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German Naval Strategy During World War II

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GERMAN NAVAL STRATEGY DURING WORLD WAR II

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Introduction.

German naval strategy during World War II, particularly during its first half, was greatly influenced by the way naval war had been planned and conducted before and during 1914/18. When World War I broke out Germany had a powerful, well-trained navy, about two-thirds as strong as the Royal Navy. German ships fought well, the fleet suffered comparatively minor losses only, and yet it found a dismal end at Scapa Flow. When, in June 1919, we scuttled our ships there we understood the reasons for this failure but dimly. When things had calmed down to some extent after revolution and civil war, and when the rebuilding of the very small Reichsmarine had been taken in hand, every effort was made to analyze the operations and events of 1914/18 in order to learn what mistakes had brought about failure and defeat.

Drawing Lessons from World War I

War diaries kept by the staffs and on board ship were a great help to establish the facts, personal recollections, many in the form of memoirs written by leading officers and statesmen gave an insight into the underlying ideas. Admiral Behncke, commanding 3rd Battle Squadron at Jutland. C.-in-C. Navy 1920/24, initiated the writing of the official history of the naval war; Admiral Zenker, at Jutland C. O. of BC VON DER TANN, C.-in-C. Navy 1924/28, encouraged historical research and very early started training younger officers in operational and strategical thinking; Admiral Raeder, at Jutland

on Hipper's staff, C.-in-C. 1928/43, wrote a volume of the Naval History himself and re-established the Naval War College.

Apart from lectures, talks, the official Naval History, and classified studies on certain aspects of the naval war, its strategical lessons were strikingly expounded by Admiral (then Commander) Wegener in his treatise on "Naval Strategy in World War," which was made known to his friends in 1926, and published in 1929. Admiral Groos followed him with his book *"Seekriegslehren"* (Lessons from the Naval War).

The somewhat disturbing, but generally accepted conclusion of all these studies was that a faulty strategy based on a mistaken interpretation of the "Fleet in Being" concept lay at the root of the failure of the German Navy.

Development of German Naval Strategy.

This was all the more surprising as up to about 1900, when the German Navy was small and France the most likely opponent, plans were bold, and provided for a cooperation with the Army by far-reaching operations like a large-scale landing in Normandy and a blockade of Brest. In the following years, the rapid expansion of the Navy, the task of keeping abreast of technical developments and incorporating them in fleet tactics seem to have absorbed the best brains of the Navy to such an extent that strategical thinking withered. Apart from the annual summer cruise to Norway, the Fleet trained exclusively in the Southeast corner of the North Sea and in the Baltic. A few cruisers were stationed at strategical points in foreign waters, in accordance with an old military-political tradition. In spring, 1914, for the first time in many years, two new battleships left home waters for a short cruise to the South Atlantic.

Lack of a German Grand Strategy.

In the years after 1900, no attempt seems to have been made at coordinating political, military and naval thinking and strategy. A strong "High Seas Fleet" was built, yet no bases were secured on the high seas. The Army expected a war on two fronts and knew that it would tax its forces to the utmost, yet no preparations were made to throw the weight of the powerful fleet into the balance. The Navy itself was of the opinion that the existence alone of strong naval forces in the German Bight of the North Sea would compel the British to blockade them closely. Therefore, it trained assiduously for a battle not far from Heligoland, by which its leaders hoped to bring about a *"Krafteausgleich,"* (equalization of forces) enabling them to undertake more aggressive operations at some undefined later date.

German Failure to Exploit the First Phase of the War.

In this planning the Navy Staff did not take into account the fact that no vital British sea communications ran anywhere near Heligoland Bight. On the other hand, it underestimated British susceptibility to any threat to the English east coast, let alone to the Channel. There is no doubt that in the first months of the war a feint in this direction could have brought the British Fleet to battle not much more than a hundred miles from Heligoland. The German Fleet, however, was kept tied to that island in the expectation of an attack which never materialized, whilst the German armies tried—and almost succeeded through the bold Schlieffen Plan—to crush the French armies in a few weeks in order then to oppose and best the slower-moving Russians.

Naval Situation 1914/16.

When the Schlieffen Plan failed in the weak hands of the younger Moltke, Germany's situation became most difficult. Neither commerce raiding by the few cruisers stationed outside home waters nor isolated hit-and-run operations against the English east coast could improve it in the least. After the initial phase of the war had not been exploited by the German Navy, the Grand Fleet, based on Scapa Flow, could rely on a distant blockade to strangle Germany slowly, but surely. It was in an ideal position to intercept any strong German attempt to reach the Atlantic and the British communications there.

Of course, geography assisted Great Britain in this strategy and made this kind of warfare easy. It should also be taken into account that an unbeaten German Fleet safeguarded command of the western and central Baltic, indispensable for a prolonged war owing to the ore traffic from northern Sweden. To some degree this explains the reluctance to commit the fleet. On the other hand, it was self-evident that Great Britain was a very dangerous opponent and could be hit hardest by destroying her shipping since a landing in England was out of question. It took a year and a half of cruising in the German Bight and an abortive attempt at unrestricted submarine warfare before the German leaders realized that the most direct, and at the same time only, method to open the road to British sea communications was by forcing the Grand Fleet to battle under circumstances favorable for the German superiority in submarines and air reconnaissance.

