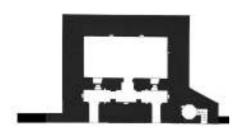


WMF is a section of the Simon Stevin Centrum Edition 1 of 2014 Composed by Frank PHILIPPART

ATLANTIKWALL

Bunker found in Nieuwpoort (BE)



A German bunker was found next to the Albert I monument near the locks of the Yzer river at the beginning of the year. Locals already knew about the bunker for a long time because the roof was just visible.

It's a crew bunker, a Regelbau 656. Although there are no doors or other metal parts in it, the inscriptions are well preserved. Inside there are a lot of technical texts like "Kein licht bei geöffneter Scharte". At the entrance you have a nice bunker number:

Ost-W 019-252.

Strongpoint Ost-W 019 was called Tilly II.

Just after the war a few modifications have been done to the bunker to fit in a re-use plan.

The photos are from Mrs Vieren from "Onroerend Erfgoed West-Vlaanderen"





The submarine base at St Nazaire (FR)

St Nazaire is a city with a port in the French department Loire-Atlantique at the Loire estuary. The city counted in 2011 67097 inhabitants.

The attraction of the city is for sure the huge German built submarine bunker.

Just after the liberation the French Navy dismantled lots of equipment for the submarine base in Lorient and in 1946 they abandoned the bunker. Some docks were filled up again a half of the bunker is in use by factories of soy and phosphates. From 1998 the city started a project to unlock the bunker for the tourists. In this part of the bunker you find a museum about the ocean going vessels, a café and a souvenir shop. In this part you can walk around freely. It gives you the opportunity to sense and feel the huge construction and you imagine easily the scenes from the movie Das Boot.

How did it begin?



WMF is a section of the Simon Stevin Centrum Edition 1 of 2014 Composed by Frank PHILIPPART



There were 5 bases in France (Brest, St Nazaire, Lorient, La Pallice (La Rochelle) and Bordeaux) and 2 in Norway.

In July 1940 Lorient was the primary base for U-Boats, but from September on Brest and St Nazaire became secondary bases.

The first meetings with Fritz Todt took place in Lorient about the building of U-Boat bunkers. Brest and Lorient would have 12 places for U-Boats and St Nazaire 11.

The first measurements for the construction of a bunker for 7 boats in St Nazaire started in December 1940. The wharf started on February 1941 and the first bunker for 3 docks (6, 7 and 8) for 1 boat were ready after 5 months and it was inaugurated in June 1941 with Vice-Admiral Karl Dönitz and Dr Fritz Todt. The roof and the walls were 3.5 m thick.

They continued building and at the end of August 1941 the next part was ready with 4 double docks, being 9, 10, 11 and 12.

Meanwhile the Organisation Todt received the order to increase the number of places for U-Boats. Brest had to shelter 20 boats, Lorient 28 and St Nazaire 20. Moreover two new bases had to be built, La Rochelle for 9 boats and Bordeaux for 15 boats.

From August on the enlargement started with the construction of 5 single docks to the north and 2 double ones to the south. The latter, 13 and 14, for a floating dock were ready in January 1942. Docks 1 to 5 were ready in June 1942. That made that the capacity of the base was 20 U-Boats from mid 1942 on.

To summarize, there were 8 single docks (1-8) which are 91 m long and 11 m wide. They have a floating door to close the dock to make a dry dock of it. 6 Docks (9-14) were double, 17 m wide and 89 m long. These ones can't be emptied, they are used for departures and arrivals. Each dock has a roller bridge and in 1942 they received a second one.





WMF is a section of the Simon Stevin Centrum Edition 1 of 2014 Composed by Frank PHILIPPART



Behind the dock the workshops were spread over three floors and a railroad crossed the bunker over its total width. The entrances were protected by huge armored doors of 65 cm thick with a weight of 20 tons. There were also two areas with two floors with storerooms and offices. They were located between the docks 12 and 13 and between 5 and 6.

Midway through 1943 they started to build the northern annex for the defense of the bunker. The construction of a similar building at the other side started in 1944 but it was never finished and was destroyed after the war.



Concerning the services in the bunker, about 60 workshops were spread over three floors, carpenter, armory, fridges, optical equipment, engine rooms, pharmacy, dentist, toilets, showers,... Next to the workshops the bunker counted about 150 offices as well!

The base had two power centers with a total of 4 diesel engines of 1200 HP. Each power center had also two emergency engines.

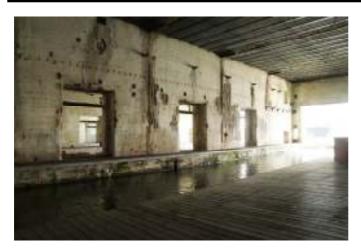
Annex North housed the bakery and two kitchens, for the troops and for the hospital.

