

is an an an arrest

モビルション

# LIFE ABOARD A SOVIET DESTROYER AND A SOVIET SUBMARINE

Sally W. Stoecker

September 1983

2

UTTE FILE COPY

This document has been approved for public release and sales its distribution is unlimited. P-6910

85 09 06 03 1

E

حک

SEP 0 9 1985

## LIFE ABOARD A SOVIET DESTROYER AND A SOVIET SUBMARINE

ł

ياري يردي معركة ومنهم على ومراود روماروس والمروسيون المسول المراوي ومراويد ويدويد ويحقين ويدرون بسبو

Sally W. Stoecker

September 1983

Accession For		
RTIS	GRA&I	
DTIC	TAB	1
Upann	ounced	ā
Justi	fication_	
By Distr	ibution/	·····
Availability Codes		
Dist A-{	Avail an Specia	•

CERCIPICAL AND AND A

20155-2019

93731-21792-17

States to the low how to the second

Terre the com

----

DTIC COPT INSPECTEN

## LIFE ABOARD A SOVIET DESTROYER AND A SOVIET SUBMARINE

Sally W. Stoecker

### INTRODUCTION

This paper presents two fictionalized accounts of life at sea--one aboard a Soviet destroyer, the other aboard a Soviet subzarine--based on articles that appeared in the open literature on the Soviet navy between 1973 and 1982. The articles dealt with such universal problems as crew training (physical, psychological, political, and technological), ship design and weaponry, habitability (living quarters, diet), fleet support, damage control, and repair capabilities.

These scenarios represent worst cases as reflected in the literature; they are not intended to portray normal or typical Soviet naval operations. They attempt, rather, to highlight the recurring problems that the Soviets address openly and that merit our examination because they bear on the Soviet navy's ability to operate in pracetime, crisis, or conflict.

Many of the weaknesses addressed in the destroyer section are also characteristic of submarine operations (for example, officer-subordinate relationships, crew training, and inadequate sport facilities). These problems are exacerbated, however, by the confining and claustrophobic quarters of the submarine. The Soviets cite as problems: the psychological burdens of underwater cruising associated with the proximity of the nuclear reactor to the electromechanical unit; the acoustical properties of the vessel; insufficient emotional and physical stimulation for the submarine's personnel; the absolute autonomy of the submarine many miles from base; and the unfavorable oceanic climatic conditions in which the Soviet fleets must cruise. I. ABOARD A PACIFIC FLEET DESTROYER

Alexander Lovkin,<sup>1</sup> Seaman Gunnery/Missile Combat Unit (BCh-2)<sup>2</sup>

ŝ.

The bugle sounded at 0600.<sup>3</sup> We stumbled out of bed and began dressing for morning exercises. Our quarters were cramped and often we bumped into one another while dressing.<sup>4</sup> We were not about to complain, however-our ship at least had enough cots. On some ships there were too few to go around and seamen had to take turns sleeping on the deck.<sup>5</sup>

While we dressed, Lieutenant Shilov read the morning announcements over the intercom: "Today is a beautiful day. Report for morning exercises on the stern deck at 0615." As I bent over in my cotton trousers to tie my tennis shoes, it occurred to me that, if nothing else, the armed forces provided us with good clothing. Friends and relatives often asked me to buy extra items for them at Voyentorg.<sup>6</sup> since the quality was far superior to that found in most stores.

On the way to exercises, I met Zhenya, my only real buddy on board the ship. We had grown up in a small town on the Yenisey and had joined the navy in hopes of learning skills that we could eventually use in Moscow or Leningrad--we wanted to escape the countryside.<sup>7</sup> We had trained together in Petropavlovsk and endured the rigors of extensive simulation training and written exams. We then asked to transfer to Vladivostok to participate in a long-term deployment that would combine training with a friendly visit to the Socialist Republic of Vietnam.<sup>8</sup> It was often claimed that the "ocean is the best trainer of all."<sup>9</sup> We were now cruising in the Indian Ocean and would soon turn northeast toward Vietnam.

As we headed for calisthenics, Lieutenants Temin and Denisov reminded us that we had better get in shape for the "Neptune holiday" to begin tomorrow, when we cross the equator.<sup>10</sup> We contained our laughter until the officers were a safe distance from us. Although those contests seemed infantile, they were widespread and thought to create "incentive."<sup>11</sup>

7 53 5

I don't know what's worse, the officers or the contests. Everyone knows that Temin's uncle, who is a respected weapons specialist at the Grechko<sup>12</sup> and who has a lot of pull, got him into TIKHOVVMU--the Pacific Ocean Higher Naval School. Likewise, Denisov's father was named a Hero of the Soviet Union in the Great Patriotic War and, although the father did not live to see his son enroll in the Nakhimov School, his name was the sole factor that got Denisov in. These officers made no secret of their pull; this irritated the rest of us, who had come from poorer families whose names meant nothing. Moreover, having attended such schools, these officers were assured of a bright future.<sup>13</sup> (So much for the "classless" society.)

We assembled in proper formatic: for exercises under the direction of Petty Officer (*starshina*) Borodin. After stretching,<sup>14</sup> we jogged around the deck while Borodin rewound the tape to which we would continue our exercises.<sup>15</sup> Voroshin forgot to duck as he approached one of the guns, and the impact of the barrel on his head knocked him out cold. Unfortunately, such occurrences were not rare. There is very little space for jogging because the main deck is filled with weapons, sensors, and radars.<sup>15</sup>

I wondered if they would ever build a gymnasium on board.<sup>17</sup> That would not only be safer but would solve the problem of where to conduct exercises in bad weather.<sup>18</sup> Sure, we have medicine balls and barbells, but except for occasional rowing races<sup>19</sup> we lack facilities for team sports. Although the press has been giving attention to our needs for athletic facilities,<sup>20</sup> no one knows if anything will ever be done. At least we get more exercise than BCh-1. Since only two navigators are assigned to a ship for several months at sea,<sup>21</sup> they're excused from a lot of ship functions, including exercise and even party-political work.<sup>22</sup>