Admiral Scheer's Strategy.

Admiral Scheer, the chief advocate of this more aggressive policy, took over as C.-in-C. Fleet in January, 1916. By a series

of well-planned and inter-related operations he actually succeeded in bringing the Grand Fleet into the open in the Central North Sea. Although the ratio of strength in capital ships had greatly deteriorated (16 German to 18 British in the fall of 1914 as against 21 to 37 at Jutland), he was convinced that he had a good chance of success owing to the better training and material and by a clever use of submarines and airships. Within five months the fleets or large parts of them were in striking distance from each other four times, but chance prevented actual contact on three of these occasions. Only at Jutland, in May 1916, did the two fleets come to grips, but under far less favorable circumstances than those toward which Scheer had directed his hopes and operations. Bad weather upset his timetable; his submarines were already leaving their waiting positions; scouting by airships was inaffective due to bad visibility; the night attack for which the German destroyers had trained for many years, did not come off. Although the British lost far more ships and men than the Germans, the strategical gain was nil, since the overall situation remained unchanged.

Submarine War.

Therefore, the German Supreme Command came to the decision to start unrestricted war by submarines as the only means to get at British shipping. Too much time had already been lost, Germany was suffering heavily under the blockade for which she had not been prepared. British losses were brought to a dangerous, but not to a mortal level, and the new kind of warfare brought the United States with all its resources into the war.

Owing to improved mining, the High Seas Fleet was now increasingly busy to keep channels open for the submarines leaving and entering. Therefore, although raids with light forces were

continued, the battle fleet undertook only one more operation. In April, 1918, it proceeded farther north than ever before, to the latitude of Bergen, to intercept a convoy and its covering force, which might have been the U. S. VIth Battle Squadron. The timing was faulty, however; on a perfect day with unusual visibility, we sighted the snow-clad mountains of Norway, but not a single vessel. After a few months, there followed the bitter end with mutiny, revolution, internment, scuttling.

Strategic Situation after 1920.

At first, the historical studies previously mentioned and the conclusions drawn from them seemed to have theoretical value only. Under the stipulations of the Treaty of Versailles, the German Navy was a cripple at best. Germany was allowed to keep in service 6 obsolete battleships of the pre-dreadnought era, 6 very light cruisers built around 1900, 24 old torpedo boats, fully or partly coal-burning, a few minesweepers and tenders, but no submarines, no aircraft. Replacements were to have the following tonnage:

so-called BBs	10,000 tons
LCs	6,000 tons
12 DDs	800 tons
12 Torpedoboats	200 tons

Funds were so low in the first years after the war that hardly any new constructions could be undertaken, though all these vessels were ripe for replacement when the treaty was signed. By creating constant irritation in form of the Polish corridor the Treaty of Versailles had marked Poland as the logical adversary, who most probably would be supported by France. Because the German Army was of the opinion that only the Poles could be taken on, defence plans

initially followed this line. A few years later, however, the problems of a war against both France and Poland were examined.

Evolution of Strategic Thought.

Germany could not hope to defend herself alone against this combination. In order to make the idea of an alliance attractive to others, everything was done to bring the Armed Forces to a high pitch of efficiency. Good leadership and good planning were considered as paramount, and much was done to foster them. In the Navy, Admiral Zenker personally gave a number of lectures on strategy which, according to his listeners, were outstanding in clarity and penetration of the subject, a kind of naval Clausewitz. Unfortunately, they were never printed, although he caused a service manual "*Admiralstabsdienst,*" i. e., "The Duties in the Navy Staff" to be written for the initial courses for staff officers.

These courses could be attended by a few officers only. To make all the others conversant with tactical and strategical problems, war games were held every winter by every unit, ship, flotilla, battalion, etc. Their value depended greatly upon the qualities of the officer in charge. The spring and fall maneuvers of the small fleet generally ended with a strategical problem. Every winter, lieutenant commanders and officers of higher rank were required to write a report on a strategical, tactical, or technical subject. Excellent libraries and lectures helped to further general education and military and naval thinking. In this way, much was done to keep the officers mentally alert in spite of the limitations of a very small Navy.

The treatise of Admiral Wegener on "Naval Strategy in the World War" was particularly suited to induce strategical thinking, and it was widely read and discussed. It gave an excellent picture of the mistakes and possibilities of that war. Among

other things it pointed out the changes which the possession of Denmark and Norway would have made for German naval operations. From that time on the German Navy was Norway-conscious, if I may use this expression, and fully realized the implications of that area being in own hands or in enemy hands.

Averting the Danger of Becoming a Coastal Navy.