It contained also the food supplies and the fuel for the U-Boats which were stored in 6 tanks with a total capacity of 1000 m³. The accommodation of the employees was also located here.

The entire U-Boat bunker is 299 m long, 124 m wide and 18 m high with a surface of 39000 m².



WMF is a section of the Simon Stevin Centrum Edition 1 of 2014 Composed by Frank PHILIPPART





Let's spend some time to the roof.

The first roof for all the 14 dock was 3.5 m thick (Building-strength A). This could resist bombs up to 1 tons.

From 1942 on a second layer of concrete of 35 cm, made from granite was poured to avoid the case that two bombs would hit the roof at exactly the same place. (This happened during the bombardment of 28 June 1943) But during August 1942 the Germans discovered that the British have developed bombs of 3.5 tons. That made that they reinforced the roof again with a layer of 1.7 m thick over about 90% of the surface of the bunker. This huge layer would become too heavy so they poured it in a slight edge so that there was an empty space between the existing and the new layer. The new layer rested on the walls between the docks.

The development of bombs continued and the allies created the famous Tallboy bomb of 5.4 tons. To protect the bunker against these giants the OT created a 4th layer with a new system called *Fangrost*. These were concrete ribs about 1.8 m about the roof. The ribs rested on walls these ribs were 1.5 m thick. Between them, there was a space of 35 cm. The idea was that this layer would catch the first shock and break the velocity of the bomb before it could cause damage to the roof. This layer was built on 1/3 of the roof. With this Fangrost layer the roof became in





This is the Fangrost layer.



WMF is a section of the Simon Stevin Centrum Edition 1 of 2014 Composed by Frank PHILIPPART

No Tallboys were dropped on St Nazaire but on Lorient, Brest and La Pallice.

The first bombardment of the RAF took place during the night of 10 to 11 March 1941 with 4 Whitley bombers. The US Airforce bombed St Nazaire for the first time on 1 Nov 1942. The base had been the target on 50 bombardments, but the huge bunker was never seriously damaged, although the allies lost 114 airplanes!

4600 people had been working on that wharf. 1502 employees of the OT and 3166 employees from different countries. They worked 24 on 24 hours with Sunday as rest day. From the moment the allies increased the bombardments, many employees didn't return and the OT replaced them with forced laborers.

The lock bunker and the nearby defense.

The Kriegsmarine decided in August 1942 to build a new sheltered lock because the submarines were too easy a target in the existing lock. The wharf started in November 1942 and it was operational in January 1944.

The lock bunker is 155 m long, 25 m wide and 14 m high. It contained also a pump station. The defense of the lock bunker consisted of a Sechsschartenturm with two machineguns and a Tobruk.

It's amazing to know that only three U-Boats used the lock!





There were also a command and a dressing station bunker, but they were demolished after the liberation.

The base was defended by a huge amount of FlaK whereby the bomber crews called St Nazaire "FlaK City".



A battery light Flak was situated on the roof of the U-Boat bunker with one emplacement on top of dock 8 for a 2 cm Flak Vierling. Two other stood at the other side and were for a 2 cm gun. Two emplacements for a 4 cm Bofors Flak stood on the lock bunker. Other Flak guns stood on open emplacements on various bunkers around the U-Boat bunker. Around the city there were 18 heavy Flak batteries, equipped with 10.5 cm guns.

The close defense of the U-Boat bunker was assured by a 5 cm M19 mortar in a bunker on the roof. Next to it there was also a Tobruk for a 81 mm mortar.



WMF is a section of the Simon Stevin Centrum Edition 1 of 2014 Composed by Frank PHILIPPART

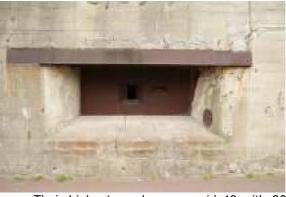


Two flotillas were based in St Nazaire, the 7th Flotilla Wegener from Kiel from Feburary 41 on and the 6th Flotilla Hundius from Danzig from February 42

The north-eastern block of the bunker was equipped with a 4.7 cm PAK 36 (t) gun and 2 machine guns on a carriage.

On top of the corner there's an armored observation copula. Still in the same north facing wall there were 11 loopholes for an individual weapon on the fourth floor and above the entrance for the train there was an embrasure for a heavy machine gun. Above the entrances of the docks there was a tunnel 17 loopholes and around the bunker the German had built a Höckerline with four rows.

Picture left. At left the embrasure for the 4.7 cm PAK 36 (t) gun, right (below) the armored plate for the machine gun. Picture down left, the observation copula under the FlaK pit.



on. Their highest number was mid 43 with 26 U-Boats. The U-Boat type of the flotillas was the type VII. The crews were housed in La Baule in hotels and requisitioned hotels.



