

## THE SHIPBUILDING IN GDANSK TILL 1945

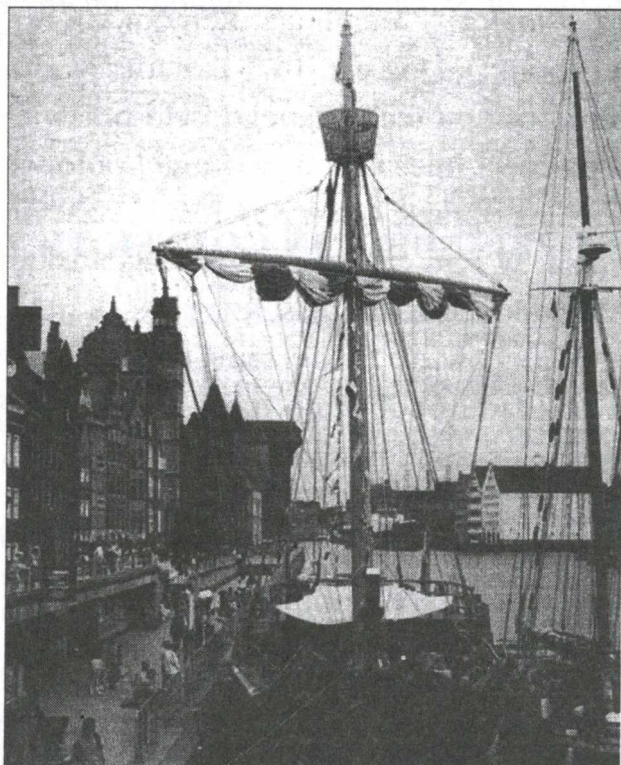
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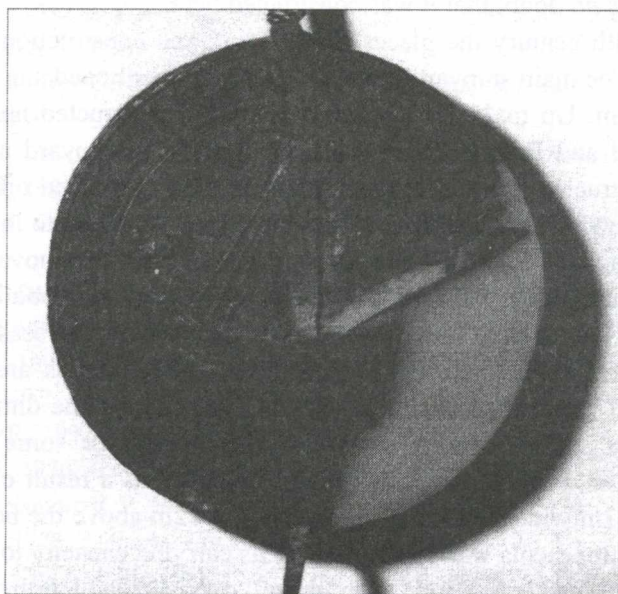
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The oldest discoveries connected with Gdansk boatbuilding come from the 10–13th centuries. At least 5 types of ships were built or renovated here: small and big fishing boats, long fishing boats, big military boats, big freight boars capable to sail at sea, and ferries. The oak planks were overlapping, strengthened with treenails, and sealed with moss. The boatbuilding workshops were probably located in the region of today's Olowianka island. At the end of 12th century a new type of boat called cog appears. It was a big, one-mast ship, of 400 tons loading capacity, developed and improved all the time. The quarter paddle was replaced by a stern rudder, and high battlement castles were added to improve the defense powers. This modern type of cog was introduced into the Gdansk oldest seal (the first such in Europe). There is no doubt that it was constructed here.