Nevertheless, there was some danger that owing to the smallness of the Fleet, the lack of submarines and aircraft, of battleships and carriers, the German Navy would relapse into purely coastal thinking. The critical time came when at last there was money to replace some of the old BBs by ships of 10,000 tons. At first, the only practical solution seemed to build a kind of large monitor, comparatively slow, with heavy armor and 11-inch guns, to be used defensively in the German Bight and perhaps offensively in Danzig Bight. Against strong resistance from several quarters, Admiral Zenker made the bold decision for a type which was well suited for the high seas and not for coastal warfare, a diesel-driven vessel of an entirely new type, with the comparatively high speed of 26 knots, light armor and six 11-inch guns. These vessels would be faster than almost any heavier ship, and more heavily armed than any faster ship, and their cruising range would greatly exceed that of any cruiser or capital ship. They were to be used in the Atlantic with the intention of compelling the French to employ the bulk of their fleet for escorting their merchant shipping. In this way, the German Navy Staff hoped to keep the road free for own vital supplies.

Aim: A Balanced Fleet.

In addition, these vessels fitted in best with the idea of *"Bundnisfahigkeit"* appearing again and again in the reflections and memoranda of that time; i. e., of making the German Navy strong enough, in spite of all restrictions, so as to be a valuable contribu-

tion to any alliance that Germany might enter. The political situation could change quickly, and therefore it was the aim of the leaders of the Navy to create a fleet as well balanced as possible under the circumstances, not a fleet for a special emergency which might never arise.

War Against Great Britain Unthinkable.

One thing was clear to the Navy all the time between the wars up to 1938: A conflict with Great Britain was unthinkable. 1914-18 had opened our eyes and was considered as a tragic mistake which never should be repeated lest the consequences be far more terrible to both. Therefore, it was strictly forbidden to play with this kind of fire even in war games. As far as can be ascertained now, only one strategic game was carried through by the Naval War College, in the early thirties, in which England played any part. Its subject was not, however, trying out measures for a war against Great Britain, but demonstrating to the students the inter-relations between Mediterranean and North Sea in any war in which Great Britain might be involved.

London Naval Treaty.

The Naval Treaty with Great Britain, concluded in 1935, showed the same trend of thought. In naval circles, it was taken seriously and welcomed as a step to a mutual understanding and for regularizing relations. We did not in the least suspect how little Hitler intended to respect treaties. The acceptance of 35% of British over-all strength seemed to us the best proof, particularly in the light of the geographic situation, that Germany did not harbor any aggressive intentions. True, the clauses concerning submarines allowed us to build 45% and later 100% of the British strength in that arm. It should be taken into account, however,

that the British had few submarines, 53,000 tons at the time, and that the Germans did not speed up submarine construction, but pursued the policy of building a well-balanced fleet, composed of conventional types.

The Question of Diesel-Powered Ships.

Many officers would have liked the construction of armored ships with diesel engines to have continued. In view of the development of fast battleships of other nations (especially the French *Dunkerques,* the 10,000 ton type was too slow and not heavily enough armed. Diesels for giving vessels of 20,000 tons a speed of 30 knots were in the experimental stage. Adapting them to the 26,000 ton SCHARNHORST would have retarded these ships by about a year. For the time being, the Navy therefore switched over to superheated steam of very high pressure in order to get BBs, cruisers and DDs with a good cruising range in a short time. The designers had been a bit too optimistic, however, and the new boilers and auxiliary engines caused considerable trouble at first. The range, especially of the heavy cruisers, fell far short of expectations. This is probably the main reason for their indifferent performance in Atlantic warfare.

The diesel idea was by no means abandoned. In the Z-plan 1938-39, armored ships of 20,000 tons with diesel engines appeared, and cruisers and DDs were also to be equipped with diesels. In winter 1944-45, we had a DD building with 6 diesels of 10,000 h. p. each, and another type for large ships was ready.

Hitler Sees War with Great Britain.

At the end of May, 1938, in a discussion of the political situation with Admiral Raeder, Hitler for the first time mentioned that he expected Great Britain to join Germany's adver-

saries. He asked the admiral to speed up the construction of the two BB's building at the time, and to make preparations for reaching submarine parity with Great Britain quickly. But a committee for making recommendations on an increased ship-building program for a possible war against Great Britain and France was not formed until September, 1938, and no immediate steps were taken for the strategical appraisal of the situation. In February, 1939, a war game was played at Oberhof, in Thuringia, with the subject of a war against both countries, but even then the prospective ratio of strength of 1944-45 was taken as a basis.

Plans for an Ocean-Going Fleet.

In the following months plans were drawn up for increasing the Navy considerably after notice had been given concerning the London Naval Treaty (end of April, 1939). The so-called Z-plan visualized an ocean-going fleet of 10 BBs, twelve 20,000-ton armored ships, only 2 carriers, and a great number of cruisers and DDs. As mentioned before, many of these vessels were to be diesel-powered.

Situation at Outbreak of War, 1939.

When war came in September, 1939, current construction had been speeded up slightly, but on the whole the German Navy had to face a situation which it considered as politically disastrous and for which it had made little preparation. It was much smaller than the French Navy, and roughly one-tenth of the Royal Navy—which alone counted in our eyes. In the various types the ratio of strength was:

BB	15	:	(2)
CV	6	:	0
CA and CL	64	:	10 (including armored ships)
DD	183	:	22
SS	57	:	46 (only 22 capable of oceanic warfare)

Moreover, the British had far more vessels of all classes under construction than the Germans. Geographically, the situation was much the same as in 1914-18, only the development of aircraft made it much easier for Great Britain to patrol and to control the routes leading on either side of Iceland to the Atlantic. On the other hand, Russia was a friendly neutral, and Japan was ready to give some support to German ships.

