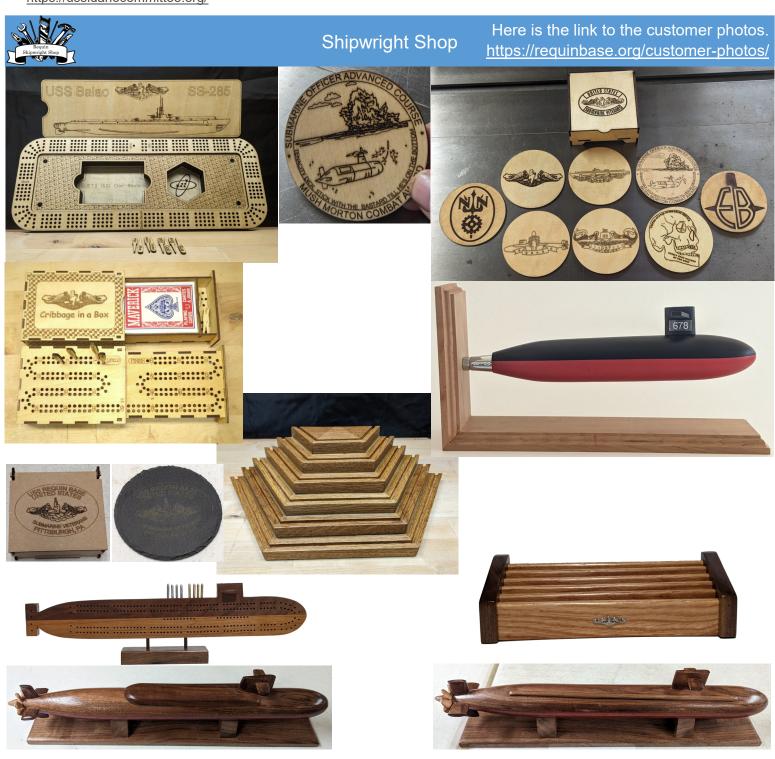




https://ussidahocommittee.org/



https://www.sublant.usff.navy.mil/SSN799/



If you would like any of these items, contact Huey Dietrich or Frank Nicotra.

You may also place your order for these and other items at a base meeting.





# USSVI ANNUAL CONVENTION 2024 CLEVELAND, OHIO HOME OF THE USS COD SUBMARINE MEMORIAL

- SHUTTLE SERVICE TO EVENTS
- . LAKE & RIVER CRUISES
- HELICOPTER TOURS
- JACK CASINO
- \* CLEVELAND FLATS
- \* ROCK & ROLL HALL OF FAME
- \* PLAYHOUSE SQUARE
- CLEVELAND MUSEUM OF ART
- \* SCIENCE CENTER
- \* CLEVELAND ZOO
- CLEVELAND AQUARIUM
- WOMENS AIR & SPACE MUSEUM
- CLEVELAND GUARDIANS
- FOOTBALL HALL OF FAME
- BREWERY TOURS
- \* INDOOR & OUTDOOR GOLF

#### REUNION DATES 8/17-8/19 & 8/25-8/27

CONTACT JOE MARANELLI 440-205-6089 M-F



















### The perfect place for a convention

Central location easy access drive or fly / Embassy Suites Rockside host hotel
Come meet fellow submariners SAVE THE DATE AUGUST 20-24 2024 WWW.THISISCLEVELAND.COM





### Chaplain's Column

Greetings to all my fellow Requin Base shipmates, spouses, and associate members.

As always, I would like to ask everyone to keep those on the binnacle list in our thoughts and prayers this month.

Remember we are only as good as the information we get. If we don't know of a member passing, we cannot provide the appropriate honors for a fallen shipmate. If you know anyone who is sick or goes on eternal patrol, please give me a call at 724-485-2341 or email at ebookmiller@comcast.net. If you call and I don't answer, please leave a message. This is a land line phone so do not text this number.

If you wish to be placed on the binnacle list but do not want to disclose the specifics, I will maintain your confidentiality.

Eric Bookmiller



### Store Keepers Report

Please visit our online store at

https://requinbase.org/shop/

You can have your items shipped to you at home via USPS [for a small fee], or pick them up at the next USSVI meeting.



2015 Convention



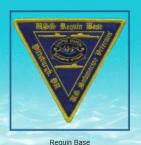




Non Specific











### **Eagle Scouts**

Please direct all Eagle Court of Honor requests to <a href="https://requinbase.org/eagle-coh">https://requinbase.org/eagle-coh</a>

Congratulation to:

Liam Hitchens Troop 173

Nathan Michael Stutzman Troop 215 Paul Michael Baronak Troop 215 Bryce Patrick Clancy Troop 215 Edward A. Counihan Troop 215 Gavin Michael Clancy Troop 215





### Say What???

Wheel Book - A 6" x 9" spiral bound notepad used to take notes from Day 1 of joining the Navy.

**Water slug** - refers to shooting a submarine's torpedo tube without first loading a torpedo. Often used as a joke to play on new non-quals. Shooting a water slug usually results in the shooter getting to clean out the torpedo tube.