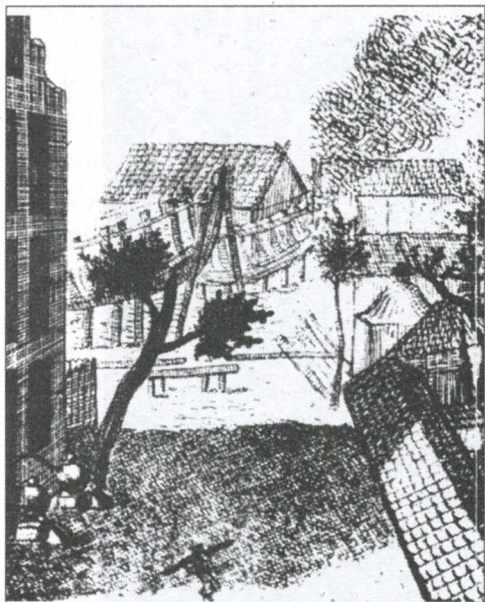
Since the 14th century the places for building and construction of ships have become stable. The main shipyard center on Lastadia, mentioned since 1361, had an area 400 per 70m. Up to 12 ships could have been constructed here at the same time. Mast Field and Boat Field were neighbouring the shipyard and the Vistula boats were constructed there. The repair shipyards were situated on Brabank (Old Shipyard now), and part of Szafarnia. The ships were pulled up to the slipway with the help of a drawing machine. After the ships were built or renovated, they were alighted on special sliding ways. Gdansk became the biggest shipbuilding center by the Baltic Sea. At that time new types of ships appear on the seas of the world: holk, caravel, carrack. The improved rigging of enlarged sails area and smooth skinning ensured greater speed and better maneuverability. The dimensions of the ships are growing. The famous caravel (or a carrack for some) Pierre de la Rochelle, which in 1462 was stuck in Gdansk harbour as a result of damage, was 52m long, and 12m wide. Her main mast stuck out 32m above the board level. The total area of her three sails was 757 square m, its carrying capacity totaled 700t, and her draught at full load was 5.3 m. After general overhaul she left the harbour under a new name — Peter von Dantzig, and sailed with her 350-crew members to fight



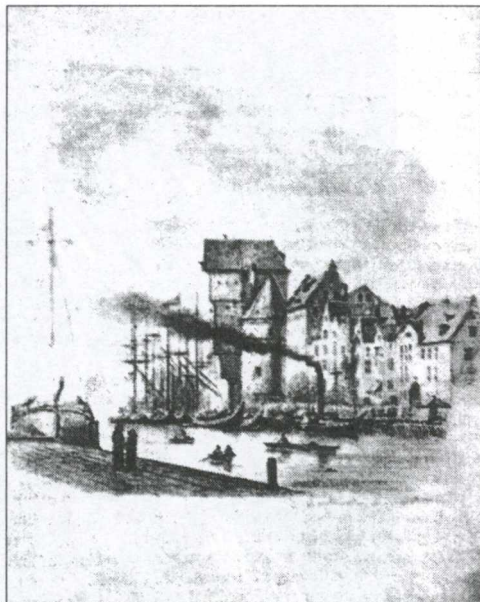
*Figure 1. Modern replica of a cogon on the Motława River*



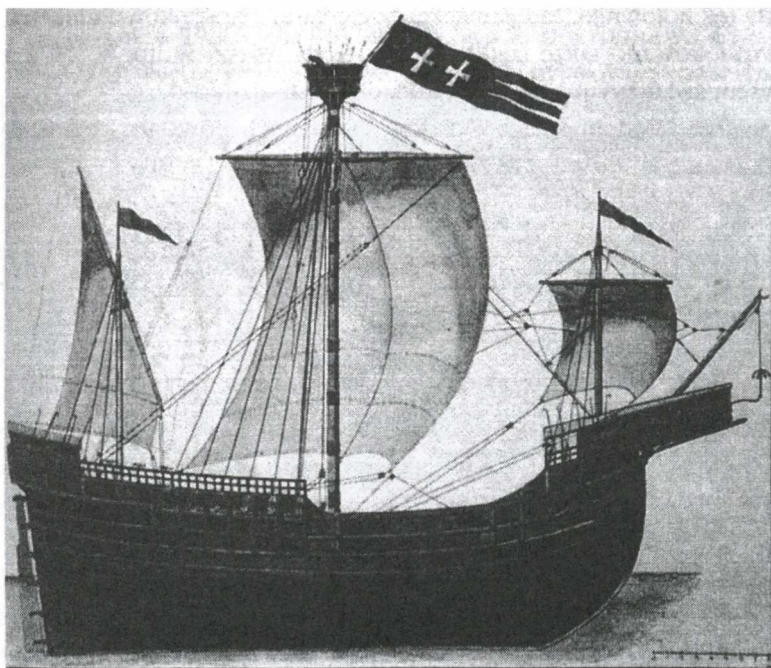
*Figure 2. Cogon in the oldest Gdansk seal*



