



OIL SPILL



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OIL SPILL Project

THE BALTIC CARRIER ACCIDENT IN DENMARK 2001

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Baltic Sea Region



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ABOUT THIS DOCUMENT

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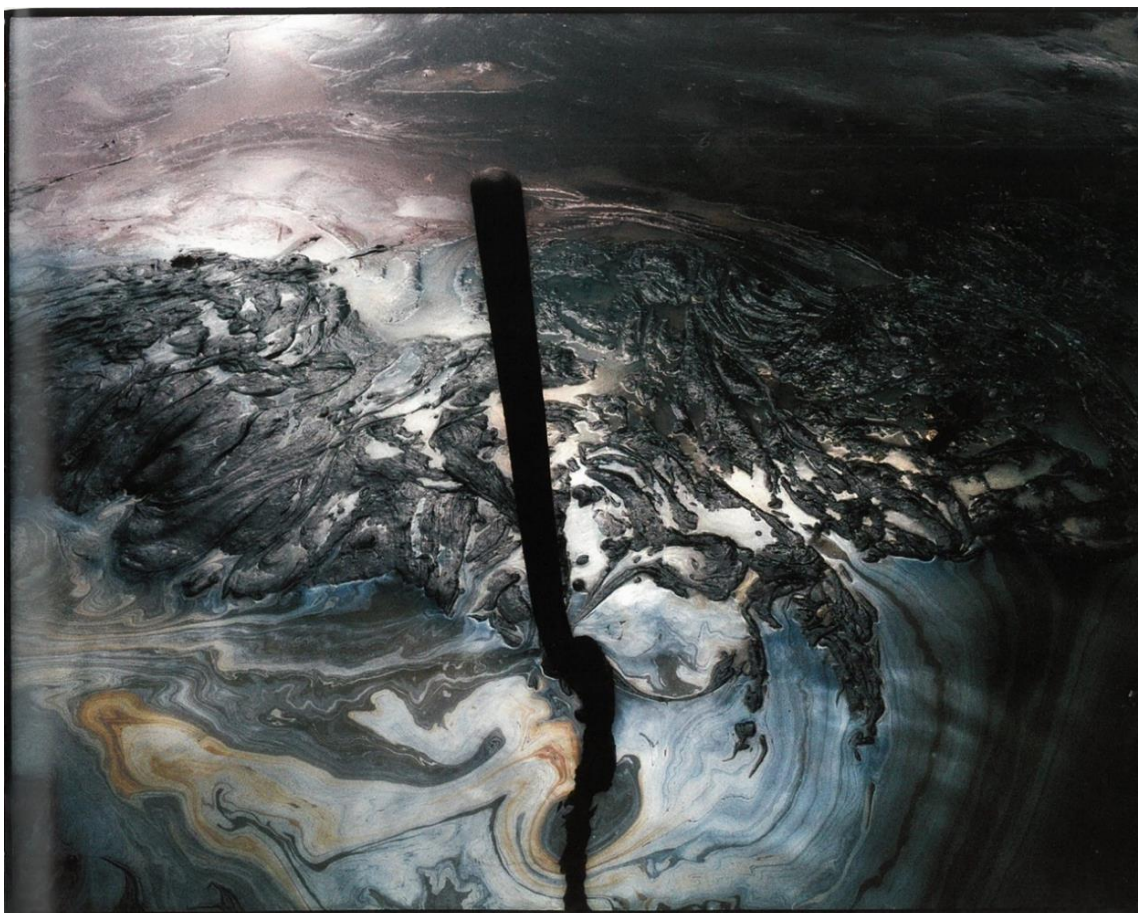
OIL SPILL PROJECT

The project *Enhancing oil spill response capability in the Baltic Sea region (OIL SPILL)* improves cross-border and cross-sectorial cooperation between and among relevant stakeholders in oil spill response in shallow waters and coastal areas in the Baltic Sea Region (BSR).