We resumed the morning workout with Borodin as the tapes played. The exercises were the same day in, day out. Borodin never pushed us hard, either; he simply wanted to fulfill his obligation and stop. I couldn't blame him for being apathetic. There appears to be a rather large, unhealthy gap between him and the officers.<sup>23</sup> He is given very little responsibility outside of conducting morning exercises, and the

officers very rarely consult him.<sup>24</sup> He is, after all, responsible for us sailors and is supposed to keep the officers informed of our problems.<sup>25</sup>

の語言が見ていたというと言語

We raced back to our quarters after exercises to shower, dress, and prepare for inspection. The quarters were usually in good shape; however, recently the lighting fixtures weren't working properly. Since the ventilation is poor, moisture collects in the fixtures, causing short circuits.<sup>26</sup> Although the engineer-mechanic is supposed to take care of it immediately,<sup>27</sup> he usually waits until all of the lights go out so that he can repair them all at once.

Following inspection, we enthusiastically ran down to the mess hall for breakfast. Zhenya and I waited patiently in line while staring blankly at the words on the one poster adorning the room:

> It is an iron-clad rule that the soldier must be provided with hot food and boiling water.

> > --Brezhnev Malaya zemlya<sup>28</sup>

For breakfast we had the usual--warm milk, tea, kasha, cheese, sandwiches, and stale bread. As I poured myself some hot water, I noticed that it had a brownish tinge. The water tanks must be corroded again.<sup>29</sup>

While we were eating, another series of announcements came over the loudspeaker. Today we were to have tactical training, and we were reminded that it would be our last opportunity to brush up our skills before facing two other ships in our final round of socialist competition. Our ship was in last place, and try as he might, the commanding officer simply could not instill in us any real competitive spirit.<sup>30</sup>

At 0800 we reported to our respective units to prepare for the firing exercise. We reviewed the safety precautions while our department head drew up the narrative for our drill.<sup>31</sup> He then tested us orally on our knowledge of the procedures and reviewed how to fire the weapons. When it was decided that we were ready, we manned our guns and awaited the go-ahead. It was unfortunate that individual

instruction in weapon-handling was assigned such a low priority.<sup>32</sup> Furthermore, little attention was given to seeking and striking targets independently and to night training.<sup>33</sup> We who hardly knew how to operate the guns could sometimes fake it. It would go unnoticed since everyone would be firing simultaneously.

After we had completed the first part of the exercise, we sat quietly while the officers compared evaluations. With great trepidation we waited for the results to be announced. Much to our amazement, we received an "excellent."<sup>34</sup>

The next part of our training tested our ability to repair leaks and localize fires while some of us continued to fire our weapons. The importance of damage control training was clear to all of us--many of our countrymen had died as a result of fires and flooding on their ships during the war.<sup>35</sup>

No sooner had we begun to equip the missile compartment with trays and plates in which to place the ignitors and primers for damage control simulation<sup>36</sup> than we felt the ship rolling as if a storm had suddenly come up. I peered out of the starboard porthole to find that the skies had grown dark and the seas, choppy. As I looked to the right, I spotted a thin, pencil-like figure reaching from the water's surface to the sky. Could it be a tornado? I reported my finding to BCh-1; the navigator told me not to be alarmed as the waterspout was a common occurrence and of no.denger to our vessel. Deciding that the choppy seas warranted canceling the damage control exercises, the commanding officer ordered us to report to our quarters until dinner.<sup>37</sup> I tried to get some rest because rough seas have a particularly devastating effect on me. We had been advised that sleep was the best deterrent to seasickness.<sup>38</sup> The other sailors tease me about my inability to endure the most minor discomfort.

Our dinner menu, adjusted to lessen the stress put on our stomachs by the ship's movement, included chicken bouillon, cabbage, bread, and vegetable juice.<sup>39</sup> Those most susceptible to seasickness were given water with cranberry extract.<sup>40</sup> Despite the meal's simplicity, we ate heartily and no one complained.

Leisure time followed dinner--the time most of us choose to play cards or write letters. We had a few games on board, but we had grown tired of them.<sup>41</sup> Today I decided to forego the games in favor of the ship's library.<sup>42</sup> Zhenya and a few others snickered when I told them where I was headed. No one believed there could possibly be any interesting books in the ugolok.<sup>43</sup> True, I found little other than volumes of Lenin's and Brezhnev's works, Gorky's Song of the Falcon and Mat', Fadeyev's The Rout, and other "official" socialist realist literature. I had nearly given up hope when I spotted Trifonov's House (Dom) on the Embankment. What a find! The guys will never believe this, I thought. The Taganka Theater had staged Dom and to be able to discuss the work was now in fashion.

فمتنا ويكرونا ويترونا والمستار يتنا

The alarm sounded at 1500, and leisure time ended. This afternoon was "repair and prevention" time, and each unit had to examine its own facilities for leaks, hazardous wiring, peeling paint, or any other irregularity and, time allowing, to make the needed repairs.<sup>44</sup> Our compartments often got cluttered during repair operations.<sup>45</sup> Each of us took whatever he needed to use--paint, screwdriver, hammer, rags, glue. Today, our unit had only begun to mend some crevices in the deck when we got the signal to prepare for party-political work. Perhaps ours was the only unit requiring repair. Oh, well. We stored as many of the supplies as possible in those few minutes, but the area remained largely a mess.