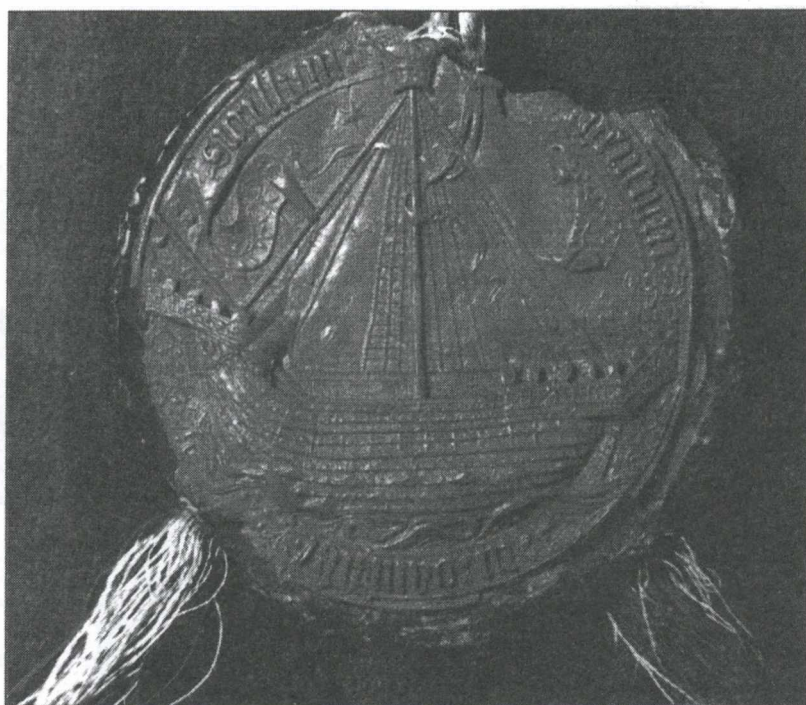
*Figure 3. Lastadia shipyards in the 17th century (in the background)*



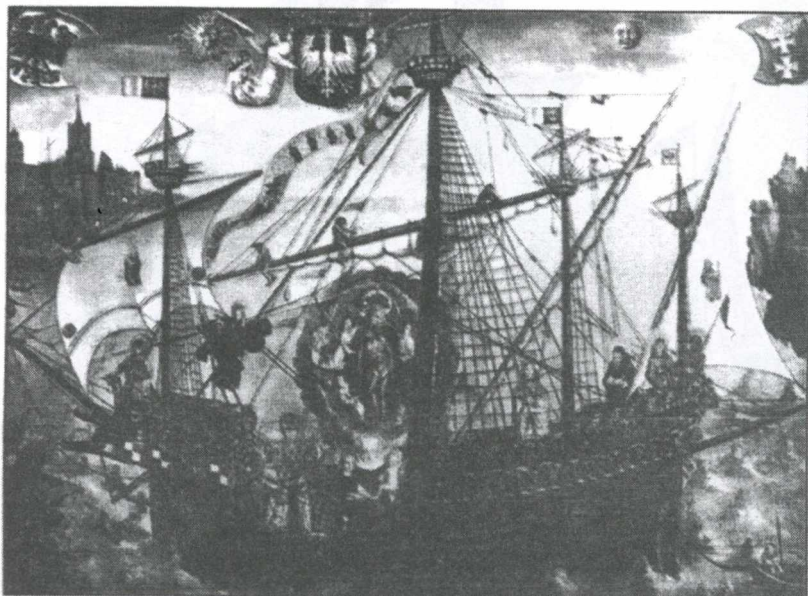
*Figure 4. A steamer near the Crane in 1849*