The overall goal is to strengthen oil spill response capability at all levels: key responsible ministries, operative competent authorities, key non-governmental organizations, relevant universities, and the petrochemical industry.

13 Partner organizations from six BSR countries form the OIL SPILL consortium. Their core activities include joint tabletop, simulator, and live field exercises, the sharing of knowledge, and the dissemination of best practices.

OIL SPILL budget is 2.0 M €, and the Project is co-funded by the EU’s Interreg Baltic Sea Region programme. The Project is in operation in 2019–2021.



TAO LYTZEN (2001). OLIE – ET FOTOGRAFISK ESSAY OM OLIEKATASTROFEN PÅ SYDHAUSØERNE, ERGO.

1. INTRODUCTION

On the 29th of March 2001 at 00.20 o'clock, the Admiral Danish Fleet (ADF) received an alarm stating that the oil tanker 'Baltic Carrier' and the freight ship 'Tern' had collided south of Falster, Denmark. Shortly after, the report included oil leaking from 'Baltic Carrier', which had a total of 33,000 tonnes of heavy fuel oil in the cargo. And thus, the great operation had begun.

In this document, we will dive into the details of the operation of the 'Baltic Carrier'. You will get to know more about the challenges and victories, how the many organisations managed to cooperate and collect the oil.

The text is primarily based on the Danish evaluation report created by the Danish Emergency Management Agency (DEMA) and an interview with a key person who participated in the operation, Peter Søre, Chief Fire Officer at Lolland-Falster Fire and Rescue Service.

In 2001, Søre was in the Danish Emergency Management Agency, working at the National Fire and Rescue Centre in Naestved (DEMA SJ). When the two ships collided, he was stationed at the island Faroe as incident commander for the operation on land. Søre was in charge of the coordination and logistics of all the personnel working on the shores in and around the belt of Groensund.

“The worst oil catastrophe in Danish history happened the 28th of March 2001, when 2,700 tonnes of oil leaked into the ocean by the South sea islands. The two ships Baltic Carrier and Tern had collided in the Kadetrende, the western entry to the Baltic Sea. The collision and weather condition resulted in the Baltic Carrier leaking 2,700 tonnes of oil of which most were washed up on the shores of especially Moen and Bogoe.

At arrival to the coast I was first met by the stank of oil, that stung in my nose. Thereafter the unforgettable view of the tremendous amount of oil, which lay as a thick, black, liquorice-ish mass in the ocean, along the coast, and in the beach planting. The catastrophe was obvious to anyone. It was clear that a great cleaning operation was waiting up ahead, and it would take months before the cleaning was ended.

The silence and peace that normally characterised the islands were interrupted by a traffic of DEMA personnel, environment experts, volunteers, Home Guard people, police, reporters, and worried islanders. Along the coast they all worked side by side. Working by hand, shovels and spades were in many places their only tools, as the terrain was rugged, and as these tools were most careful of the nature. The sound of entrepreneur machines was heard in the background and with frequent intervals shots sounded. Merciful shots that liberated thousands of birds from sufferings, after their plumage had been smeared with oil.”

– Photographer Tao Lytzen, 2001.