### **Upcoming Events**

**Meeting**February 17, 2024
1230 hours

**Base activities** 

Nothing scheduled until March

American Legion Post 641 271 State St Baden PA 15005

MEMBER		Memb	ership		
Primary Members	170	Holland Club	87	USSVI Life Members	83
Secondary Members	13	WWII	1	Base Life Members	66
Associate Members	18	Eternal Patrol	81	Joined Last Year	17
Total Members	201			Joined This Year	0



#### **New Members**

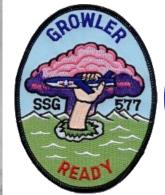
Eric Sipos qualified on the USS BIRMINGHAM SSN 695 as a ET1(SS) in 1985.

He left the navy and joined the Army and was discharged as a Captain, 0-3E in 2012.

Eric lives in West Mifflin, Pa with his first mate Annette. Please e-mail Captain Sipos and welcome him aboard <a href="mailto:ericjsipos@hotmail.com">ericjsipos@hotmail.com</a>









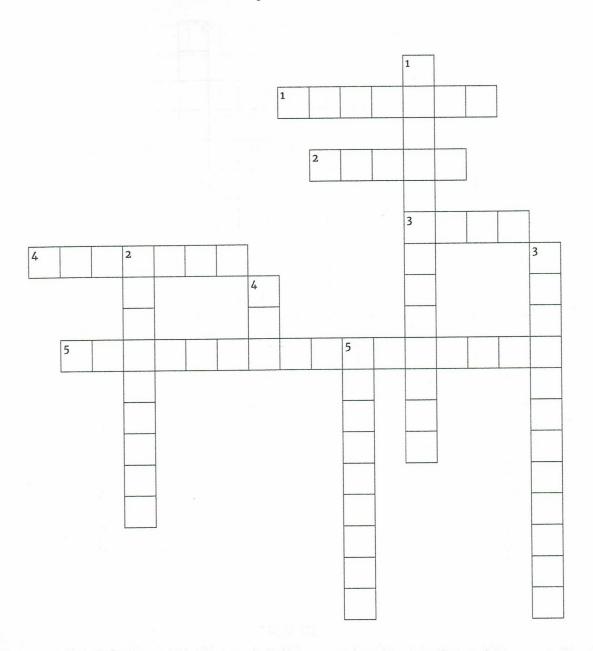


	History				
Name	Growler				
Namesake	<u>Growler</u>				
Ordered	31 July 1954				
Builder	Portsmouth Naval Shipyard				
Laid down	15 February 1955				
Launched	5 April 1958				
Sponsored by	Mrs. Robert K. Byerts, widow of Commander Thomas B. Oakley, Jr.				
Commissioned	30 August 1958				
Decommissioned	25 May 1964				
Stricken	1 August 1980				
Homeport	Pearl Harbor, HI				
Status	Museum ship at the <i>Intrepid</i> Sea, Air & Space Museum				

General Characteristics				
Class and type	Grayback class submarine			
Displacement	2,110 tons light, 3,550 tons full, 1,440 tons dead			
Length	96.69 m (317' 3" ft) overall, 96.3 m (316 ft) waterline			
Beam	8.2 m (27 ft) extreme, 7.9 m (26 ft) waterline			
Draught	5.7 m (19 ft)			
Propulsion	3 <u>Fairbanks-Morse</u> <u>Diesel engines</u> , 2 <u>Elliott</u> <u>electric motors</u>			
Speed	17 <u>kn</u> (20 <u>mph</u> ; 31 <u>km/h</u> ) surfaced, 12 <u>kn</u> (14 <u>mph</u> ; 22 <u>km/h</u> ) submerged			
Test depth	712			
Complement	9 officers, 11 chief petty officers, 68 enlisted men			
Armament	2 × <u>Regulus missile hangars</u> (4 x <u>Regulus I</u> or 2 x <u>Regulus II</u> missiles) 6 × <u>21 inch (533 mm) torpedo tubes</u> (4 bow, 2 stern) 16 x <u>torpedoes</u> (12 bow, 4 stern) Stern torpedoes anti-submarine only			



### US Navy Crossword Puzzle 1



#### **ACROSS**

- 1. A Fast, Medium-Sized Warship
- 2. When Was The Department Of The Navy Founded?
- 3. A(Phonetic Alphabet)
- 4. This Aquatic Sea Creature Is On The Warfare Device Insignia For Sailors Qualified Aboard Submarines
- 5. If A Ship Has A Hull Number Beginning With DDG, What Type Of Ship Is It?

#### **DOWN**

- First Female Command Master Chief
- 2. Royal Navy Takes Civilians And Forces Them Into Their Navy.
- 3. Which Of These U.S. Presidents Did Not Serve In The U.S. Navy?
- 4. A Sailor Word For "Yes"
- 5. A Naval Term For The Right Side Of The Ship



### PREMILITARY

YRATILIMNUSNAVY	
REKNALFZUHNTQQR	
A T N A T A B M O C N O N E B	
WIYNCIBJGFBPLWO	
W D R S O Q M V G C C Q I V S	
A D N A K I N I Y X Y I E R G	
DLSAYTITTFLPPEVLFFF	
CSUBRIGADIERTKI	
BAKZLCLYVGTTARD	
J B N M R S E I T I V A Y Z F	
G F W F B T U S M W T Y R K G	
L N L V N O P A A Y Z C D Y P	
Q R E S E R V I S T P F A S S	
S L L N G M V F T L Y V H E P	
E U W J B P W R Y B R K O B D	

ANTIMILITARY
BRIGADIER
DEACTIVATION
FLANKER

MILITARIA NONCOMBATANT RESERVIST UNMILITARY US NAVY





### This month in US submarine history

#### 01/01/1943

USS Nautilus (SS 168) evacuated 29 civilians from Teop Island, Solomons. Also on this date, USS Porpoise (SS 172) attacked a Japanese convoy and sank the freighter Renzan Maru off northeastern coast of Honshu, Japan.