Party-political work with Lieutenant Skukashin began exactly at 1610. Such work was monotonous and I never did understand why it was given a high priority. Because few of us had had experience at the "front," the authorities had grown concerned about indoctrinating us sufficiently. Ours was considered a dangerous generation that had become accustomed to the easy life and preoccupied with material possessions. Veterans were being encouraged to visit ships and share their experiences with us.<sup>46</sup>

One of our projects was entitled "Vast Is My Country,"<sup>47</sup> in which each of us was to have made a presentation on our own republic. This particular project was short-lived, however, because there were too few nationalities represented and the few that were, especially the

Georgians, weren't careful and failed to portray their country's characteristics within a "Soviet" framework. Instead, we were assigned the most excruciating topic of all--"With the Party of Lenin."<sup>48</sup>

Much to our delight, however, today we were asked to abandon Lenin's collected works and study the country and customs of the Socialist Republic of Vietnam<sup>49</sup>--the destination of our cruise. It was imperative that we make a good impression on our hosts, be able to carry on conversations, and answer their questions when they tour our ship. Skukashin showed us the pamphlets on Soviet foreign policy to be distributed to the visitors and the copies of Brezhnev's collected works translated into Vietnamese.<sup>50</sup>

After supper, we gathered in the mess hall for a zhurnal [prefilm feature--usually propaganda] and Shukshin film, How We Fought for the Motherland. Often we were shown films when the seas were rough to distract us from the rolling and pitching of the ship.<sup>51</sup> As soon as we had assembled, an announcement came over the intercom that our ship had changed course. We were heading for the support vessel Polyarnik for refueling.

The admiral at headquarters in Vladivostok called a state of alert and assured us that we would be notified of any further changes in plan. Could it be war? We stared at one another in disbelief. Tension and anxiety pervaded the atmosphere. All of us had been anticipating the respite from ship life to be enjoyed briefly in Danang. Our hopes were shattered by the sound of the admiral's voice and we knew that now, if never again, we must maintain our spirits and strength.

Shevchenko, the navigator, appeared  $m \ge 1$  alarmed of all--and justifiably. Morozov, his counterpart, had come down with a virus and was quarantined so as not to contaminate the rest of us! This meant that Shevchenko was the sole navigator, having already been on duty for eight days straight. No one else could replace him because he alone knew how to operate the complex, not computerized navigational equipment.<sup>52</sup> No measures had been taken to replace him since our ship was due in Danang in a few days.

The commanding officer remained confident and indifferent to our fears. It is the CO's responsibility to maintain crew morale, but in

this case his manner did little to alleviate our doubts.<sup>53</sup> We were ordered to bed early so that we'd be prepared to conduct underway replenishment at 0300 hours. Few of us slept. Several seamen spent the evening writing letters to loved ones; others stared blankly into space. The quarters of which laughter and chatter were characteristic now remained silent, awesome, foreboding.

At 0230 hours the alarm sounded. We dressed quickly and reported to our stations. The few officers with experience in refueling under way took charge.<sup>54</sup> Shevchenko spotted a ship 40 nautical miles due east. Assuming that it was the *Polyarnik*, we proceeded in its direction. The closer we got to the vessel, however, the clearer it became that it was not one of ours.

Shevchenko had failed to chart the ship's course<sup>55</sup> and, having fallen asleep briefly, lost our heading. It turned out that the other ship was an enemy reconnaissance vessel. Perhaps we really were involved in a war. While Shevchenko rectified his mistakes, the commanding officer informed him that further errors in navigation could jeopardize the ship's viability. We were now relatively low on fuel and if we weren't careful we would not reach the tanker in time.

Finally, the *Polyarnik* was spotted and the positioning of the ship was initiated by Shevchenko. The thought of exposing ourselves to potential enemy attack during refueling was very unnerving. The continuing choppiness of the seas frustrated the attempts of the commanders of both vessels to maintain appropriate distance and position. The hoses were prepared, as were the communication lines between ships. Then the tanker's men threw us a line. However, the distance between our ships was greater than usual as a result of the storm. The strong winds carried the line just short of our deck, and we watched it plunge into the water.

Finally, on the fourth try, the line was secured and the fuel hose was passed to us. I wondered if the tanker's crew had ever refueled a ship under way--they appeared disorganized and unconfident.<sup>56</sup> The whole operation took much longer than it should have and when it was completed we sighed with relief. If we had been under attack we would never have survived.

It was not very prestigious to belong to the support fleet, and effort was recently being made to improve its quality in light of the important role it plays in providing surface vessels with the fuel, water, and various cargo. However, support ships remain at sea for long periods, and the crews take little pride in their work. They are reluctant to learn how to operate complex equipment and there is a shortage of up-to-date literature on support operations.<sup>57</sup> Hence, support commands were hesitant to introduce the much-needed technical equipment that would allow quicker and safer replenishment.<sup>58</sup>

We returned to our posts and awaited further instruction. It was reported that BCh-4 was having difficulty keeping lines open with headquarters as a result of ionospheric interference that often created temporary breaks in communications.<sup>59</sup> Unfortunately, satellite systems had not yet been designed for our ship and we were still dependent on shortwave radios.<sup>60</sup>

The last command we were given before communication lines were broken called for manning the weapons and preparing for combat. Rykhadze pulled a cigarette out of his shirt pocket and nervously lit it with a match he had ignited on a stray piece of sandpaper. Foolishly he threw the match over one shoulder and it landed on top of the paint we forgot to store. The can blew up in flames and the fire spread throughout the compartment. Rykhadze and Narkov battled the flames while the rest of us attempted to maintain a state of combat readiness. The smoke burned out eyes severely and our hands trembled as we tried to grip the guns. Borodin rushed in with some gas masks and fire fighting equipment to help us. We sat patiently by while the flames, at list, were localized and the smoke diminished. Several hours passed before communications were resumed. The alert had been called off. What our next destination would be, no one knew or cared. Sleep was the only thing we wanted.

### NOTES TO SECTION I

1. All personal names are fictitious.

2. Milan Vego lists the following combat units: BCh-1 (Boyevaya Chast'-1)--navigation; BCh-2--gunnery/missile post; BCh-3--underwater weapons post; BCh-4--communications; BCh-5--engine room; BCh-6--avia-tion. See "Warsaw Pact Naval Training," Navy International, October 1981, p. 596.

3. The timetable is based on A. Yurkov, "The Grder of the Day," Military Herald, January 1976, p. 51, in William F. Scott and Harriet Fast Scott, The Armed Forces of the USSR, Westview Press, Colorado, 1979, p. 319.