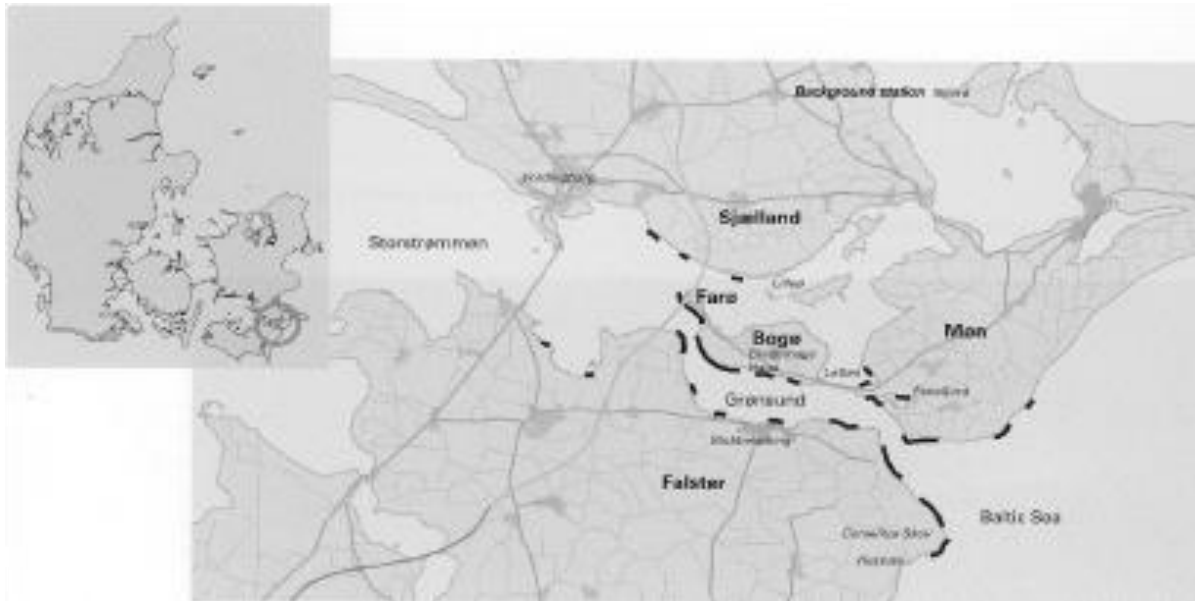
COLLISION IN THE MIDDLE OF THE NIGHT

The two ships collided in the middle of the night, and shortly after the ADF launched an operation to contain the oil. However, due to severe weather conditions it was not possible to contain the oil on open water. In the late afternoon of 29 March, the oil drifted into the belt Groensund between the islands of Moen and Falster. In total 2,700 tonnes of heavy fuel oil leaked from Baltic Carrier and about 2,350 tonnes entered Groensund. The oil hit several smaller islands and the coasts of Moen and Falster, making the operation even more difficult.

There were many actors participating in the operation. It was led by the ADF under the Danish Ministry of Defence, who by law is the responsible actor for managing oil pollution on open sea and shallow waters cf. *Danish Act for the Protection of the Marine Environment*.

As the collision happened near the German Exclusive Ecological Zone, two German environment units were sent to help, but as the oil drifted into Danish waters, the Danish authorities were in charge of the operation. Further the ADF asked Sweden for assistance, who sent an environment unit. Both Germany and Sweden provided environment surveillance planes as well.

On the national front, five municipalities and their fire and rescue services were activated as well as the County of Storstroem. DEMA and the Danish Naval Home Guard participated with both personnel and equipment and the Police helped with the coordination. Besides all the authorities, volunteers and private entrepreneurs assisted in the operation.



POLLUTED COASTLINES [M. PÉCSELI ET.AL. (2003). THE BALTIC CARRIER OIL SPILL: MONITORING AND ASSESSMENT OF PAC LEVELS IN WATER, SEDIMENT AND BIOTA.]

PHASES OF THE OPERATION

The operation can be divided into three phases: the alarm phase, the rescue operation on land and sea, and the afterward clean-up.

ALARM PHASE

In the first few hours after the initial alarm call, ADF establish a 24-hour service and activated the national marine environmental preparedness, including four oil recovery vessels from the Royal Danish Navy, the local police, municipalities and their local fire and rescue services, and DEMA.

RESCUE OPERATION

Initial response: At 00.40 o'clock the German authorities notified ADF, saying they had sent environment units to the collision site, and about 30 minutes later they notified all ship traffic in the area. The German units were the first on scene at around 2 in the morning. They began an oil collecting operation at sea but had to give up due to the weather conditions with high sea and strong wind. The first two of the Danish oil recovery vessels arrived at 11.00 and 12.00 o'clock. They tried to contain the oil with booms but had to give up as the German units. One ship tried to stop the oil from drifting into Groensund but due to the amount and type of oil the ship's engine cut out.