#### 01/01/1944

USS Ray (SS 271) sinks a Japanese gunboat at the mouth of Ambon Bay, while USS Puffer (SS 268) attacks a Japanese convoy at the western entrance of the Mindanao Sea, sinking an army cargo ship. On the same day USS Herring (SS 233) attacks a Japanese convoy, sinking an aircraft transport ship 220 miles off Tokyo Bay.

#### 01/02/1943

USS Argonaut (SM1) sinks the Japanese guard boat Ebon Maru in the Bismarck Sea.

#### 01/02/1944

USS Finback (SS 230) sinks a Japanese merchant tanker in the East China Sea.

#### 01/03/1909

USS Scorpion arrives to help the survivors of the Messina, Sicily earthquake. With the Great White Fleet making its way through the Suez Canal, President T. Roosevelt orders the U.S. Navy to assist.

#### 01/03/1945

USS Kingfish (SS 234) attacks a Japanese convoy in the Bonin Islands sinking a Japanese army cargo ship and two freighters 200 miles north of Chichi Jima.

#### 01/04/1943

USS Shad (SS 235) sinks German minesweeper M 4242 (ex-French trawler Odet II) in the Bay of Biscay.

#### 01/04/1944

USS Bluefish (SS 222) and USS Rasher (SS 269) attack a Japanese convoy off French Indochina; Bluefish sinks a merchant tanker while Rasher damages another tanker. Also on this date USS Cabrilla (SS 288) sinks a Japanese freighter off Cape Padran, French Indochina while USS Tautog (SS 109) sinks a Japanese freighter off southern Honshu.

#### 01/07/1945

Submarine Spot (SS 413) sinks the Japanese gunboat No.2 Nichiei Maru in the Inland Sea.

#### 01/08/1983

Fast Attack Submarine USS City of Corpus Christi (SSN 705) is commissioned.

#### 01/08/1994

Fast Attack Submarine USS Santa Fe (SSN 763) is commissioned.

#### 01/09/1942

Submarine USS Pollack (SS 180) sinks the Japanese freighter Teian Maru (ex-Yugoslav Tomislav) 40 miles south-southwest of Inubo Saki, Japan.

#### 01/09/1959

Non-strategic submarine Halibut (SSGN 587), launches. Redesignated an attack submarine in 1965, she serves until decommissioned in 1986.



#### 01/09/1993

Fast Attack Submarine USS Springfield (SSN 761) is commissioned.

#### 01/10/1943

Submarine Trigger (SS 237) sinks the Japanese destroyer Okikaze off Yokosuka, Japan.

#### 01/101944

Submarines Seawolf (SS 197) and Steelhead (SS 280) attack a Japanese convoy about 70 miles north of Naha, Okinawa, sinking three ships, including one while in the middle of a typhoon.

#### 01/12/1943

Submarine Guardfish (SS 217) sinks Japanese Patrol Boat No.1 about 10 miles southwest of the Tingwon Islands, located just southwest of the northern tip of New Hanover, Bismarck Archipelago.

#### 01/14/1943

USS Gudgeon (SS 211) lands six men, 2,000 pounds of equipment and supplies on Negros Island for first resupply mission for a submarine.

#### 01/14/1944

Five U.S. Navy submarines sink five different Japanese vessels in and around the Pacific Ocean. USS Albacore (SS 218) sinks Japanese destroyer Sazanami 300 miles off Yap; USS Scamp (SS 277) sinks the tanker Nippon Maru off Sorol Island; USS Guardfish (SS 217) sinks tanker Kenyo Maru southeast of Palau; USS Seawolf (SS 197) sinks tanker Yamazuru Maru off Okinawa, and USS Swordfish (SS 193) sinks transport Yamakuni Maru off Hachijo Jima.

#### 01/14/1945

USS Cobia (SS 245) sinks the Japanese minelayer Yurijima off the east coast of Malaya.

#### 01/15/1916

The submarine E-2 explodes at the New York Navy Yard because of escaping gases during an overhaul. The interior ship is severely damaged and four men are killed.

#### 01/17/1943

Submarine USS Whale (SS 239) sinks the Japanese transport Heiyo Maru.

#### 01/18/1942

Submarine USS Plunger (SS 179) sinks the Japanese freighter Eizan Maru (ex-Panamanian Aurora) off the mouth of Kii Strait, Honshu.

#### 01/19/1943

USS Swordfish (SS 193) sinks army cargo ship Myoho Maru, which was part of the Japanese Solomons reinforcement convoy, while USS Greenling (SS 213) damages Japanese cargo ship north of Rabaul.

#### 01/20/1944

USS Batfish (SS 310) and USS Gar (SS 206) attack Japanese convoys and sink transport Hidaka Maru south of Shiono Misaki and army cargo ship Koyo Maru about 50 miles south-southwest of Palau.