*Figure 5. This is what „Peter from Gdansk” presumably looked like*



*Figure 6. A seal from around the year 1400, with a holk*

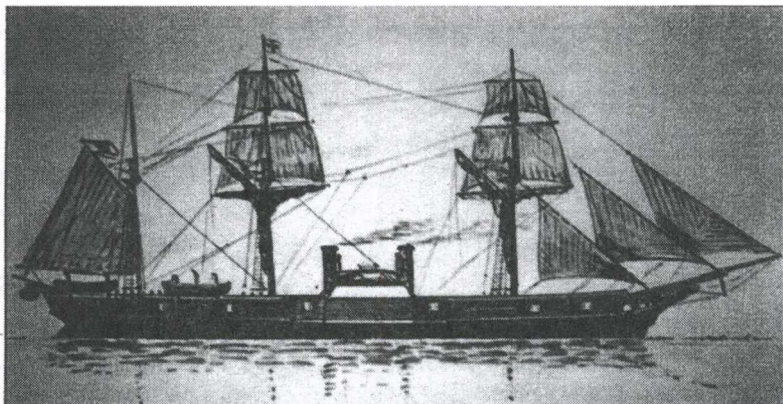


*Figure 7. „The Church Ship” from the Artus Court (missing)*

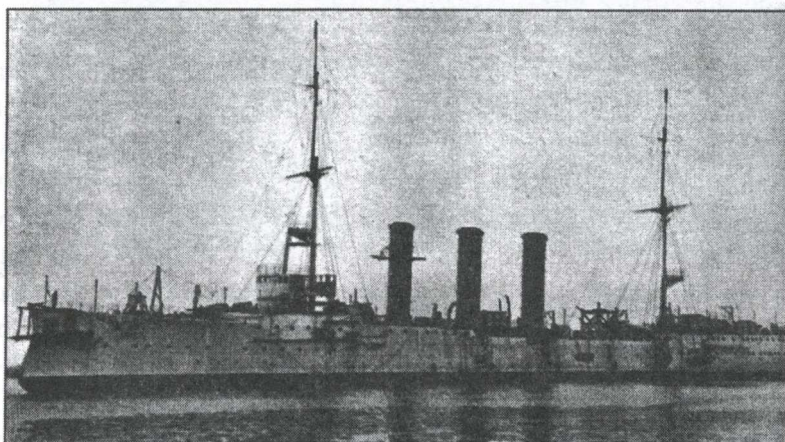
against England. On the day of 14th April 1473, under the command of Paul Beneke, she seized the picture *The Last Judgement* by Hans Memling for the city. Overhauling such a modern unit had a great influence on further production. Already in 1475 *Lastadia* launched its first caravel. A side proof of the technological development was the appearance of the image of holk on the city seal already in 1400. In the 2nd half of the 15th century a great carrack-galleon appeared in the picture *The Church Ship* which hanged before the war in the *Marienburger Bench* of the *Artus Court*. The ship production output of the Gdansk Shipyard at that time was really huge. Several units were constructed there every year, for the English, Dutch, Flemish, and even Italian clients. In 1510 Lubeck alone ordered 7 ships. In 1514 18 ships were being constructed at *Lastadia* at the same time, among which one of unparalleled dimensions. In 1544 two carracks for the king of England, Henry VIII, were constructed.