Strategy of Naval War Staff.

Small wonder that with such an inferiority and in such an unfavorable position the attempt to make some lasting impression upon the British was considered as rather hopeless in some quarters, and a strictly defensive attitude was advocated. It was here that the study of the naval planning and operations of World War I exercised a great influence upon the decisions of Naval War Staff. However difficult the situation, whatever the odds might be, one idea was axiomatic with the C.-in-C. Navy and his advisers: They had not the slightest intention of having their fleet, however diminutive it was, milling around Heligoland and playing at "Fleet in Being" in a remote and uninteresting corner of the North Sea.

They knew only too well how difficult it would be to employ the meagre forces at their disposal to secure command of the sea, be it for safeguarding the German sea routes or for intercepting enemy shipping.

The protection of German shipping had to be restricted to the Baltic and to the ore traffic from northern Norway. Little anxiety was felt for the Baltic. There was never the slightest doubt that the Poles would be eliminated in a very short time. The Baltic entrances were secured by mines and nets at their southern exits and considered as safe in view of the strength of the

German air force and the obvious reluctance of the British fleet to venture into narrow and shallow waters near German bases. As to Norway, it would be best if she remained neutral. Then the ore traffic could use Norwegian territorial waters, like in peace time, down to the Skagerrak and, if necessary, to the Kattegat where it was as good as out of British reach—all the more so, as a large and strong mine barrage had been laid from the West Frisian Islands 150 miles to the north, which had pushed the exit from the German Bight almost up to the Skagerrak. Nothing could be done for the protection of the sea routes outside these extended home waters. Therefore, all merchant ships on the oceans were ordered to run for safety. Many made the attempt to return to Germany, and quite a number of valuable ships and cargoes evaded the British patrols. Nearly a hundred vessels, half a million GRT (gross registered tons), returned safely—among them the liner BREMEN, via Murmansk.

The total of the naval effort was to be concentrated upon the classical objective of denying the use of the sea routes to the enemy. Owing to the disparity of strength, it was out of the question to try to eliminate the enemy by a fleet action, as Admiral Scheer had tried. On appraising the situation coolly, Naval War Staff came to the conviction that the only road to success lay in attacking the enemy shipping routes and naval forces with energy and cunning, at as many places as possible, with every means available. The submarines were to operate at the focal points of the shipping routes near the British Islands; DDs and aircraft were to harass the enemy by laying mines close to the English coast; auxiliary cruisers and armored ships widely scattered in distant seas were to divert and contain enemy forces—even the two battle cruisers were to be committed in the Iceland passages.

Criticism of Strategy of Naval War Staff.

This was a very different picture from World War I. It goes without saying that Naval War Staff fully realized the daring and the risks of this concept and the danger of setbacks it entailed. Criticism was, and still is, not lacking; yet, on the whole, it would seem that the results justified the audacity of Naval War Staff. It should be kept in mind that at first the number of submarines was entirely insufficient for a large-scale attack. After war broke out, the efforts of the shipyards were concentrated upon this type of vessel; all other construction was suspended with the exception of small craft and of vessels nearing completion. Nevertheless, before the occupation of France, there was only material for about 200 submarines on hand, and it took 21 months to get the first boats ready. That meant two years until they could make their appearance in the Atlantic. It should also be remembered that the Russian campaign was not yet on the cards when these deliberations and decisions had to be made.

Practical Execution of Naval Strategy.

Until greater numbers of submarines came into active service—i. e., until 1941—all the other means mentioned before had to be exploited to the utmost. This was done although there were difficulties and set-backs. DEUTSCHLAND LUTZOW, the oldest armored ship, had much engine trouble and made only one cruise, rather unproductive, in the North Atlantic. GRAF SPEE was lost after the Battle off the River Plate, owing to an unlucky decision of her commanding officer. In this way, an operation of two or three armored ships together became impossible. ADMIRAL SCHEER was more successful, appeared in the Atlantic and Indian Oceans and caused much havoc to a Halifax convoy. The Heavy Cruiser HIPPER was fairly successful against another con-

voy, but she and PRINZ EUGEN were greatly hampered by their insufficient cruising range. The BCs SCHARNHORST and GNEISENAU attacked the northern blockade line in the late fall of 1939, sinking the merchant cruiser RAWAL PINDI; during the Norwegian campaign they surprised and sank the aircraft carrier GLORIOUS and some transports and smaller craft. Early in 1941, they made a successful cruise in the North Atlantic, destroying a considerable number of merchant ships. During their career they met with every kind of grief in the shape of torpedoes, mines, bombs, and engine trouble. This kept them in the dockyards for long periods. The BISMARCK operation, towards the end of the period when surface vessels could be employed, was daring and unlucky.