Response on sea: As the operations to contain and collect the oil near the Baltic Carrier failed during 29 March the various units set up oil booms as barrages in the harbours and other areas which were threatened to be hit by the oil. On 30 March they could start collecting the oil in Groensund, where it lay in big pools near the coasts. In total 1,100 tonnes of oil were collected at open water by Danish, German, and Swedish environment units in the period from 29 March until 10 April.

Response in shallow waters: With the high viscosity the heavy fuel oil had the texture of liquid asphalt making most of the equipment not applicable, including skimmers normally used in shallow waters. Instead private entrepreneurs were hired to grab or shovel the oil up with diggers. At the same time smaller booms were used to drag the oil to the diggers and to avoid it to drift into clean areas. However, it was not possible to use the diggers in all contaminated areas, as there were no roads, or the ground was too soft. In these areas the oil had to be removed manually. In total 2,800 tonnes of oil and oil contaminated materials were collected in shallow waters during the operation.

“I had around 350 people working when we peaked,” says Peter Sjøe. “Most of them from DEMA, both conscripts and officers, but also from the Danish Home Guard, volunteers and private entrepreneurs... They worked ten to twelve hours a day in all types of weather”.

CLEAN-UP ON COASTAL AREAS

In most of the coastal areas the actual clean-up did not start until 11 April, as the oil in the shallow waters had to be removed beforehand. In the first days from the 11th the main task for the municipalities included cleaning, surveillance of the shores and taking calls from civilians who had observed more oil.

The clean-up operation was done manually in many areas, some places with help from local entrepreneurs. The cleaning was carried out by the municipalities' Technical and Environmental administration units, local fire and rescue service's volunteers, local entrepreneurs, private persons, and several private organisations. Greenpeace also sent a ship to the area and participated in the clean-up at the island Malurtholm. In total, around 10,750 tonnes of oil and oil contaminated material were collected until the end of July 2001.



THE BALTIC CARRIER AFTER THE ACCIDENT [DEMA, DEVELOPMENT UNIT (2001). BEKÆMPELSE AF OLIEFORURENINGEN EFTER “BALTIC CARRIER” – EN TVÆRGÅENDE EVALUERING OG ERFARINGSOPSAMLING]

THE USE OF VOLUNTEERS

The fire and rescue service volunteers that participated in the operation came from municipalities all around Denmark – some travelled almost 400 km just to help.

“During the 1990’s many of the local fire and rescue services had shot down their volunteer units along with the war preparedness after the fall of the Berlin Wall. So, there weren’t many volunteers to draw upon in the area” – Peter Søre.

The volunteers had the same education as the firefighters and could therefore easily join the clean-up operation on shore. Other organised volunteers who participated came from the Army Home Guard and Police Home Guard. At sea, the volunteers primarily consisted of the Naval Home Guard who assisted the Navy.

Spontaneous volunteers from far and wide wanted to help in the cleaning operation. However, there were several issues related to this as Peter Søre explains:

“We had strict rules regarding personal hygiene, as the oil could pose a health risk if it got in contact with the skin or were ingested. So, they need instructions and personal protection equipment. It was also an issue to ensure that the spontaneous volunteers could work together in teams under a type of management they were not used to. A third problem was lodging of the volunteers. And the fourth issue was planning and logistics. It wasn’t sure that spontaneous volunteers would show up the next day or the day after, when they had been doing physically hard work for twelve hours straight. So, all spontaneous volunteers were sent away, as we did not have the resources to educate and manage them. And there was the question of insurance. We underlined that it wasn’t because we couldn’t use their help, we just didn’t have the resources.”

The spontaneous volunteers had a high commitment and a will to participate in the long, hard, and filthy work, but unfortunately, they were not allowed to help as it was too big a task for the authorities to handle. Instead the organised volunteers and authorities worked tirelessly for days and months, from early morning to late evening to contain and collect the oil from the greatest oil spill in Danish history.