In the middle of 16th century the amount of production started to drop. Only after the Swedish Wars did it revive again. Among other orders there was one for seven ships for the East Indies Company. Fleuts and pinases were built at that time and in the 18th century new ones such as frigates, barges, brigs, pinks, schooners, galliots, galleasses were added. There were also new types of coast ships such as lighters and burdines, which served for unloading in the roadstead ships, which could not enter the harbour because of a too large draught. Specialists brought from the Netherlands introduced new technologies. The ships are now finished and equipped after launching. The construction is run by an engineer basing on a project. In the 18th century construction drawing appears. In the years 1757–1763 six shipyards in Gdansk construct 13 ships and overhauls 19 every year.

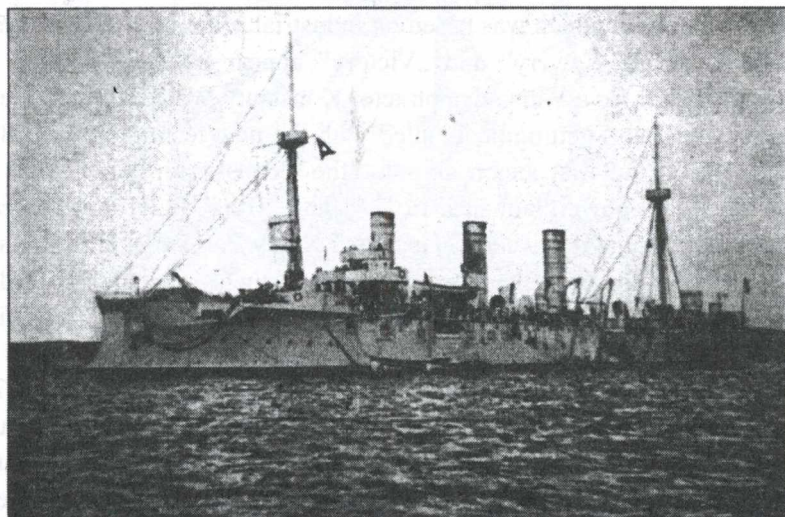
The development of modern shipyard industry in Gdansk is connected with the name of Johann Wilhelm Klawitter (1801–1863), who came from a family which had been connected with Gdansk shipbuilding for centuries. In 1827 he opened on *Brabank* the first shipyard which was based on industrial principles. At that time the first steam ships „*Xiążę Xawery*” and „*Victory*” appear in Gdansk. They were brought from Yarmouth for a Warsaw contractor *Konstanty Wolicki*. After spending some time in England and getting acquainted with the new technology, in 1839/40 Klawitter constructed the first steam ship for the Gdansk shipowner. Two other ones, „*Pfeil*”, of 24KM power, launched in 1841 and „*Blitz*” (32HP, 1842), carried passengers and tugged ships between Gdansk and *Nowy Port* causing protests from the dockers who used to drag them before. In 1853 the Klawitter shipyard built a wooden floating dock — the first one in Prussia, and in 1855, also as first, it started building steel hulls under the supervision of a specialist brought from England. In 1865 they started to move the production to *Polish Hook*. In 1875 the last wooden sailing vessel was launched. By 1875 124 ships had been built, and by 1914 over 400. Among these there were usually sea freight vessels, but also tugboats, icebreakers, dredgers and some warships. Also river boats, machines and boilers were produced. In 1932 as a result of the world crisis the mortgaged plant went bankrupt.