4. See "V more, kak doma" (At Home in the Sea), Krasnaya zvezda, February 17, 1982, p. 2. That ships be made as habitable as possible is the call of this article, which points out many of the inadequacies associated with the living quarters of some surface vessels.

5. Ibid.

6. Voyentorg (Military Trade) outfits military personnel with everything from uniforms to shoe wax and shaving kits. Only military personnel are allowed to buy at the Voyentorg, the quality of whose merchandise appears to be higher than that found in most Sovict stores.

7. See Ellen Jones, "Manning the Soviet Military," International Security, Vol. 7, No. 1, Summer 1982, p. 122.

8. See R. Aleyev, "Beneath the Flag of Friendship: Pacific Fleet Seamen Visit the SRV," *Inamenosets*, No. 3, March 1982, p. 18, translated by Joint Publications Research Service in USSR Report, Military Affairs, JPRS 81046, June 15, 1982, pp. 64-66. Soviet vessels often pay "friendly visits" to third world countries. To make a favorable impression, they usually send their newest, most technologically advanced ships or submarines. Welcoming the natives aboard, the Soviets offer them copies of Lenin's and Brezhnev's works translated into the country's language and distribute souvenirs. For a detailed description of the preparations for such visits, see: A. Maligon and B. Smyslov, "Korabl' idët v inostrannyi port" (A Ship Sails to a Foreign Port), Morskoy sbornik, No. 7, 1981, pp. 76-80.

9. Many sources, including V. Novikov, "Garantiya bezavariynogo plavaniya" (Guaranteeing a Safe Cruise), Morskoy sbornik, No. 11, 1973, p. 10. There appears to be some debate among those who train crews as to whether or not training should be conducted at sea. On one hand, some sources argue that training at sea is more realistic. See, for example, the editorial in Krasnaya zvezda, "V okeane deystvovat" po-boyevory" (Operate As in Combat at Sea), April 24, 1982, p. 1. On the other hand, other sources claim that it expends a lot of fuel and puts added wear and tear on the ship. In light of the present concern for conservation, the trend may be toward a greater use of shore-based simulation facilities. See V. Azhakin, "Pered vykhodom v okean" (Before Going to Sea), Krasnaya zvezda, January 26, 1982, p. 2. できたいため、12日、12日のためになった。

10. The Neptune holiday includes contests in weapon handling, target shooting, damage control, first aid, weightlifting; it usually takes place when the ship crosses the equator. See "Ekzamenuyet okean" (The Ocean Is an Examiner), Krasnaya zvezda, June 11, 1982, p. 2.

11. Socialist competition is viewed as the ultimate means of instilling incentive in the individual and is endemic to not only the navy but to many institutions in the USSR. See a November 1981 Central Committee Plenum decree, an excerpt of which is found in *Morskoy sbornik*, No. 12, 1981, p. 13.

12. The Naval Academy for Marshal of the Soviet Union A. A. Grechko is a very prestigious institution located in Leningrad.

13. Because the future of graduates of these schools is assured, entry is quite competitive; see Scott and Scott (1980), pp. 335-336.

14. See A. Pylev, "Physical Training Aboard a Ship," Soviet Military Review, No. 12, 1980, p. 61.

15. See "Ekzamenuyet okean," Krasnaya zvezda, June 11, 1982, 5. 2.

16. See Pylev, p. 60.

17. See ibid.

18. Soviet Military Review suggests that the crew's quarters could be used as a gymnasium. It is doubtful, however, that the quarters are spacious enough to allow adequate physical workouts.

19. See A. Pylev, "Morning Exercises on a Ship," Soviet Military Review, No. 9, 1980, p. 63.

20. An editorial, "Sportivnoye leto" (Athletic Summer), Krasnaya zvezda, June 19, 1982, p. 1, called for improved sport facilities in the Pacific fleet.

21. "There are never more than two navigators aboard the ship. A single navigator may be on watch for 1 to 2 months or more. There is nothing like it in any of the other posts. It must be proved that staving on watch at length tires one, dulls vigilance, and Jetracts from political indoctrination." V. Mamantov and M. Sergeyev, "Kurs--v okean" (Course--to Sea), Morskoy sbornik, No. 1, 1982, p. 51.

22. See ibid.

23. The gap between the officers and noncommissioned personnel is discussed in "Povyshat' avtoritet serzhantov i starshin" (Increase the Authority of Sergeants and Petty Officers), *Krasnaya zvezda*, Sebruary 16, 1982, p. 1. For example, ". . . another weak spot: individualized work with sergeants and petty officers. In some commands even political workers fail to find time to converse with sergeants/petty officers, to allow them to air their views, express grievances and concerns and ask for assistance on some matter."

24. See ibid.

25. See ibid.

26. See "V more, kak doma," Krasnaya zvezda, February 17, 1982, p. 2.

27. See ibid.

There's and a strategiest of the factor of the factor of the strategiest of the strategie

หมะแสดงระทะสารสารให้สารให้สารให้สารให้สำคัญให้สารให้สารให้สารให้สารทางรากระ

28. Quoted in "V more, kak doma," Krasnaya zvezda, February 17, 1982.

29. See ibid.

30. That not enough use is made of socialist competition is a common complaint. See, for example, V. Gonchar, "Zapas prochnosti" (Endurance Reserves), *Krasnaya zvezda*, Jlne 9, 1982, p. 2.

31. A detailed description of the combat exercise is found in Vego (1981), p. 598.

32. An editorial, "Taktiko-ognevaya podgotovka" (Tactical-firing Preparation), Krasnaya zvezda, July 15, 1982, p. 1, criticizes the training of personnel to arm weapons independently and strike targets effectively in the daytime as well as at night.

33. See ibid.

34. See A. Sorkin, "Ukrepliat' distsiplinu, voinskiy poryadok" (Strengthen Discipline and Military Order), *Krasnaya zvezda*, June 16, 1982, p. 2.