TAO LYTZEN (2001). OLIE – ET FOTOGRAFISK ESSAY OM OLIEKATASTROFEN PÅ SYDHAVSØERNE, ERGO.

2. HOW DOES THE TUBE FIT?

“THE OIL WAS THICK LIKE TAR”

It was not easy to remove the 2,350 tonnes of heavy fuel oil from the sea, shallow waters, or shores. Peter Søre describes the oil thick like tar so that you could almost walk on it. Many people and an enormous number of wellingtons, waders, and shovels were needed in the operation.

In 2001, the national maritime environmental response in Denmark was comprised of the Navy, DEMA and the Naval Home Guard. These three institutions were to handle all oil spills up to 5,000 tonnes at sea and in shallow waters and be able to collect 2,000 tonnes of oil in the first three days following the HELCOM recommendations (Danish Navy, 2008, p.5). However, the equipment in possession was only meant for oil that could be pumped. It turned out to be a greater issue, as they had to find other means to collect the oil.

The Danish Navy had oil recovery vessels. Two smaller ones of the sea-truck league called “Marie Miljø” and “Mette Miljø” with an operation radius of 1,000 nautical miles (DALO, 2017a) and two larger ones of the supply league called “Gunnar Thorsen” and “Gunnar Seidenfaden” with an operation radius of 3,500 nautical miles (DALO, 2017b). All four units were deployed in the operation along with two barges and a smaller standard vessel. The Naval Home Guard assisted with several smaller boats. DEMA had several skimmers that were initially used but failed to work due to the viscosity of the oil.

As the German and Danish environment units were not able to collect the oil around the Baltic Carrier, it drifted into the Belt of Groensund during the evening on 29 March. The next morning, it lay in pools on both the north and south side of the belt. Moreover, it had entered the shores and harbours in several places and spread over a distance of about 20 km along the belt. The most afflicted areas were Haarboelle Harbour, Bredemølle Hage, and the bay between Farø and Bogø.

PROBLEM-SOLVING

Very quickly the operation's commanders learned that a great part of their existing equipment was useless for collecting the oil on the sea and in shallow waters. To solve the problem, they had to think out of the box – and fast. The final solution was to engage private companies who owned diggers. These could grab or shovel up the oil in shallow waters, where the Navy's units could not reach. Along with this, oil booms were placed to contain the oil in the areas that were already contaminated and to drag the oil closer to the diggers. At some of the incident sites, there were no roads, or the foundation was very soft. In these places, it was not possible to use diggers or similar equipment. The personnel had to clean these areas manually with shovels. At one site, a digger got stuck in the sand and was flooded when the tide came in, as it had not been possible to get it out in time.

WHERE TO PUT THE OIL?

As the oil collection operation proceeded, another issue occurred regarding the storage, transportation, and disposal of the collected oil and all the oil-contaminated materials. The Navy had a total storage of 2,000 tonnes on barges and ships. But with almost 4,000 tonnes of oil and contaminated materials, it was far too little. Three barges were chartered along with two industrial beet barrels.

To move the oil from the barges to containers, it had to be heated to 80 degrees Celsius. To do so, a private entrepreneur was hired as none of the authorities had the equipment to do it on such scale. The containers were used as temporary storage before being transported to three different destruction companies in Denmark. However, the companies did not have the capacity to receive all the oil as quickly as it was collected. By end-June, over 2,000 tonnes of oil were still stored in a barge and the industrial beet barrels.

As an extra effort to collect all the oil from the accident, large containers were placed along the beaches after the official clean-up had ended. These containers were meant for civilians to use if they found oil remains on the beaches as more oil would wash up on the shores in the following period – either from the sea or as the oil that had been pushed into the sand by the heavy machines. The municipalities emptied the containers continuously, and the oil was transported to one of the destruction companies.