The ubiquitous auxiliary cruisers, ten in all, cruised in all the oceans of the world, sank 850,000 GRT of shipping, a light cruiser and a merchant cruiser, and sent a number of valuable prizes home—among them three whaling ships with enough oil for the entire German margarine ration for 4 months.

Taken all together, commerce warfare with surface vessels netted far over 1 million GRT, with the loss of 1 BB, 1 armored ship, and 6 auxiliary cruisers.

In the first winter of the war, well executed sorties of DDs and an auxiliary minelayer (speed 7 knots) carried a considerable number of mines, anchored and magnetic, into the waters off the English southeast coast. Their effect was increased by mines laid by aircraft and submarines at vital points around the British Islands. This mining campaign was probably started too early and with too few mines. It came as a surprise and had good success at first against warships as well as against merchant ships. The British developed an effective sweep much more quickly than had been anticipated, but losses from mines remained rather high until 1944.

Results.

In 1917, unrestricted submarine war had brought the United States into the war. For this reason, German submarines in 1939 had strict orders to conduct commerce war according to the regulations of international law. After the British Admiralty had announced that British ships would be armed, and given them orders to ram submarines at sight, the U-boats changed over to unrestricted warfare against cargo vessels. Passenger ships still were not to be attacked, even when proceeding in a convoy. In the area around Great Britain, the last restrictions were not abolished before August, 1940. In spite of these initial checks and the small number of boats, submarines sank about 5 million GRT in the first two years of the war, with a loss of 45 boats; 171 came into service in that period, more than half of this number in the last six months.

The grand total of warfare against enemy shipping in 1939 to 1941 was 8 to 9 million GRT—this would seem to prove Naval War Staff correct. In any case, none of the criticists has so far brought forward any suggestions for a naval strategy which might have produced better results with so small a Navy. True, the improvement of the geographical situation during the first year of the war helped greatly. On the other hand, the events leading to this improvement, especially the Norwegian Campaign, detracted from the efficiency of the German Naval forces, quite apart from the fact that the German Air Force did not support the tonnage war.

Naval Strategy and the First Campaigns.

The Polish campaign is of interest only insofar as Naval War Staff treated it as a sideshow and ordered every single modern vessel to the North Sea as soon as Great Britain had declared war. With Norway, it was a different tale. In British hands, it

would have meant the end of any kind of German offensive naval strategy. With their Northern Barrage, the Americans had showed already in 1918 that it was possible to bottle up the North Sea. A repetition with improved mines and into Norwegian territorial waters would effectively block the road for surface vessels as well as for submarines. Moreover, the airfields of southern Norway in British possession were a direct threat to the German training areas in the Baltic, so far out of reach of the RAF. Finally, the suspension of the ore traffic from northern Sweden and Norway would cut down German steel production by one-half.

This is not the place to go into the details of the "Race for Norway," Suffice it to say that Naval War Staff would have preferred a neutral Norway, but once British intentions on Norwegian ports had been established beyond doubt, did everything in its power to make the operation a success. Every single vessel was committed, submarine warfare interrupted, an armored ship held back which had been preparing for an Atlantic cruise. The operation was a full success; the threat to the ore traffic, to the offensive strategy and to the training areas completely removed. Losses (3 cruisers, 10 destroyers, some auxiliaries) were smaller than expected, although heavy enough compared with the small size of the fleet. Oceanic warfare was affected by torpedo damage to the 2 BCs and one armored ship.

Rather unexpectedly, the French campaign brought about a great improvement for conducting naval war in accordance with the strategy of Naval War Staff. The leaders of the Army were not at all optimistic about the outcome of their attack; they expected stiff fighting and hoped, as General Halder told the Navy, to reach the Channel near Boulogne after six months. On being asked by the Army, the Navy had explained that possession of some ports on the eastern Channel would not help very much, and

that nothing less than the occupation of the whole of France north of the Loire River, including Brest and Lorient, would change the strategic situation favorably.

Operation SEA LION.

As a result of the quick success of the French campaign, the German Armed Forces were suddenly confronted with the problem of a landing in England. Naval War Staff never had any doubt that a large-scale landing in summer, 1940, would terminate the war speedily. It harbored grave doubts, however, about the feasibility of the operation. True, Raeder was the first to broach the subject to Hitler; yet, he did it mainly because he expected him to say any day, "Tomorrow, we will land in England," and he was fully alive to the great difficulties of the operation. No preparations were made before July, 1940, because the quick and decisive success of the campaign came as a complete surprise. From the beginning, Raeder emphasized the necessity of gaining unchallenged air supremacy. When the Air Force failed, the operation had to be abandoned.

The submarine war had been going on through all the months of preparation for SEA LION. Unfortunately, even after SEA LION had been shelved the German Air Force did not see any necessity for combined action against England's sea communications. Merchant ships were not considered as primary targets; for some time, Goering even prohibited attacks on them. A continuous campaign against British shipping, port installations and shipyards from the fall of 1940 on—better still, from June, 1940, on—was bound to meet with considerable success because the ships had hardly any AA guns, the ports neither, and the British fighter force was too small to give much protection. By attacking it where it was concentrated around London, the German Air Force played into its hands.