#### 01/21/1943

Submarines USS Pollack (SS 180) and USS Gato (SS 212) attack and cause the sinking of two Japanese ships.

#### 01/21/1954

The world's first nuclear submarine, USS Nautilus (SSN-571), is christened and launched at Groton, Conn.



#### 01/21/1961

USS George Washington (SSBN 598) completes the first operational voyage as a fleet ballistic missile submarine, staying submerged 66 days.

#### 01/23/1943

Submarine USS Guardfish (SS 217) sinks the Japanese destroyer Hakaze off New Ireland.

#### 01/24/1945

Submarine Blackfin (SS 322) sinks the Japanese destroyer Shigure in the Gulf of Siam.

#### 01/24/1956

1956—USS Jallao (SS 368) becomes the first U.S. Navy submarine to transit the Suez Canal traveling from the Mediterranean to Massawa, Eritrea, Ethiopia.

#### 01//25/1943

USS Shad (SS 235) encounters German blockade runners transporting ore in the Bay of Biscay. Shad fires on Nordfels, but the torpedo fails to explode, and Nordfels returns to Bilbao, Spain.

#### 01/25/1945

USS Silversides (SS 236), despite the presence of auxiliary submarine chasers, sinks the Japanese army cargo ship Malay Maru off Kuro Jima.

#### 01/26/1943

USS Wahoo (SS 238) sinks entire convoy of four Japanese supply ships north of New Guinea.

#### 01/26/1944

USS Skipjack (SS 184) sinks the Japanese destroyer Suzukaze and the aircraft ferry Okitsu Maru in the Caroline Islands area. Also on this date, USS Hake (SS 256) sinks the Japanese auxiliary netlayer Shuko Maru off Ambon and USS Crevalle (SS 291) sinks the Japanese gunboat Busho Maru 175 miles southeast of Cape St. Jacques, French Indochina.

#### 01/27/1942

Submarine USS Gudgeon (SS-211) becomes the first US Navy submarine to sink an enemy Japanese submarine in action during World War II.

#### 01/28/1945

Submarine USS Spadefish (SS 411) attacks Japanese convoy west of Chuja Kundo, Korea and sinks escort vessel Kume and transport Sanuki Maru.

#### 01/31/1945

USS Boarfish (SS 327) attacks Japanese HI 88 convoy and sinks freighter Enki Maru 50 miles southeast of Tourance, French Indochina. She also damages a cargo ship that runs aground and 14th Air Force aircraft destroys it the next day.



#### Articles of Interest



#### SSM-N-8 Regulus

https://en.wikipedia.org/wiki/SSM-N-8 Regulus

The SSM-N-8A Regulus or the Regulus I was a United States Navy-developed ship-and-submarine-launched, nuclear-capable turbojet-powered second generation cruise missile, deployed from 1955 to 1964. Its development was an outgrowth of U.S. Navy tests conducted with the German V-1 missile at Naval Air Station Point Mugu in California. Its barrel-shaped fuselage resembled that of numerous fighter aircraft designs of the era, but without a cockpit. Test articles of the Regulus were equipped with landing gear and could take off and land like an airplane. When the missiles were deployed they were launched from a rail launcher, and equipped with a pair of Aerojet JATO bottles on the aft end of the fuselage.

## History Design and development

In October 1943, Chance Vought Aircraft Company signed a study contract for a 300-mile (480 km) range missile to carry a 4,000-pound (1,800 kg) warhead. The project stalled for four years, however, until May 1947, when the United States Army Air Forces awarded Martin Aircraft Company a contract for a turbojet powered subsonic missile, the Matador. The Navy saw Matador as a threat to its role in guided missiles and, within days, started a Navy development program for a missile that could be launched from a submarine and use the same J33 engine as the Matador.[3][self-published source] In August 1947, the specifications for the project, now named "Regulus," were issued: Carry a 3,000-pound (1,400 kg) warhead, to a range of 500 nautical miles (930 km), at Mach 0.85, with a circular error probable (CEP) of 0.5% of the range. At its extreme range the missile had to hit within 2.5 nautical miles (4.6 km) of its target 50% of the time.

Regulus development was preceded by Navy experiments with the JB-2 Loon missile, a close derivative of the German V-1 flying bomb, beginning in the last year of World War II. Submarine testing was performed from 1947 to 1953 at the Navy's facility at Naval Air Station Point Mugu, with USS Cusk and USS Carbonero converted as test platforms, initially carrying the missile unprotected, thus unable to submerge until after launch.