35. See S. Litvinov, "Damage Control on a Ship," Soviet Military Review, No. 2, 1980, p. 36.

36. See ibid.

37. A critic of canceling training in bad weather wrote: "COs who reschedule firing practice for a nice day when confronted with stormy weather are in error because the crew grows accustomed to firing in only optimal conditions." V. Vorontsov, "Nash opyt vypolneniya boyevykh uprazhnenii v shtormovykh usloviyakh" (Our Experience in Conducting Combat Exercises in Bad Weather), *Morskoy sbornik*, No. 7, 1977, p. 47.

38. See M. Yefremenko, "Profilaktika i lecheniye morskoy bolezni" (Prevention and Treatment of Seasickness), *Morskoy sbornik*, No. 6, 1979, p. 41.

39. See ibid., p. 42.

40. See ibid.

41. See "Ekzamenuyet okean," Krasnaya zvezda, February 18, 1982, p. 2.

42. See A. Yugov, "On a Cruise," Soviet Military Review, No. 12, 1980, pp. 28-29.

43. The krasnyy ugolok (little red corner) is the omnipresent agitprop reading room.

44. See V. Novikov, *Korskoy sbornik*, No. 11, 1973, cited by V. Sapegin and B. Popov in "Opyt remonta tekhniki v dlitel'nom plavanii"

(Our Experience in Conducting Repairs on Distant Cruises), Morskoy sbornik, No. 12, 1980, p. 53. The article stresses the importance of the personnel's repair routines and ability to conduct repairs efficiently without disturbing the ship's course. Daily inspection of the ship's wiring, hatches, bulkheads, and portholes for leaks is discussed in "Podgotovka k pravaniyu v osenno-zimniy period" (Preparing for Fall and Winter Cruising), Morskoy sbornik, No. 9, 1981, p. 4.

45. See A. Dzhavakhishvili, "Komandirskiy kontrol' sudoremonta" (Commander's Control of Ship Repair), *Morskoy sbornik*, No. 7, 1979, pp. 73-75.

46. According to one writer, "at the present time in ship units, few officers and ensigns [michmany] have experienced the 'front.'" On account of this, effort is being made to attract retired navy men and reservists to speak to the recruits during political indoctrination sessions about their wartime experiences. N. Usenko, "Okeanskaya sikola muzhestva i masterstva" (An Oceanic School for Courage and Mastery), Kommunist vooruzhennykh sil, No. 14, July 1982, p. 33.

47. See M. Mayenkov, "Ship's Propagandist," Soviet Military Review, No. 9, 1979, p. 37.

48. See ibid.

49. See A. Maligon and B. Smyslov, *Korskoy sbornik*, No. 7, 1981, pp. 76-80.

50. See R. Aleyev, Znamenosets, No. 3, March 1982, p. 18, translated in USSR Report, Military Affairs, JPRS 81046, June 15, 1982, pp. 64-66.

51. See V. Kulikov, "Moral'nyi klimat ekipazha" (Crew Morale), Morskoy sbornik, No. 7, 1979, p. 35.

52. A rather technical article on computerized navigational equipment is provided by V. Gorbich, L. Ziman, V. Dupin, "Elektronnovychislitel'nye ustroystva dlya resheniya zadach korablevozhdeniya" (Computers for Solving Ship-Handling Problems), *Korskoy sbornik*, No. 1, 1979, pp. 35-39.

53. See "Kommandirskaya zrelost" (The Commander's Maturity), Krasnaya zvezda, January 14, 1982, p. 1.

54. See P. Yarovoy, "Vmeste s boyevym flotom" (Together with the Combat Fleet), *Morskoy sbornik*, No. 11, 1981, p. 43.

55. Mamantov points out in *Korskoy shornik*, No. 1, 1982, p. 49, that navigators have grown too dependent on the equipment to perform all of the tasks. Some fail to chart the ship's course; others do not know how to use a compass and sextant.

56. Yarovoy strongly criticized repair operations in *Morskoy* sbornik, No. 11, 1981, p. 42, addressing quite frankly the inadequacies of support fleet operations, the problems of prestige, hesitance to learn how to operate advanced technological equipment, and the shortage of pertinent literature. 57. See ibid., p. 45.

58. See ibid., p. 44.

59. See B. Konovalov, "Morskaya sputnikovaya svyaz'" (Maritime Satellite Communications), *Izvestiya*, February 5, 1982, p. 3.

50. See ibid.

n near 21 - Roomana Barangarah - Roomana Roomana Roomana

### II. A DAY IN THE LIFE OF A SUBMARINE COMMANDER

Victor Silen, Captain November-Class Nuclear-Powered Attack Submarine Northern Fleet, Severodvinsk

I can clearly remember the first time I commanded a submarine in Arctic waters. It was a threefold mission. Not only was I to conduct training with the inductees, but the deployment to the Arctic Sea was virtually a test run for evaluating the sub's maneuverability, diving depth, and acoustical properties. Headquarters had warned me not to call for help except in a life-threatening situation--that is, one that I absolutely could not handle autonomously. The third part of the mission was to test the sub's sustainability at sea. In view of the nuclear-powered sub's capacity to remain at sea for lengthy periods, the endurance of the crew rather than the vessel was under scrutiny.<sup>1</sup>

The thought that 100 men were placing their lives in my hands for several weeks was very disturbing. A sense of responsibility overwhelmed me as we welcomed the newcomers aboard the vessel. My own introduction to naval operations had been provided by  $DOSAAF^2$  at a very early age. Since I loved to swim and fish (I grew up by the sea), I was attracted to the activities it offered. Only through DOSAAF could one learn how to scuba dive!<sup>3</sup> Hence, I spent most of my free time attending DOSAAF classes and became particularly fond of underwater activities.