The part from the operation that made the greatest impression on Peter Sjøe, was the use of private entrepreneurs. And not just the fact that they were used, but also the difficulties it entailed:

“The first thing I did when I became Chief Fire Officer about a year after the incident, was to make a contract with a private company that handles entrepreneurs. Because I must admit that I didn't know a thing about how to do it. But at the time of the incident, I had to do it anyway. And due to the lack of knowledge about handling private entrepreneurs, we had a lot of problems with some of them. For instance, several provided us with the eldest containers that were full of holes. So, we had to use a lot of time to insulate them. Another problem was that the different entrepreneurs wouldn't carry the other's containers when the oil had to be moved to the destruction companies.”

CAN I ORDER 1,000 PAIRS OF WELLINGTONS?

One of the biggest challenges during the operation was logistics. With up to 350 people working a day, there were many logistical issues that had to be solved: catering, personal protective equipment, working tools, handwash and toilets, shelter, accommodation, and transport. At many of the incident sites, toilet and handwash facilities were not installed, so the Technical Incident Management had to ensure it was done. The incident sites closed every evening and opened again early in the morning, as it was not possible to work during the night. Most of the personnel slept at the barracks at DEMA SJ. They were transported in busses to and from the operation sites every day, which had to be well-coordinated so that all teams were distributed correctly. The teams often worked twelve hours a day, and in all types of weather, so everything had to run as smooth as possible to avoid further delays.

At DEMA SJ, the operation centre was activated to handle the enormous amount of equipment and facilities that had to be distributed to all operation sites. Due to the texture and stickiness of the oil, a large part of the equipment was considered disposable after one use. This included both personal protective equipment and cleaning equipment.

“In 2001, it was not the hand sanitizer and face mask factories that were pushed to their limits. Instead, it was wader and wellington factories,” Peter Sjøe says. “We had to look several days ahead all the time, to make sure we didn’t run out of protective equipment when we used them as much as we did.”

As presented, the Baltic Carrier operation included many logistical challenges from its beginning to the end. However, through cooperation, planning, and a lot of creative thinking, these challenges were solved.



TAO LYTZEN (2001). OLIE – ET FOTOGRAFISK ESSAY OM OLIEKATASTROFEN PÅ SYDHAVSØERNE, ERGO.

3. WHO'S IN CHARGE?

An oil spill drifting into a narrow belt will most likely not hit the shore in one place – but in several places. And that is exactly what happened when oil from the Baltic Carrier drifted into the Belt of Groensund in the evening on 29 March 2001. Because the clean-up operation spread along the many shores of different islands, incident management was crucial – and it had to be coordinated across several authorities.

INCIDENT MANAGEMENT WHO?

In the Danish Act for the Protection of the Marine Environment, the responsibility of protection and cleaning in the event of an oil spill is divided based on the normal water baseline. On the seaside, the Navy leads the operation, and on the landside, the municipality is in charge. However, the Ministry of Environment Protection must coordinate the municipalities' plans. In addition, the Minister of Defence can choose to take over the coordination or authorise the Navy or other authorities the entire coordination if an oil spill is particularly severe or extensive. The latter is what happened with the Baltic Carrier oil spill.

Incident management can be divided into two levels: operational and tactical. The operational incident management (OIM) was led by the Admiral Danish Fleet (ADF) from the operation centre at the police station in Stubbekoebing. Among the staff, there were the Chief in Command and officers from DEMA, the Chief Fire Officers and the environment employees of the five affected Municipalities,

the local police, a liaison officer from the On-scene Commander at Gunnar Thorson vessel, a representative from Storstroem County, and the Forest District with a game consultant.

OIM was established on 29 March, being operational from 10.00 o'clock. It was operational until 9 April at 19.00 o'clock when the operation on the sea and in shallow waters was ended. OIM oversaw the operation on the strategic and coordinating level. This included decision making regarding which areas to prioritize as well as pointing out the vulnerable areas. It was also from OIM that the part of the operation on sea, which was controlled from land, was coordinated with a liaison officer from the On-scene Commander.

The tactical incident management (TIM) was placed at the parking lot on the Faroe island. It was led by an incident commander from DEMA. TIM was established during 29 March with an ongoing supplement of staff and support functions from DEMA. From here, the operation on land was coordinated, and it was operational until 11 April.