Regulus was designed to be 30 feet (9.1 m) long, 10 feet (3.0 m) in wingspan, 4 feet (1.2 m) in diameter, and would weigh between 10,000 and 12,000 pounds (4,500 and 5,400 kg). The missile resembled an F-84 fighter aircraft, but without a cockpit, and test versions were equipped with landing gear so that they could be recovered and re-used. After launch, Regulus would be guided toward its target by control stations, typically by submarines or surface ships equipped with guidance equip-

#### SSM-N-8 Regulus



SSM	-N-8 '	'Regulu	ıs I"	display	at	<u>Intrepid</u>
Sea	Air &	Space	Mus	seum		

Sea, Air & Space Museum					
Туре	Cruise missile				
Place of origin	United States				
Service history					
In service	1955-64				
Used by	United States Navy				
Production history					
Manufacturer	Chance Vought				
Produced	March 1951				
Specifications					
Mass	13,685 pounds (6,207 kg)				
Length	32 feet 2 inches (9.80 m)				
Diameter	4 feet 8.5 inches (1.435 m)				
Wingspan	21 feet (6.4 m) ex- tended 9 feet 10.5 inches (3.010 m) folded				
Warhead	3,000 pounds (1,400 kg) such as the <u>W5 warhead</u> or the <u>W27 warhead</u>				
Engine	Allison J33-A-14 tur- bojet 4,600 lbf (20 kN) 2 × booster rock- ets 33,000 lbf (150 kN)				
Operational range	500 nautical miles (926 km)				
Maximum speed	Subsonic				



ment. It could also be flown remotely by chase aircraft. (Later, with the "Trounce" system (Tactical Radar Omnidirectional Underwater Navigational Control Equipment), one submarine could guide it). Army-Navy competition complicated both the Matador's and the Regulus' developments. The missiles looked alike and used the same engine. They had nearly identical performances, schedules, and costs. Under pressure to reduce defense spending, the United States Department of Defense ordered the Navy to determine if Matador could be adapted for their use. The Navy concluded that the Navy's Regulus could perform the Navy mission better.

Regulus had some advantages over Matador. It required only two guidance stations while Matador required three. It could also be launched quicker, as Matador's boosters had to be fitted while the missile was on the launcher while Regulus was stowed with its boosters attached. Finally, Chance Vought built a recoverable version of the missile, designated KDU-1 and also used as a target drone, so that even though a Regulus test vehicle was more expensive to build, Regulus was cheaper to use over a series of tests. The Navy program continued, and the first Regulus flew in March 1951.

Due to its size and regulations concerning oversize loads on highways, Chance Vought collaborated with a firm that specialized in trucking oversize loads to develop a special tractor trailer combination which could move a Regulus I missile.

#### Ships and submarines deployed with Regulus I

Regulus submarines					
Class	Name	In Commission	Number of missiles	Post-Regulus use	
Gato	Tunny	1953-1965	2	Converted to amphibious transport submarine	
Balao	Barbero	1955-1964		Expended as target 1964	
Oraubaala	Grayback	1958-1964	4	Converted to amphibious transport submarine	
Grayback	Growler	1958-1964	4	Decommissioned, memorial 1988	
Halibut	Halibut	1960-1964	5	Converted to special mission submarine	

The first launch from a submarine occurred in July 1953 from the deck of USS Tunny, a World War II fleet boat modified to carry Regulus. Tunny and her sister boat USS Barbero were the United States's first nuclear deterrent patrol submarines. They were joined in 1958 by two purpose-built Regulus submarines, USS Grayback and USS Growler, and, later, by the nuclear-powered USS Halibut. Halibut, with its extremely large internal hangar could carry five missiles and was intended to be the prototype of a whole new class of cruise missile firing SSG-N submarines.

The Navy strategy called for four Regulus missiles to be at sea at any given time. Thus, Barbero and Tunny, each of which carried two Regulus missiles, patrolled simultaneously. Growler and Grayback, with four missiles each, or Halibut, with five, could patrol alone. Operating from Pearl Harbor, Hawaii, the five Regulus submarines made 40 nuclear deterrent patrols in the Northern Pacific Ocean between October 1959 and July 1964, including during the Cuban Missile Crisis of 1962. According to the documentary "Regulus: The First Nuclear Missile Submarines" by Nick T. Spark, their primary task in the event of a nuclear exchange would be to eliminate the Soviet naval base at Petropavlovsk-Kamchatsky. These deterrent patrols represented the first ever in the history of the submarine Navy and preceded those made by the Polaris missile firing submarines.

The Regulus firing submarines were relieved by the George Washington-class submarines carrying the Polaris missile system. Barbero also earned the distinction of launching the only delivery of missile mail.



Additional submarines including USS Cusk and USS Carbonero were equipped with control systems that allowed them to take control of a Regulus in flight, thus extending its range in a tactical situation.

Regulus was also deployed by the U.S. Navy in 1955 in the Pacific on board the cruiser USS Los Angeles. In 1956, three more followed: USS Macon, USS Toledo, and USS Helena. These four Baltimore-class cruisers each carried three Regulus missiles on operational patrols in the Western Pacific. Macon's last Regulus patrol was in 1958, Toledo's in 1959, Helena's in 1960, and Los Angeles's in 1961.

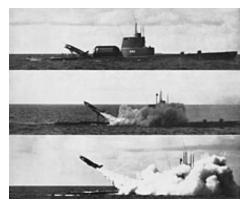
Ten aircraft carriers were configured to operate Regulus missiles (though only six ever launched one). USS Princeton did not deploy with the missile but conducted the first launch of a Regulus from a warship. USS Saratoga also did not deploy but was involved in two demonstration launches. USS Franklin D. Roosevelt and USS Lexington each conducted one test launch. USS Randolph deployed to the Mediterranean carrying three Regulus missiles. USS Hancock deployed once to the Western Pacific with four missiles in 1955. Lexington, Hancock, USS Shangri-La, and USS Ticonderoga were involved in the development of the Regulus Assault Mission (RAM) concept. RAM converted the Regulus cruise missiles into an unmanned aerial vehicle (UAV): Regulus missiles would be launched from cruisers or submarines, and once in flight, guided to their targets by carrier-based pilots with remote control equipment.