The fact that my father perished in the Great Patriotic War allowed me to enter the prestigious Frunze Higher Naval School in Leningrad. I graduated with honors and, at the urging of my superiors, agreed to specialize in submarine operations. Although I would have preferred to join an environmental protection organization or maritime research vessel upon completing my education and obligatory shipboard service, I remained with the navy. I knew that it was not wise to make waves and that if one followed orders one's career would suffer fewer complications. Since promotions were highly subjective anyway,<sup>4</sup> I might as well be as accommodating as possible. I attended all of the mandatory training sessions at the navy's Leningrad-based training complexes (uchebno-trenirovochnyy kompleks, or UTK). One UTK was identical to a submarine.<sup>5</sup> Everything inside was exactly as in the vessel itself<sup>6</sup>--same technology, emergency equipment, layout, etc. The director of the training exercise could push a switch causing sparks to jump off of a short-circuited cable; another switch would allow smoke to engulf the room and still other levers created flames.<sup>7</sup> The emergency situations created were indeed realistic and could be halted at any point for review and repetition. Such training, however, was exclusively for officers and I wondered if damage control had been covered sufficiently in the classrooms at base for the new submariners.

My attention returned to the welcoming ceremony for the crew on the day they reported to the sub that I was to command.<sup>8</sup> The naval band continued playing its repertoire of "oompah"-type melodies while the sum beat down upon the water. The maritime surroundings were reflected in shiny brass instruments; newly waxed shoes and buttons glittered. As the sun began to sink into the water, we prepared for departure. The boys waved goodbye to friends and relatives and enthusiastically jumped down the hatch and filed into their compartments. We were off.

Our first task was mine-laying—the so-called silent battle.<sup>9</sup> Its procedure was fairly simple. Most important was that the timing be correct and that the submarine remain as quiet as possible.<sup>10</sup> Lieutenant Pelengov, chief navigator, studied the configuration of the designated area and sent me a list of several options for the approach.<sup>11</sup> We calculated the distance to be maintained between mines and the acoustical engineer signaled an OK.<sup>12</sup> The senior lieutenant used his stopwatch to ensure that the mines would be dropped from the torpedo apparatus at proper intervals.<sup>13</sup>

The exercise appeared to be going smoothly when suddenly we felt a sharp jolt. The lights went out momentarily, startling and confusing the entire crew. I rushed to BCh-5 (the engine room) and instructed the officer to dive deeper. It turned out that we had entered arctic waters sooner than expected and the icebergs had created a veritable obstacle course for us.<sup>14</sup>

I ordered the engineer to reduce speed and the submarivers to collectively inspect the vessel to ascertain whether the collision had caused any leaks. Indeed, a leak had sprung in BCh-1 (navigation). Navigator Leniven had made no effort to repair it, however. It was common knowledge that the navigators lacked competence in performing repairs.<sup>15</sup> Something should be done about them. I didn't exactly relish the idea of having to perform rudimentary repairs on top of my duties as chief problem-solver and decisionmaker. I made a note to myself to the effect that, if nothing else, this crew would learn how to repair leaks and fight fires. Once things had quieted down a bit, I ordered the first shift to report to the mess hall for dinner.

To contribute our part to the May plenum's food program,<sup>16</sup> at the request of the sub's propagandist I delivered a brief speech on the necessity to conserve food. From now on bread would be sliced and distributed to each shift separately so that the last shift's bread wouldn't get stale as it always did.<sup>17</sup> As a result of the powerful ventilation system, the bread dried out at an accelerated pace.<sup>18</sup> This task was very difficult for me, knowing, as I did, that much of the food put before the men was fit for neither man nor beast. Support services, unfortunately, often violated sanitation codes and supplied the submarine with poorly packaged items or food which hadn't been refrigerated and whose life-span was reduced sharply aboard the ship.<sup>19</sup>

I remembered one incident that occurred on my first sub training cruise. On the occasion of the Neptune holiday, we had been promised chicken cutlets. But the cook declared them spoiled on the day we were scheduled to have them because they hadn't been stored or packaged correctly. As a result the crew's morale plummeted.<sup>20</sup> I had visions of something akin to mutiny occurring aboard my submarine. *Potemkin* revisited? Upon delivering my speech, I jotted down a reminder to myself to inspect the kitchen and on-board produce. Yet another responsibility for the sub commander.<sup>21</sup>

After dinner I encouraged the first shift to make the most of their leisure time--with games, cards, singing, and musical instruments. It was true, the games on board were dull and unstimulating.<sup>22</sup> The capi-talists, I had heard, had developed electronic games capable of

reproducing a two-sided naval battle. Such games were exciting, colorful, and indeed worthwhile investments for naval deployments--particularly long-term ones.<sup>23</sup>

As I lay down to rest that evening, a million thoughts crossed my mind. Every few minutes I would awake but was unable to determine the source of my anxiety and restlessness. Suddenly it dawned on me that the submarine was producing strange noises--in fact, it was "singing." I jumped out of bed and ran to my microphone to call a meeting of the hydro-acoustical staff at 0400 in the control room. We scrutinized the vessel for several hours and eventually had compiled a list of the noise sources. They included the screw propellers, the hull's identations and protrusions, and the main and auxiliary machinery.<sup>24</sup>

One of the screw propeller blades had been damaged, undoubtedly by the iceberg we had unexpectedly hit—hence the singing.<sup>25</sup> This was the major source of noise and severely jeopardized our secretiveness at sea. The indentations and projections in the boat's hull caused the water to make considerable noise as it rushed by in an irregular path.<sup>26</sup> Consideration should be given to streamlining the hull so as to reduce or eliminate such noises.<sup>27</sup> Unfortunately there was little our crew could do to rectify this problem.

The pumps and generators were also noisy, and despite attempts to insulate the power installation, more work was needed in this area.<sup>28</sup> If ours had been an American submarine, we would surely have been denied departure until the noise had been reduced to the minimal level.<sup>29</sup> Unfortunately our standards are not quite as high as theirs and our vulnerability to detection is increased as a result of the sub's noise level. I hoped that we would not enter any hostile waters while on this training cruise. If it had been possible, I would have ordered the boat to report back to the base for repairs before resuming the cruise. But the admiral's words echoed in my ears: "Do not under any circumstances call or return for assistance unless a life-threatening situation arises."