In this way, a great opportunity of inflicting critical damage to the enemy was lost. To make matters worse, the submarines never had the long-distance air reconnaissance indispensable in view of their low numbers, which permitted enemy convoys to slip by unobserved. In the course of the war, Goering wrested the remnants of the small Naval Air Arm away from the Navy.

The Mediterranean.

The entry of Italy into the war in June, 1940, had opened new strategic vistas. The Italians failed to utilize the situation in the Mediterranean, however, and there did not exist any plans for joint action in that theater. Hitler wanted to leave things entirely to his ally, Mussolini.

In September, 1940, when the fate of the operation SEA LION was still in balance, Raeder had a long conference with Hitler, under four eyes, because he was then more tractable than in a larger circle. Raeder put great emphasis upon holding the same course as before in the grand strategy of the war; i. e., concentration of effort against Great Britain as the main adversary. Emphatically, he tried to dissuade Hitler from the idea of attacking Russia. He proposed exploitation of the Mediterranean to the point of completely excluding Great Britain from that sea. A combined German-Italian effort could have taken Malta and reached Suez; wavering Spain could then be drawn into the Axis camp. This would settle the question of Gibraltar. With the Mediterranean secure in their hands the Axis powers could take over command of the Near East, which move, as Raeder hoped, would make war against Russia unnecessary. Besides, their position for Atlantic warfare would be much better.

Hitler declared himself deeply impressed by these ideas, yet he did not change his plans concerning Russia. Perhaps he might

have acted differently if the Army had supported the views of the Navy. It never did, however, because from their continental point of view, the Army leaders were unable to grasp the great possibilities the Mediterranean offered. Colonel-General Halder, the Chief of the General Staff, considered all military action in that sea as an "attempt to gain time," and he said of the Navy, "These good people dream in whole continents."

In the following years, Naval War Staff repeatedly applied for "finally settling the Mediterranean question." In the fall of 1941, when the situation in North Africa was critical, Hitler himself gave orders for transferring 24 German submarines to that theater, with the result that the situation greatly improved. An Air Fleet was transferred to the Mediterranean, too, but what would have ensured full success in 1940 was only a half-measure in 1941-42, and the Russian campaign prevented taking really decisive measures.

The Russian Campaign.

From the beginning, the Navy had grave doubts about the practicability of that operation because it deflected too strong forces from the main objective, Great Britain, which was to be reached in the Mediterranean and the Atlantic. The Army saw it as a purely continental problem and was sure to solve it in a few months. Hitler, whose own idea that campaign was, agreed because he wanted to see it that way. No effort was made to ensure maximum cooperation of a reluctant Navy. Naval War Staff assessed the probable Russian performance at sea quite correctly as inferior and planned far more boldly than the local naval commanders. Yet, in spite of daring raids of small craft and minelayers up to the front door of the Russians, the whole concept was defensive, using weak forces in order not to detract from the attack on Great Britain. In this way, it took months instead of

weeks to reach the outskirts of Leningrad, which was never taken, with the consequences that in the following years the Navy had to make considerable efforts to contain the Russian Navy, especially the submarines, in the innermost corner of the Gulf of Finland. Murmansk was attacked overland only, with the result that the advance bogged down in unpassable terrain.

Owing to the political set-back in Yugoslavia, which made military action necessary and retarded the Balkans and Russian campaigns, the land forces started their advance along the Black Sea far too late. Nothing was done to speed it up; thus, it happened that enemy naval forces remained operative in all the marginal and enclosed seas, the Mediterranean, the Black Sea, the Baltic, and the Polar Sea.

A capable Supreme Command would have recognized the advantages of permanent undisputed command over these seas and would have secured it by a timely application of suitable forces. OKW never understood the slow, but immense pressure that great naval powers could bring to bear upon the small continent of Europe. The Navy saw it and acted accordingly, but failed perhaps to realize that once the decision for the attack on Russia had been made no effort should have been spared to bring about a speedy termination of this venture to have the back free again; all the more so as the BISMARCK affair had shown that the days of surface operations were drawing to an end, and there were unmistakable signs that things were becoming increasingly difficult for the submarines, too.

Peak and Failure of Oceanic Campaign.

After sinking the BISMARCK, the British Fleet had hunted and destroyed her supply ships throwing out of gear the whole

German supply organization on the Atlantic, which so far had operated with little loss. In 1942 and 1943, the last auxiliary cruisers were either destroyed or had to turn back in the English channel. They had done excellent work, but their time had passed. Submarines came now into active service in large numbers and took over. They were essentially of the same type as in the first years of the war that with their wolf pack tactics had been so successful. Increasing activity of enemy aircraft drove them farther out to sea, and the lack of air reconnaissance made it difficult for them to find the convoys. The defense of the convoys was improving, too, and although submarine losses were still low, some of the most experienced commanders were lost. The average daily tonnage sunk per boat was going down evenly and inexorably; new construction in Great Britain and the United States was going up.

The entrance of the United States into the war gave the submarines a respite by offering lucrative targets in American waters. They made excellent use of the new opportunities, but this geographical extension could not solve the pressing problem of diminishing returns.