The liberation

On the $1^{\rm st}$ of August 1944 the US troops broke through the front at Avranches and advanced

towards Brittany. Kapitän sur See Hans-Rudolf Rösing (commander of the U-Boote West) ordered the evacuation of the base for the reason that the base would have no operational meaning anymore for U-Boats if St Nazaire were to be encircled. The 6th Flotilla was dissolved and the 7th was moved to Norway. During August 1944 the US forces liberated Brittany with the exception of Brest, Lorient and St Nazaire. The German high command declared that these cities became a "Festung". A Festung meant that it was forbidden for the troops within a Festung to surrender.

The Americans had learned that losses whilst assaulting a Festung were heavy. The US forces had assaulted Brest on 19 September 1944 and has lost about 10000 soldiers, so they decided to isolate the other Festungs. That meant that they remained in German hands until 8 May 1945!



WMF is a section of the Simon Stevin Centrum Edition 1 of 2014 Composed by Frank PHILIPPART

The employees and soldiers of the base who had stayed were used to reinforce the infantry and to build reinforcements and various items in the workshops of the base going from gun carriage to beds. In fact everything that couldn't come from Germany anymore.



When you're at the roof of the lock bunker you'll see the dry dock that was built for the ocean going packet boat Normandie for maintenance.

The raid of the HMS Campbeltown

This famous dry dock was also capable of accommodating the sister ship of the battleship Bismarck, namely the Tirpitz.



The British had set up a commando raid to destroy the doors of that lock, Operation Chariot. An old destroyer loaded explosives had to ram the door. The explosives would have an igniter with a delay and would explode later. The second action of the operation was destruction of 24 other objects namely 8 locks, 4 bridges, 6 technical installations and 6 artillery positions. The assault was going to be executed by 611 men, composed of 345

sailors and officers of the Royal Navy and 257 commandos, a medical team, 3 liaison officers and 2 journalists. The fleet consisted of the old destroyer HMS Campbeltown and 18 motor boats. The Campbeltown was one of the 50 destroyers that the US Navy had given to the Royal Navy on September 2, 1940, fifty in exchange for land rights on British possessions.

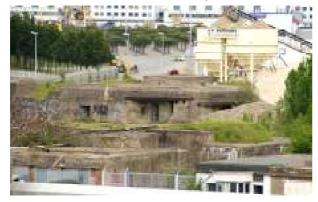
On March 28 1942, the Campbeltown rammed the lock door at 0134 Hr. The British ships reached St Nazaire unseen because they were camouflaged like German ships. The battle was hard and heavy. Only 3 motor boats were able to return to the UK. At 1135 Hr the Campbeltown exploded and destroyed everything and everyone around the lock which was disabled for years! The operation had cost the British 170 casualties and 200 prisoners.



WMF is a section of the Simon Stevin Centrum Edition 1 of 2014 Composed by Frank PHILIPPART

Seeing the plans of the area around the U-Boat base, there was quite a lot built . The question is if these constructions still exist!

From the roof of the lock bunker you can see various constructions at the other side of the dry



lock. When you arrive there you'll notice that they are all light concrete constructions used as storage or workshops. Some of them have an open emplacement of the roof for light FlaK. Although one attracts the attention, it's a Regelbau 631 for a 4.7 cm PAK 36 (t). Inside it's a 100 % classic 631 but outside two things are different. First, the typical armored plate to protect the gun is not there. When you look at the embrasure in more detail you'll notice that the installation of the armored plate was never intended. The second particularity is a

storage room behind the bunker. It must have been a part of the construction plan because the wall doesn't have parts.

On top of the bunker, there's also an emplacement for a light FlaK.





Picture at top: the 631 for a 4.7 cm PAK 36 (t). Picture above left, the armored plate for the gun. Above right: There has never been an armored plate to protect the gun, even not intended.

At the entrance of the port where the old lock is, there are two bunkers for a gun. It looks like special constructions.

For more information about the museum at the U-Boat bunker :

www.saint-nazaire-tourisme.com

tel: 33 (0) 2 28 540 640 Sous-Marin Espadon

Escal'Atlantic

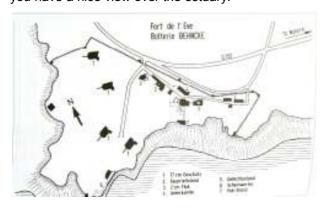
Source : Guide Souvenir. La base sous-marin de St Nazaire. Author Luc Brauer.