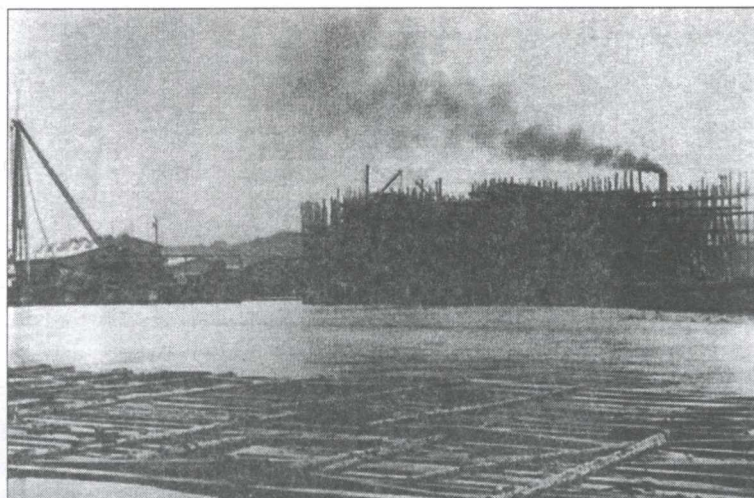
*Figure 8. „Danzig” corvette*



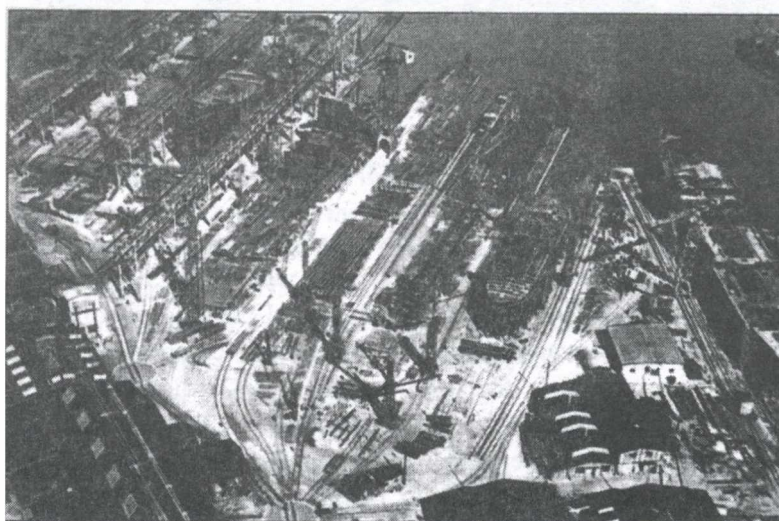
*Figure 9. „Emden” cruiser finished in 1908*



*Figure 10. „Gefion” — a cruiser corvette*

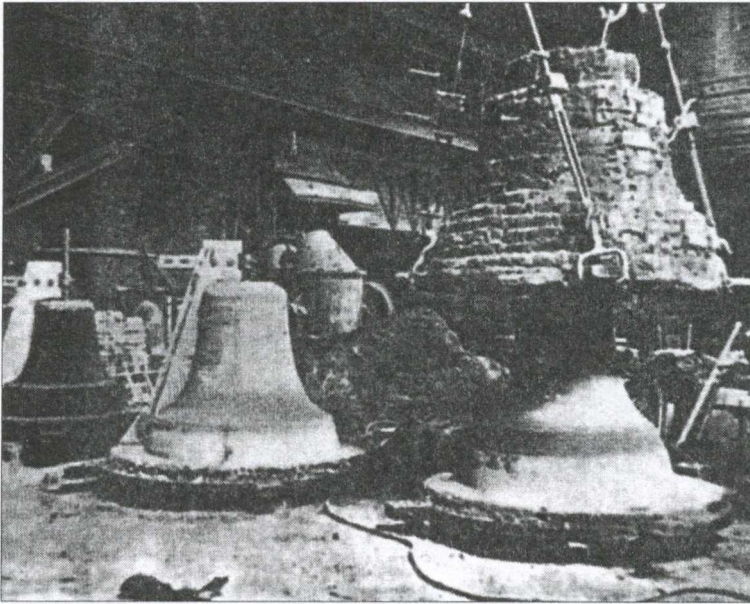


*Figure 11. The Emperor's Shipyard in 1893*



*Figure 12. Slipways in the Schichau shipyard in Gdansk — bird's eye view  
(picture taken before the war)*