There was a short period of hope for widening the strategic field when the Japanese carrier force roamed the Indian Ocean. All dreams of a closer cooperation had to be buried after Midway, however, and Germany was on her own again, Italy becoming more and more a liability.

The impossibility of continuing warfare in the Atlantic with surface vessels had been acknowledged by taking the BCs SCHARNHORST and GNEISENAU back to Germany by way of the Channel. This operation was tactically successful, yet it was a tacit admission that the usefulness of the initial strategy of Naval War Staff was running out. The only theater of war where

surface vessels still could operate was the Polar Sea, where the Murmansk convoys offered profitable targets. Luck seemed to be running out, too, and operations were made difficult by Hitler himself, who after the loss of the BISMARCK demanded results without risks. In the first days of 1943, after an abortive attack on one of the convoys he gave the order to decommission and scrap the remaining BBs and cruisers as far as they were not needed for training purposes. Raeder could not convince him that this would be an intolerable blow to the Navy, and handed in his resignation. It was accepted, and Donitz was made his successor. Although a submarine man first and foremost, he soon perceived in his new position what this step would mean and succeeded in persuading Hitler to withdraw his order.

SCHARNHORST and TIRPITZ were sent to northern Norway. SCHARNHORST was destroyed when she unsuccessfully attacked a convoy. TIRPITZ bombarded Allied bases on Spitsbergen and was later sunk by bombs. The carrier GRAF ZEPPELIN, which would have come in handy for these operations, was never commissioned because there was no naval air arm.

German Strategy Fails.

In the year from the fall of 1942 to the summer of 1943, the jerry-built structure of German grand strategy toppled about the ears of its architects in the battles of Alamein, Stalingrad and Tunisia; in the landings in North Africa, Sicily and Salerno; in the failure of the Air Force, and in the complete breakdown of the submarine campaign. In May, 1943, 50% of the boats operating at sea were lost, without any corresponding return in enemy tonnage sunk.

Attempts at Renewing the Submarine War.

Nevertheless, in Germany's desperate situation, the submarine seemed to be the only arm that gave some promise of becoming offensive again. The main faults of the type in use at that time were vulnerability to radar-conducted attack when traveling on the surface, and very low under-water speed. The great advantages of a higher speed had been recognized before the war, and experimental boats had been built with Walther drive (i. e., producing hydrogen for underwater combustion from a chemical fluid rich in oxygen). Tests proceeded at a leisurely pace, however, and no steps were taken to explore other approaches to the problem. A means for evading radar, the Schnorkel, had been in German hands since 1940, when it had been found in Holland. Now, in the emergency of 1943, it was taken out of the ice box and soon proved valuable. The Bureau of Naval Construction quickly designed two types of submarines with electrical drive for high underwater speed. Shipbuilding was handed over to the civilian Speer ministry in order to get better priority and better deliveries.

The new boats, equipped with excellent underwater location gear, were to attack convoys from below with homing torpedoes and similar devices. Their high underwater speed enabled them to gain good attacking positions and to evade pursuit. It is very probable that these new tactics would have given new life to the strategy of attacking Allied sea communications. Though a few boats of the small type became operative, they were too late to change the course of events.

The war went on without any new naval strategy. The remnants of the fleet were employed in the Baltic with good success and small losses to support the desperately fighting army troops, and to cover the evacuation of more than a million people fleeing

from the Soviets. Western air attack took a heavy toll in the ports, and a few cruisers and destroyers were all the larger surface ships left at the end of the war.

It is rather difficult for me to say how far the German Naval Strategy in World War II met with success and how far it failed. Success and failure are relative concepts, and they may look very differently seen from different sides. Moreover, it is probably too early still to come to a final appreciation—all the more so as naval strategy is only part of the overall military strategy, and that again is part of what I may term grand national strategy.

My own personal view is that in the first half of the war German naval strategy was more successful than we expected, and that in the second half of the war it failed to a greater extent than would have been necessary. I think that the initial success was due to the correct evaluation and adaption of the experiences of World War I. Possible improvements have been suggested from several quarters, of course. They are mainly:

(a) *A better preparation for enlarging the submarine fleet.* This was not done in time, owing to political reasons.

(b) *Much better support by the Air Force.* This was more or less outside the hands of the Navy, though something could have been done about it perhaps by transferring a few first-class senior officers to the new Air Force or by creating better relations with the Air Force. But this would be the subject for another investigation.

(c) *Timely preparation of the assault on England.* Even with husbanding of Naval Combat Vessels and with more and better landing craft, a landing would have been possible only with excellent Air Force support and at least 3 to 4 airborne divisions.

(d) *A concentration of the surface vessels for operations against focal points of British commerce.* Would have been best with the armored ships. Reasons given why not. The two BCs worked together as a rule. Of course, a strong task force in the Polar Sea against the Murmansk convoys would have been a good thing. This could not have been foreseen when this strategy was formulated.

The decline of the surface ships had been anticipated in the strategical calculations, and the submarines arrived in time to keep the ball rolling. They were defeated because German counter measures against the technical development of the Allies were taken later than circumstances warranted.