#### Replacement and legacy

Despite being the U.S. Navy's first underwater nuclear capability, the Regulus missile system had significant operational drawbacks. In order to launch, the submarine had to surface and assemble the missile in whatever sea conditions it was in. Because it required active radar guidance, which only had a range of 225 nmi (259 mi; 417 km), the ship had to stay stationary on the surface to guide it to the target while effectively broadcasting its location. This guidance method was susceptible to jamming and since the missile was subsonic, the launch platform remained exposed and vulnerable to attack during its flight duration; destroying the ship would effectively disable the missile in flight.

Production of Regulus was phased out in January 1959 with delivery of the 514th missile; in 1962, it was redesignated RGM-6. It was removed from service in August 1964. Some of the obsolete missiles were expended as targets at Eglin Air Force Base, Florida. Regulus not only provided the first nuclear strategic deterrence force for the United States Navy during the first years of the Cold War and especially during the Cuban Missile Crisis, preceding the Polaris missiles, Poseidon missiles, and Trident missiles that followed, but it was also the forerunner of the Tomahawk cruise missile.

Following retirement, a number of Regulas I missiles were converted for target drone usage under the designation BQM-6C.



USS Tunny launching a Regulus I in 1956.



#### SSM-N-9 Regulus II https://en.wikipedia.org/wiki/SSM-N-9 Regulus II

The SSM-N-9 Regulus II cruise missile is a supersonic guided missile armed with a nuclear warhead, intended for launching from surface ships and submarines of the U.S. Navy (USN).

#### **History**

The limitations of the Regulus I were well known by the time it entered service in 1955, so the Navy issued a specification for a surface-launched supersonic shipborne cruise missile, equipped to carry a nuclear warhead, that had greater range, accuracy and resistance to countermeasures.

Development of the Regulus II was well under way when the program was canceled in favor of the UGM-27 Polaris SLBM (Submarine-Launched Ballistic Missile) system, which gave unprecedented accuracy as well as allowing the launch submarine to remain submerged and covert. Prototype and initial production missiles were later converted to KD2U-1 supersonic target drones for the US Navy and the U.S. Air Force, which used the KD2U-1 during tests of the Boeing IM-99/CIM-10 Bomarc SAM (Surface to Air Missile).

The SSM-N-9a Regulus II was redesignated as the RGM-15A in June 1963, nearly five years after the missile program had been terminated. At the same time the KD2U-1 target drone was redesignated as the MQM-15A. Some targets equipped with landing gear were redesignated as GQM-15As.

#### **Design and development**

The major drawback of the original Regulus was the use of radiocommand guidance, which required a constant radio link with the launch ship / submarine that was relatively easy to interfere with. The earlier missile also suffered from restricted range which reguired the launch ship to launch the missile close to the target and remain exposed until the missile hit the target. To alleviate these drawbacks, the Regulus II was designed with an inertial navigation system, which required no further input from the launch ship / boat after launch, and a greater range through improved aerodynamics, larger fuel capacity, and a lower specific fuel consumption from its jet engine.

Prototype missiles were built, designated XRSSM-N-9 Regulus II, with retractable landing gear, to allow multiple launches, and Wright J65-W-6 engines and Aerojet General booster, which restricted them to subsonic flight. The first flight of the XRSSM-N-9 took place in May 1956. Beginning in 1958, testing was carried out with the XRSSM-N-9a, equipped with the General Electric J79-GE-3 turbojet and a Rocketdyne solid-fueled rocket booster to allow the entire flight envelope to be explored. Evaluation and training missiles with retractable undercarriage were produced as the YTSSM-N-9a and TSSM-N-9a respectively.



### SSM-N-9 Regulus II



	SSG-574) preparing to				
launch a <i>Regulus</i>					
Туре	Cruise missile				
Production history					
Manufacturer	Chance Vought				
Produced	1956				
Specifications					
Mass	23,000 pounds (10,000 kg)				
Length	57 feet 6 inches (17.53 m)				
Diameter	50 inches (1.3 m)				
Wingspan	20 feet 1 inch (6.12 m)				
Warhead	W27 Thermonuclear weapon				
Detonation mechanism	Air burst or surface burst (air burst – fire-ball does not reach the ground, usually at least 10,000 feet in altitude, surface burst – fireball touches the ground, less than 10,000 feet in altitude)				
Engine	1x <u>General Electric</u> <u>J79</u> -GE-3 turbojet 1x <u>Rocketdyne</u> solid- fueled rocket 15,600 lbf (69 kN) + 135,000 lbf (600 kN)				
Operational range	1,000 nautical miles (1,852 km)				
Flight ceiling	59,000 feet (18,000 m)				
Speed	M 2.0				
Guidance	Inertial				
Launch platform	SSG and SSGN class submarines, cruisers				

After land-based testing, trials including test missile firings were carried out on board the USS King County (LST-857), which had been modified with the replica of a submarine missile hangar and launching system.