After we had completed our examination of noise sources, I returned to my command duties. Since I had forgotten to signal rotation, the first shift had enjoyed two extra hours of sleep. I ordered the second shift to assume watch and the third shift to bed, while the first cleaned the quarters and deck and performed isometric exercises.<sup>30</sup>

My chief complaint with regard to sub construction and layout had been the shortage of sufficient sports equipment and space in which to exercise properly. Especially now, with the deployment of the nuclearpowered submarine, providing the submariner with facilities for physical activity was of paramount importance.<sup>31</sup> The isometric exercises were fine for improving muscle tone and strength, but only cardiovascular exercise gave the entire body a workout, aided circulation and stamina, and consequently whetted the men's appetite and helped them sleep.

Fortunately, most of the submarine recruits chosen were in top physical condition. But I knew, partly from my previous submarine experience, that soon the effects of the confining quarters would manifest themselves in the submariners. The men would lose their appetites, <sup>32</sup> petty conflicts would ensue, and boredom and apathy <sup>33</sup> would prevail. It was my responsibility to sense the "pulse" of the crew and to remain sensitive to their changes and difficulties while preserving crew spirit and providing top-notch leadership under all circumstances. <sup>34</sup>

Commanding a sub was no easy task. Moreover, I did not get along very well with the sub's propagandist. His manner was brusque and abrasive, and he tried to tell me how to run my boat.<sup>35</sup> I tolerated him to the best of my ability and prayed that I would not lose my temper in the presence of the crew. Of course, I doubt that they were fond of him either. No one, to my knowledge, rejoiced when partypolitical work time was announced.

I wearily paced back to my sleeping quarters in hopes of making up the shut-eye I lost while at the acoustical examination. On my way, I thought to check on the navigator and review the course he had charted. Pelengov had found the star and determined the exact location of the submarine.<sup>36</sup> With the advent of navigational computers aboard vessels,<sup>37</sup> it was felt that navigators had grown too dependent upon them, were lazy, and had forgotten how to use fundamental devices such as the compass and sextant.<sup>38</sup>

Everything appeared to be in order--we were nearing the arctic circle as planned and in a few days would begin damage control drills. Such drills required that the men outfit themselves in protective gear as quickly as possible and attend to simulated submarine hazards, particularly fires and flooding.<sup>39</sup> Torpedo-firing exercises were also on the agenda, as were individual meetings with each unit's specialists to discuss and evaluate the submarine's performance in all areas.

"This time I'll have no problem falling asleep," I thought as I lay down. I had taken off my shoes, hoisted myself onto the top bunk, and finally relaxed when I got a call from Shumen.

Shumen had detected the propeller noise of another vessel. Why here, in the distant arctic waters, would anyone be interested in pursuing us? Perplexed, I raced down to the control room to verify Shumen's discovery. He handed me his earphones and adjusted the sonar equipment. Sure enough, I, too, detected a faint swirling sound, characteristic of enemy destroyer's screw propellers.<sup>40</sup>

I hesitated to call headquarters because I was uncertain that the situation was "life-threatening." I ordered Shumen to monitor the sound and make note of any changes while I toyed with the navigational computer in an attempt to locate the vessel. Failing that, I manned the periscope and spotted something several miles due west. Shumen's coordinates as calculated by his sonar detectors were in perfect agreement with mine.<sup>41</sup> Indeed, a vessel—oresumably an enemy vessel—was nearby, but why? No doubt they had detected us easily. Our singing crew propeller was virtually announcing our presence to the seas.

I ordered all men to report to their posts, keep silent, and await further instruction. In the meantime, I hoped to classify the alien vessel and assess its threat to us without contacting headquarters. All means of detection were employed: sonar, radar, and periscope. We were reasonably certain that it was a surface vessel; it appeared to have stopped moving. I was completely baffled. Despite my instructions not to call headquarters, I decided on behalf of the crew that action must be taken to explain this mind-boggling occurrence.

While BCh-4 (communications unit) began contacting headquarters, I made my rounds to various posts to inspect the crew's state of

preparedness. As I was examining the bearings to determine the exact location of the vessel in question, I recalled the words of the veteran who had conducted training aboard my first submarine several years ago. "Without exact bearings, a torpedo attack is worthless."<sup>43</sup> Strangely, the target was not moving--perhaps it was waiting to see what our next step would be.

The "enemy vessel," according to headquarters, was no threat--just another American reconnaissance ship hoping to gather some information on our newly deployed sub's performance and observe the underwater training sessions. I should have known--American spy ships were always following us around.

I ordered the men "at ease" and announced that the remainder of the day would proceed according to schedule. Again, I returned to my quarters in hopes of getting the rest which was continually being denied me. Although I was tempted to disconnect my phone and warning signals in order to be guaranteed some peace and quiet, I refrained. Instead I took some cotton from a medical kit and stuffed it in my ears to block out that high-pitched sub singing and lay down to sleep. What a day.

#### NOTES TO SECTION II

1. According to Admiral Gorshkov, Commander in Chief of the Soviet Navy, "With the aid of engineering-technical and structural innovations, many of the difficulties associated with long-term deployments have been solved. Vessels are now capable of remaining in far-off ocean theaters and satisfying their "material-technical needs independent of stationary bases." See S. Gorshkov, Morskaya moshch' Gosudarstva (Sea Power of the State), 2d ed., Voyenizdat, Moscow, 1979, p. 260.

2. Dobrovol'noye obshchestvo sodeystviya armii, aviatsii i flotu (Volunteer Society for Cooperation of the Army, Aviation, and Fleet).

3. For a description of DOSAAF, see William F. Scott and Harriet Fast Scott, *The Armed Forces of the USSR*, Westview Press, Colorado, 1979, pp. 307-311. They write that "if one wants to learn to drive an automobile, water ski, fly, hunt, parachute, be a ham radio operator, or to take part in almost any sports activity, DOSAAF often provides the only opportunity" (p. 310).