WMF is a section of the Simon Stevin Centrum Edition 1 of 2014 Composed by Frank PHILIPPART

MKB Behnke

This German battery of the Kriegsmarine is situated at the land point Point de l'Eve along the Route du Fort de l'Eve not that far from St Nazaire in the direction of La Baule. From this point you have a nice view over the estuary.



Picture right: Gun casemate, Regelbau, M270, with a fake roof as camouflage.

The command bunker, a M157 lies just next to the land point, now on a private property. A crew bunker, Regelbau 502 lies just behind it, also on same private property. At the beach of the little bay you see an anti-tank wall.



The purpose of the battery was to defend the approach to the port. The battery was built on a former French battery which was equipped with 194 mm guns.

The battery was called MKB Behnke and was the 3rd of MAA 280 . The site was also known as Stp Nz 305. 150 men completed the battery. The Germans installed four 17 cm SK L/40 guns on it in casemates Regelbau M270.



The land end, Pointe de l'Eve is access free, although all the bunkers are closed due to the nearby camping and habitations. Unfortunately all the bunkers received a new kind of camouflage, graffiti. One of them has still its fake roof to look like a house. At the far end of the land point you see a small bunker to house a search light. Behind the M270 casemates there are some other bunkers where under the former French fire direction post. One of them has an open emplacement for a light FlaK on the roof. (see photo at the left) In this row of bunkers there's also a small one that gives access to

a small underground that leads to a machine gun bunker. Unfortunately this one is also closed. Although you can see the machine gun bunker with its armoured plate from the land end. Another machine gun bunker, Regelbau 630, flanks the nearby bay with the anti-tank wall. The front side is a bit overgrown.

To conclude, a nice location, but it's a pity about the graffiti and that they are all closed.



WMF is a section of the Simon Stevin Centrum Edition 1 of 2014 Composed by Frank PHILIPPART





The fire direction bunker, Regelbau M157 during the war at left and right the same bunker nowadays.

SPOTLIGHT ON A MUSEUM

Musée des blindés



It has been said that it was an impressive museum and they were right. If you want to see everything in detail you have to count for sure 3 hours!

It's a collection of tanks from World-War I up to now. In a nutshell : you see the French World War I tanks and those of May-June 40 where under a nice model of the heavy Char

B1bis. For the Belgium enthusiasts, there's also a model

of the AGC1 tank whereby our army was equipped.

Photo right.

The focus lies mainly on the collection of German tanks where under the famous Tiger II and I, but also rare examples of the Brummbär with its 150 mm gun and the low Jagdpanzer IV.



automat for soda!!!

Musée des blindés 1043 route de Fontevraud 49400 Saumur museedesblindes@wanadoo.fr



Next to these there is the collection of allied tanks and lots of actual tanks of the world.

Of course there's a shop to buy books and scale models, but don't expect a café. You have to be happy with an





WMF is a section of the Simon Stevin Centrum Edition 1 of 2014 Composed by Frank PHILIPPART

www.museedesblindes.fr

tel 33 (0)2 41 83 69 95 jan-feb-mar-apr-oct-nov-dec Monday – Friday 10 AM – 5 PM Weekends and bank holidays 11am – 6 pm

May-jun-sep Every day 10am – 6 pm Jul-aug Every day 0930 – 1630 pm

Price adults 8 €, children 7-15 5 €, Permission to take pictures 5 €

BOOKS

Bunkers van de Tweede Wereldoorlog in België.

Atlantikwall

This new book will guide you along all the interesting bunker sites in Belgium.

Initially you have the history and evolution of the development of the Atlantikwall. Then more technical details are discussed like the thickness of the walls, the kind of bunkers, their function, etc.

The book describes routes along the strongpoints and batteries. For each strongpoint you have a description how to get there and

a description of the site. What kind of bunkers do you see there, which unit was located there, what their armament was and what happened there.

Next to the bunkers on the coast, the bunkers in Antwerp that housed the headquarters of the Atlantikwall in Belgium are described.

Merged with the bunker routes, you'll read about the history of events that happened during 1940 -1945 in that region :

- Operation Dynamo at Dunkirk in 1940 (the evacuation of the British and French army),
- The liberation of the coast by the Canadians.
- The evacuation of the 15th Army over the river Scheld.
- The Canadian offensive and landing in Zeeuws Vlaanderen to get from Hoofdplaat to Knokke. At the end you can look also over the borders to sites in Groede and Breskens in the Netherlands and to the French side to remarkable sites between the border and Dunkirk.

Editor: Witsand Uitgevers, Belgium

Author: Frank Philippart

ISBN : ISBN 978 94 9038 292 6

Pages: 214

Illustrations: approx 200 dutch
Price in Belgium: 19.95 EUR

For more info contact: frank.philippart@telenet.be

Thanks to Yvonne Mayo for the spell check.