In 1844 on the area of Youngtown Timber Storage Places a new Corvette Base together with workshops was founded. Since 1850 it was called the King's Shipyard, and since 1871 — the Emperor's one. The first ship — a steam corvette „Danzig” built under the supervision of J.W. Klawitter was launched in 1851. In 1857 the shipyard already had 3 slipways and a floating dock received from Klawitter. Since 1866 steel ships were built. In the years 1874–1890 the shipyard was totally reconstructed and equipped in 3 new slipways and an overhaul pillar connected with a submergible floating dock. It was now possible to built there vessels which were 135 m long, and had 9000 tons carrying capacity. In the years

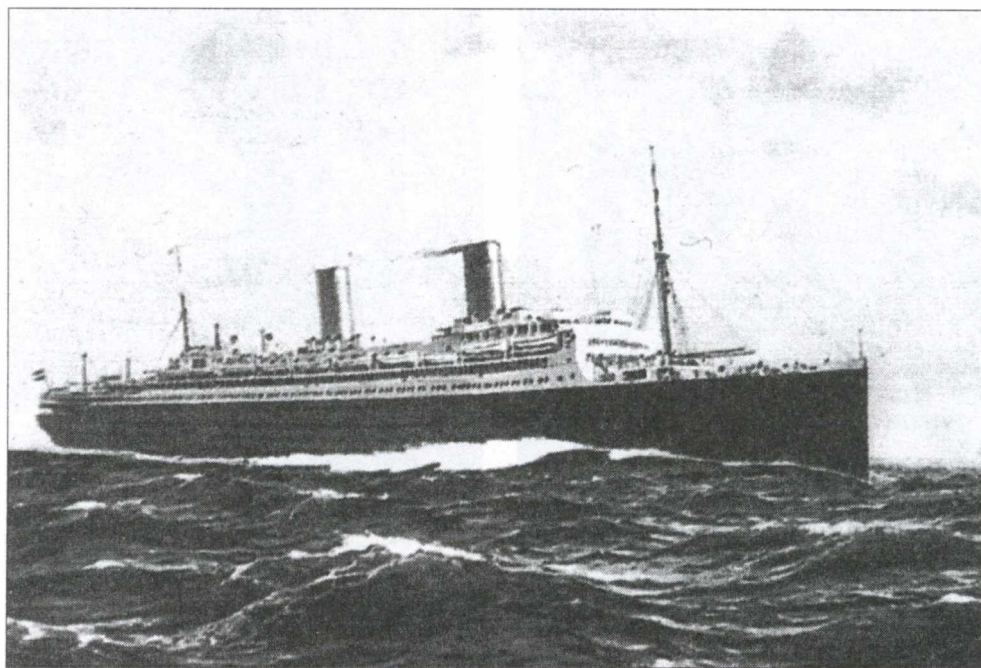


*Figure 13. Bell foundry in the Gdanska Shipyard (picture taken before the war)*

1850–1918 136 ships were built, including (since 1904) 55 submarines and many other units of sailing stock.

After the 1st World War the plant was changed into a civil one and called Danziger Werft. In 1922 a company was created which had 30% of English and French capital, and 20% of Polish and Gdansk capital. Signing a profitable contract with Poland to build American locomotives allowed the company to gather money for thorough modernization. In the years 1920–1939 97 ships were launched for Poland, 24 for Norway, Denmark, Italy, Yugoslavia, England, Brazil, Chile, and Argentina. Among them there were tugboats, fishing boats, cargo carriers, passenger vessels, tankers, and ferries of carriage capacity up to 8000 tons. An achievement was building a cold storage vessel „Ulm” for carrying 3000 tons of fruit, and reconstruction of the „Porta” which was equipped in the steam turbine of 4.5 000HP. The shipyard produced steam engines of 1800HP and Diesel engines of 5000HP, licensed by MAN. In 1928 a separate section of steel constructions was opened and started producing cranes as well. The foundry of Gdanska Shipyard also specialized in producing church bells. Within 15 years 666 of them were cast. In 1933 the shipyard received an unusual order for complete equipment for a huge sugar factory. It was finished within 7 months. Since 1921 generators, electric engines and transformers were built there, and in 1930 production of huge refrigeration plants was started. As can be seen from the above description the Gdansk Shipyard before the war was a versatile plant, capable of meeting the requirements of changing market conditions. In spite of that it went through a crisis in the years 1931–1936. In 1940 it switched to war production.