4. See Milan Vego, "Warsaw Pact Naval Training," Navy International, October 1981, p. 593.

5. See "Treniruyutsya ofitsery" (Officers Undergo Training), Krasnaya zvezda, July 29, 1982, p. 1. Although surface fleet officers continue to debate whether or not to conduct damage control exercises aboard the vessel, they appear to agree that submarine exercises must be conducted at base in simulation chambers. See V. Telin, "Podgotovka ekipazhey k bor'be za zhivuchest' korablia" (Preparing the Crew for Shipboard Damage Control), Morskoy sbornik, No. 12, 1979, p. 69, and I. Ivanov, "Zabota vsego ekipazha" (A Concern of the Entire Crew), Kfasnaya zvezda, August 1, 1982, p. 2.

6. See "Treniruyutsya ofitsery," p. 1.

7. See ibid.

8. Such a ceremonial welcome for recruits is described in "Plecho druga" (A Friend's Shoulder), Krasnaya zvezda, June 27, 1981, p. 2.

9. Mine-laying procedures are described in A. Pranch, "Farvater miniruyut podvodniki" (Submariners Mine a Channel), Krasnaya zvezda, August 3, 1982, p. 1.

- 10. See ibid.
- 11. See ibid.
- 12. See ibid.
- 13. See ibid.

14. See Zh. Sverbilov, "Osobennosti upravleniya podvodnoy lodkoy pri plavanii vo l'dakh i podo l'dom" (Features of Submarine Management While Cruising in and under Ice), *Morskoy sbornik*, No. 1, Moscow, 1978, p. 46.

15. According to V. Mamontov and M. Sergeyev, "As far as navigational specialists are concerned, their practical habits leave much to be desired. Some officers are fearful of turning on mechanisms and equipment and their knowledge of repair operations is inadequate." See V. Mamontov and M. Sergeyev, "Kurs---v okean" (Course--to Sea), Morskoy sbornik, No. 1, 1982, p. 50.

16. In conjunction with the 1982 Food Program, *Red Star* called for increased attention to the conservation and proper handling of food on board naval vessels. See "Yesli podoidti po-khozyayski" (An Eccnomical Approach), *Krasnaya zvezda*, August 11, 1982, p. 2.

- 17. See ibid.
- 18. See ibid.
- 19. See ibid.
- 20. See ibid.

21. "There are many criteria by which a commander's competence at sea is judged--tactical knowledge and experience, seafaring and navigational prowess, a capacity to sense the crew's pulse, train and indoctrinate his subordinates." See G. Shalygin, "Komandirskaya zrelost"" (Commanders' Maturity), Krasnaya zvezda, January 14, 1982, p. 1.

22. V. Podoprigora points to the need for external stimulation aboard the submarine: "even experienced submariners at a certain point in the cruise grow lethargic as a result of too little movement and the monotony of their activities. In order to restore their efficiency, attentiveness, and reflexes, external emotional stimulation is essential." See "Ekzamenuyet okean" (The Ocean Is an Examiner), Krasnaya zvezda, February 18, 1982, p. 2.

23. See ibid.

24. A.Proshin and G. Shatayev discuss some of the acoustical problems of submarines in general in "Osnovnyye napravleniya bor'by s shumnost'yu podvodnykh lodok" (Basic Trends Toward Reducing the Submarine's Noise Level), *Morskoi sbornik*, No. 7, 1977, p. 78. In this scenario, I have taken the liberty of assuming that the problems apply to Soviet submarines.

- 25. See ibid.
- 26. See ibid.
- 27. See ibid.
- 28. See ibid., p. 79.
- 29. See ibid.

30. See V. Shchegolev, "Vigor," Soviet Military Review, No. 7, 1981, pp. 62-63.

31. See ibid.

32. "Yesli podoidti po-khozyayski," Krasnaya zvezda, August 11, 1982, p. 2.

33. Grishanov discusses some of the psychological burdens associated with long-term deployments. "The following can occur: low spirits, uncertainty, pessimism, indifference and even apathy." See V. M. Grishanov, *Voina, Okean, Chelovek* (War, Ocean, Man), Moscow, Voyenizdat, 1980, p. 143.

34. See "Komandirskaya zrelost," Krasmaya zvezda, January 14, 1982, p. 1.

35. For a closer look at Main Political Administration/commanding officer relationship, see Timothy J. Colton, Commissars, Commanders and Civilian Authority: The Structure of Soviet Military Politics, Harvard University Press, 1979.

36. See "Shturmanskiye zvezdy" (Navigational Stars), Kommunist vooruzhennykh sil, No. 1, January 1982, p. 80.

37. V. Gorbich, L. Ziman, V. Dupin, "Elektronno-vychislitel'nyye ustroystva dlya resheniya zadach korablevozhdeniya" (Computers Solve Ship-Handling Problems), *Morskoy sbornik*, No. 1, 1979, pp. 35-39.

38. See "Kurs--v okean," Horskoy sbornik, No. 1, 1982, p. 51.

39. V. Gorelov, "O pozharakh pod vodoy" (Concerning Underwater Fires), *Morskoy sbornik*, No. 9, 1977, p. 91.

40. See "Distance Triangle," Krasnaya zvezda, July 9, 1981, p. 2, translated in USSR Report, Military Affairs, JPRS 79352, November 2, 1981, pp. 29-32.

41. See "Po tochnomy pelengu" (The Bearing Is Exact), Krasnaya zvezda, July 6, 1982, p. 1.

42. See "Distance Triangle," Krasnaya zvezda, July 9, 1981, p. 2.

والمواليون والمسلوم والمستعلم والمسلوم والمالي والمالم والمالي والمالي والم والمالي والمالي والمالي والمالي والمالي والم والمالي والم

43. See "Po tochnomy pelengu," Krasnaya zvezda, July 6, 1982, p. 1.