Of the problems on the higher levels of military and national strategy, I will limit myself to those of the cooperation of the three Services and of Hitler's influence on German naval affairs.

Cooperation of the Services.

In spite of great initial success, German military strategy failed at least as spectacularly as naval strategy. The main reasons are, in my opinion, the purely continental outlook of most leading Army and Air Force officers. There were very clever men among them, but their utter lack of sea-consciousness was very startling, again and again. For them, the sea was something that was paint-

ed blue on the maps and would serve as a moat in an emergency—but, to them, could not affect their decisive land operations. Between the wars, an attempt had been made at combined training by establishing a small Armed Forces War College in 1935.

There was only one course at a time, lasting one year, attended by 6 Army officers, 2 Air Force and 2 Navy officers. In 1938, the Army declared that these 6 officers could not be spared anymore, and the college folded up. It is significant that none of the Army students ever reached a high position in an operational staff; they were mostly used as military attaches, in the War Office, etc.

It goes without saying that this mental attitude made combined planning very difficult. As far as I can see, the Norwegian campaign was the only example of a perfect cooperation of the three services. Generally, they existed side by side and held divergent opinions on the strategy to be employed. There was never a theater C.-in-C. with full power over all the troops and units in his area. Before and during the Invasion in Normandy, Rommel could not give any orders to the naval and air units operating directly under his eyes.

German Supreme Command.

Of course, an energetic and experienced Supreme Commander of the German Armed Forces could have ironed out these discrepancies and compelled the Services to act together. He would also have evolved a common Italian-German strategy. There was no such commander, however. Field Marshal von Blomberg, the first and only Supreme Commander of the Wehrmacht, was dismissed in 1938. Hitler himself took his office over, with great energy and will power but lacking the qualifications of a great military leader. He had a good memory for facts and figures; he could

see the advantages of a plan, but he lacked the gift of constructive thinking as well as that of picking out the right men and working them as a team. By some kind of personal magnetism, he had an uncanny influence on many people directly in touch with him. As a true revolutionary, he did not trust anybody and split up any force that might become dangerous to him.

Hitler's Influence on German Naval Affairs.

It is difficult to say how far this magnetism influenced Raeder. I think their relations can best be termed a kind of armed neutrality. Hitler was greatly interested in naval matters, particularly in big ships, but actually he understood but little of the inner structure and workings of a navy. It seems that he respected Raeder as a first-class expert of matters foreign to him. Raeder, on the other hand, restricted his activities to his own naval sphere and never tried to interfere in anything bordering on what might be termed politics. It should be mentioned, however, that in religious and ethical matters he was adamant, whatever the attitude of Hitler and his NSDAP might be.

Hitler did not contribute a thing to the forming of the German naval strategy. When war broke out he at first greatly restricted operations against enemy merchant ships, for political reasons. In the case of Norway, he followed the reasoning of the Navy, after some hesitation, whereas he turned down the Navy's ideas about the Mediterranean. On the other hand, the Navy talked him out of some of his more fantastic plans—like using some big liners for a feint against the English coast during SEA LION, or the occupation of Iceland, and the Azores and Canary Islands.

After the loss of the BISMARCK, he made a strong attempt to interfere in naval matters by abolishing the BBs and

cruisers, as mentioned before. On the whole his influence on naval operations was far smaller than on land warfare. What he never did was to create clear conditions for high level command and to bring together the leaders of the various branches of the war effort in order to coordinate their work. He wanted to make every decision himself and ended trying to do everything himself. Because he had no sense for ethical values, he conveniently forgot that he had been elected for social reform and against communism—not for starting a war for which there was no need and which never should have happened. I am convinced that in the ultimate his utter lack of ethics caused Germany's downfall.

Of course, there is much hindsight in these reflections. Criticism of the past should form the lessons for the future. I think the chapter of naval history which I had the honor of presenting to you today will remain valuable, on the one hand, for studying naval command and operations; on the other hand, because it shows the immense strength and great possibilities of sea power and the difficulties of the continental mind correctly to calculate the far-reaching influence of the sea.

BIOGRAPHICAL SKETCH OF LECTURER

Former Vice Admiral Friedrich Ruge, G. N.

Former Vice Admiral Friedrich Ruge was born on 24 December 1894 in Leipzig and entered the German Navy in 1914. His record of promotions is as follows:

1 April 1933—Lieutenant Commander
1 January 1937—Commander
1 January 1939—Captain
1 April 1942—Rear Admiral
1 March 1943—Vice Admiral

During World War II, he was in command of German mine laying and patrol forces in nearly all theaters of war. In addition, he was Naval Liaison Officer Field Marshall Rommel's staff, and later was Chief of Liaison Staff in Italy. Ultimately he was Chief of the Designing Department in the German Supreme Naval Command.

Former Vice Admiral Ruge was qualified as a blockade officer in 1933. His decorations include the Knights' Cross to the Iron Cross which was awarded on 21 October 1940.

Since 1945 he has cooperated with the United States Naval authorities in preparing naval studies on German naval aspects of World War II. He is widely read and well-informed on world affairs. He speaks English, French and Italian fluently and possesses a working knowledge of Swedish and Russian.