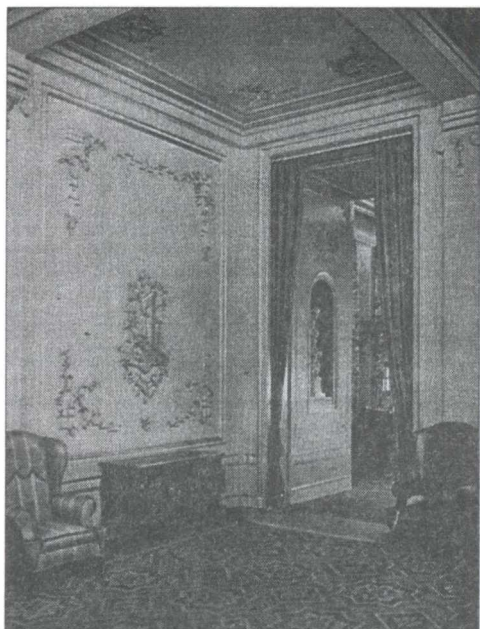
*Figure 14. „Columbus” — a transatlantic ship*

The third big shipyard in Gdansk was created in 1890 as a branch of the Elbing Schichau Plant. It was built on the left bank of the Dead Vistula, below the Emperor's Shipyard (the areas of both those shipyards today belong to the Gdansk Shipyard). The Schichau shipyard soon became the biggest one in Gdansk and one of the biggest in the whole Germany. Since 1866 it had 6 slipways between 120–250m long. In 1899 it had 215 cranes, including the hammer crane of 250 tons hoisting capacity, and a floating crane of 100 tons hoisting capacity.

Already the first vessel — cruiser corvette „Gefion”, built in 1893, was an unusual one. It could sail 6.5 000 miles (12 000 km) without refilling fuel. The „Nowik” ship built in 1900 for Russia, of 3 000 tons displacement and 18 000 HP of engine power, could sail at a speed of 26 knots (48 km/h), and was at that time the fastest cruiser in the world. Still faster were the torpedo boats built in Elbing, which could sail at 37 knots (68km/h). Yet the biggest war ship in the history of the shipyard was the 31 000 tons displacement cruiser „Graf Spee”, launched in 1917, yet never finished. Among the passenger ships the biggest ones were:

- built in 1909 a transatlantic liner „Cincinatti” (27500t displacement, 4000 passengers), launched in 1913 „Columbus” (after the war given over to Great Britain, where it sailed under the name „Homeric”) and
- launched in 1922 another „Columbus” (displacement of both 42000t each, engine power 32000HP, 1800 passengers).

Special attention should be paid to the dredgers. The first one was built in 1903, had the capacity of 5000 m<sup>3</sup> per hour, and the depth of work up to 23 m, and the



*Figure 15. The representative hall of the „Columbus”*



*Figure 16. „Baden” — an armoured ship from 1916.*

others were sand pump dredgers, introduced in 1904. In total the Schichau shipyard in Gdansk built 37 war ships and 44 ships in the years 1893–1919. Additional civil vessels production included: ship engines (among which since 1926 there were two — stroke combustion engines „Schichau–Sulzer”), steam turbines, locomotives, water turbines and various steel constructions. The 1929–33 crisis was overcome with the help of the state and by restructuring of the plant. During the 2nd world war the shipyard came back to the production of ships, mainly submarines. 94 of them were finished, 603 were under construction.

**Translation:** Anna Kucharska