The SSM-N-9 Regulus II missile was intended to be launched from the deck of an SSG (guided missile submarine), and the missile most likely would have been deployed on the two Grayback-class submarines and the USS Halibut (SSGN-587), which were designed for the missile, and possibly eventually on four heavy cruisers that had deployed with Regulus I and 23 other submarines potentially available for conversion. Carrying two Regulus II missiles in a hangar integral with the hull (more on surface ships), submarines and ships equipped with the Regulus II would have been equipped with the SINS (Ship's Inertial Navigation System), allowing the control systems of the missiles to be aligned accurately before launching.

Forty-eight test-flights of Regulus II prototypes were carried out, 30 of which were successful, 14 partially successful and only four failures. A production contract was signed in January 1958 and the only submarine launch was carried out from USS Grayback in September 1958.

Due to the high cost of the missiles (approx. one million dollars each), budgetary pressure, and the emergence of the SLBM, the Regulus missile program was terminated on 19 November 1958. Support for the program was finally withdrawn on 18 December 1958, when Secretary of the Navy Thomas S. Gates cancelled the project. At the time of the cancelation, Vought had completed 20 missiles with 27 more on the production line.

#### **Description**

The airframe followed contemporary aircraft construction techniques, with weight savings from the use of advanced materials and the short airborne life of the missile. The fuselage was essentially tubular, tapering to a point at the nose, housing the guidance equipment, warhead and systems equipment. The engine was fed with air through a distinctive wedge shaped intake under the center fuselage. Its swept wings attached to its fuselage at the middle position, roughly halfway along its length, and a large swept fin attached to the top of the fuselage at the rear which was sometimes augmented by a large ventral fin at the extreme rear of the fuselage.

Primary control of the Regulus II was through the use of elevons fitted to the outer half of the wing trailingedges, as the missile was not fitted with a tailplane, and a rudder fitted to the trailing edge of the fin. Flaps were fitted to the inner half of the trailing edge for use during takeoff. Additional stability and control in pitch was provided by small trapezoidal canard foreplanes near the nose of the fuselage.

To launch the missile, the carrier vessel had to surface and deploy the missile and launch apparatus, which consisted of a zero length launcher. Once deployed, the missile had to be linked to the submarine or ship's navigation system to align the inertial navigation system and input target co-ordinates. With the navigation system ready and launch authorization given, the missile engine would be run-up to full power with after-burner and the large solid-fueled rocket booster ignited, immediately the missile would leave the zero length launcher and continue to the target autonomously.

### **Regulus Target Drones**

Suitable missiles from the development program and production line were converted to supersonic target drones as the KD2U-1, later redesignated as the MQM-15A and GQM-15A. These targets were used for training of BOMARC surface-to-air missile crews firing from Santa Rosa Island, Florida, and controlled by the Montgomery Air Defense Sector, Gunter Air Force Base, Montgomery, Alabama. The KD2U-1 targets were launched from the Eglin Gulf Test Range base near Ft. Walton Beach, Florida. Drone flights at Eglin commenced on 3 September 1959, making 46 flights with 13 missiles. After the BOMARC tests the remaining missiles were moved to Naval Station Roosevelt Roads, Puerto Rico by 30 September 1961, where flights were begun to test Tartar, Terrier, and Talos surface-to-air missiles. Upon completion of the testing in Puerto Rico in 1963, the Regulus II drones were moved to NAS Point Mugu, California, where they remained in use until December 1965.



# Rescue Tank May End Sub Deaths

Navy Builds Remarkable Tower, Filled with Sea Water, to Train Men to Escape from Crippled Craft

By JOHN E. LODGE MAGINE a silver lighthouse, equaling a thirteen-story building in height, eighteen feet in diameter, and filled with sea water, and you have a fair picture of the "rescue tower" that has just been completed at the United States submarine base near New London, Conn.

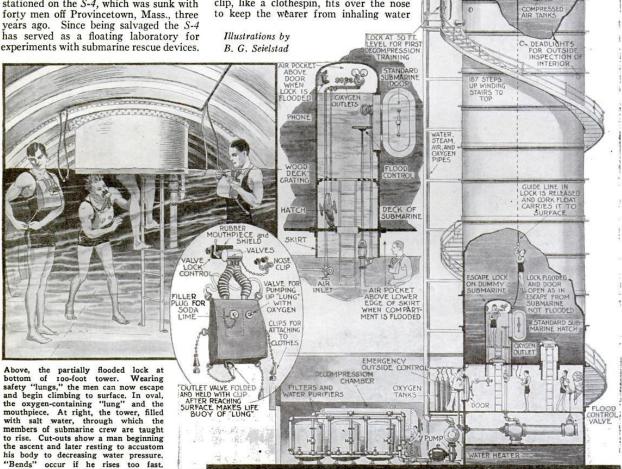
In this structure, the only one of its kind in the world, officers and enlisted men of the Navy will be trained to save themselves from sunken submarines and escape the fate of the 486 men who have died in eleven undersea disasters since

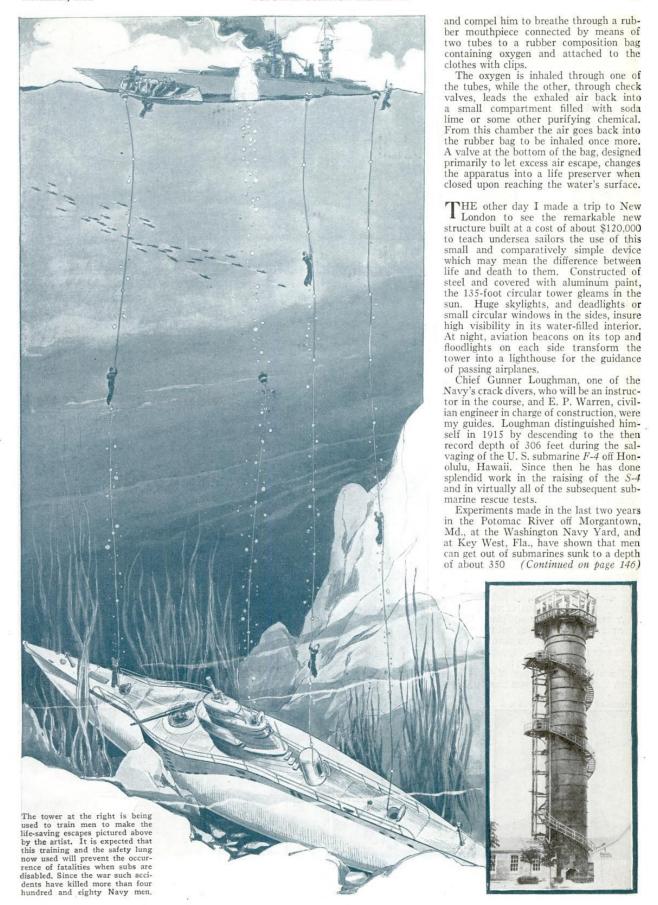
The unique training course starts this month. It will be in charge of Lieutenant C. B. Momsen, U. S N., and other officers stationed on the S-4, which was sunk with forty men off Provincetown, Mass., three years ago. Since being salvaged the S-4 has served as a floating laboratory for

Following the S-4 agedy, Lieutenant tragedy, Momsen, together with other Navy experts, developed the "safety lung" which, after several successful tests, was adopted about a year ago as standard equipment for all submarines. The function of the "rescue tower," in the design of which Lieutenant Momsen also played an important part, is to teach future submarine crews to breathe under water with the aid of the "lung" when escaping from a submarine that has been damaged so that it cannot rise to the surface.

OUTSIDE MERGENC CONTROL

Similar in shape and size to a gas mask, the "Momsen lung," as it usually is called (P. S. M., Dec. '28, p. 139; Sept. '29, p. 144), weighs only two pounds. A small clip, like a clothespin, fits over the nose







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#### RESCUE TANK MAY END "SUB" DEATHS

(Continued from page 41)

feet, where the pressure is the heaviest a human being can stand, and safely reach the surface with the "lung."

To approach actual conditions as closely as possible, the tank will be filled with salt water, the salinity of which will be the same as that of sea water. It will, however, be heated artificially, so as to safeguard the health of the men who must use it for long periods.

Leading down about fifteen feet from the top are iron ladders. In the first stages of the course, the men, equipped with "lungs," will stand on these to learn to breathe under water. Rung by rung, they will step down until they are from eight to ten feet below the surface.

Air locks, through which the men may enter the water in the tank just as sailors entrapped in a sunken sub would get into the open sea through an escape lock, are placed at eighteen and fifty feet from the top. How, with the aid of these locks, the men will be taught to escape from shallow depths was explained to me by Loughman in this way:

BY MEANS of a spiral stairway outside the tower, a small group of men enter the lock, closing the outer door behind them. They let water enter the lock by opening a flood valve. As the water flows in, the air inside the lock is compressed until the air pressure is equal to that of the water at the point where it enters the lock.

Now the door leading to the inside of the tank (representing the sea) is opened, permitting the water to rise to the top of the door opening. Above this level there remains an air space in which the men hold their heads to breathe. When they are ready to go, they pass a buoy, with a line attached, out into the water. As the buoy floats up to the top of the tank, the men fasten the line near the lock's entrance to the tank and use it to slide up to the surface.

Every ten feet the line is marked, so that the men know at what distance they are from the surface and can stop at intervals to "decompress" themselves—in other words, let the effects of the pressure wear off. This protects them against "bends" or caisson disease. The lock at eighteen feet will be used to teach the men how to handle the "lung" and lock. That at fifty feet will be for "decompression" training.

Loughman then showed me what is, perhaps, the most unusual feature of the "rescue tower." This is a dummy submarine at the bottom of the tank. Here a regular sub-marine compartment, eighteen feet long and twelve feet in diameter which, like the locks, is entered from the outside, has been built. It is equipped with a standard hatch and escape lock. As soon as men, entering it, close the door, they find themselves in virtually the same situation as members of a submarine crew trapped in one of its compartments at the bottom of 100 feet of water.

A steel collar or "skirt" around the hatch

opening in the top of the dummy "sub' extends a few feet down into the compartment. When the men are ready to "escape they unlock the hatch, which is kept shut by the water pressure. Then flood valves are opened, and the water rushes into the sub, compressing the air until it lifts the hatch open. The water is allowed to flow in until it is level with the bottom of the "skirt." Above this level, as in the case of the locks, an air pocket is left in which the men hold their heads while releasing the buoy, fastening the line, and donning the "lung." Then they slide up to the surface on the buoy line.

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