"In TIM, our greatest job was to handle the logistics. The teams had to be divided and sent to the various cleaning sites. Besides the equipment for personal protection and cleaning, we had to ensure that there were toilets, handwash facilities, tents for shelter, and food and water at all these sites," Peter Søre says. "And all of it had to be coordinated with OIM and the operation centre at DEMA SJ."

The operation centre at DEMA SJ provided most of the equipment used on the shores and ordered by TIM.

INCIDENT MANAGEMENT HOW?

In Denmark, there had not been many large incidents during the 1990s that required coordination on different levels. After the fall of the Berlin Wall, much of the war preparedness was dissolved, and the incident command system was not used either. The management system had to be redeveloped during the Baltic Carrier incident, Peter Søre says.

"The system we had previously might have been bureaucratic, but it was a setup for solving large incidents – from the management perspective. And this system did not exist anymore. In my position at DEMA, I had received education in coordinating larger incidents – and some of my colleagues had too. However, many had not had this kind of training, and it was not offered anymore. So, the general knowledge to handle large incidents was gone."

Every evening, the staff from both OIM & TIM had a meeting in which the operation's status was mapped and the necessary steps for the next day were discussed. The discussions were based on the amount of oil collected, reconnaissance of the area, and the amount of equipment available. As the oil drifted, the scenes of the accident changed continuously. Therefore, it was these daily meetings where the operation sites were planned.

Besides the abovementioned meetings, the two staff were communicating and coordinating the response throughout the entire operation. The Terrestrial Trunked Radio (TETRA) network was not tested in Denmark before 2007. Instead, the participating authorities had their own radios, which were incompatible and could not communicate. DEMA had a short-range radio in use, but a lot of the communication was via mobile phones.

"This was a disadvantage when a message had to be delivered to multiple actors, making the communication a bit cumbersome, but in general it was efficient for the task," Peter Søre says.

A MUNICIPAL EFFORT

In the first two weeks, the Navy was in charge of the overall operation with the help from DEMA, as prescribed in the Danish Act for the Protection of the Marine Environment. Hence, the division between sea and land was not set as the normal water baseline. The operators at sea reached as far in as possible and those at the shore as far out as possible.

When the operation at the sea and in shallow waters was coming to an end, OIM and TIM were shot down. The municipalities took over the clean-up of the beaches and shores that were still affected. The transition from the state to a municipal level was smooth because the municipalities had participated as much as they could in the first phases. In each municipality, the cleaning was continuously led by the technical administrations, and the County handled the coordination between the municipalities.

It was Moen municipality that had been most affected by the oil. Therefore, after the closing of OIM and TIM, DEMA provided Moen with two professional advisers as additional support until the end of April. The other municipalities could also draw from the expertise of these advisers, but their main focus was on Moen.

The clean-up continued until summer. By the end of June 2001, almost all sites had been cleaned. The municipal workers, private entrepreneurs, and volunteers supported each other in the heavy work. After the cleaning had ended, the civilians assisted by using the containers set up along most beaches.

In the evaluation report by DEMA, a sub-conclusion states that the terms “normal water baseline” and “coastal areas” should be re-evaluated and specified. It had become very clear that these descriptions did not serve the authorities with a useful distinction between the municipalities’ and the Navy’s area of responsibility. However, generally, the result of the full operation was satisfactory.



TAO LYTZEN (2001). OLIE – ET FOTOGRAFISK ESSAY OM OLIEKATASTROFEN PÅ SYDHAVSØERNE, ERGO.

4. WHAT'S NEXT?

In the three previous chapters, the facts of the largest oil spill in Danish waters were presented. 2,700 tonnes of oil leaked from the bunker ship Baltic Carrier on 29 March 2001 near the island of Falster, Denmark. For two weeks, Danish, German, and Swedish authorities cooperated to contain and collect the oil on sea and in shallow waters. In the following months, the affected municipalities continued the cleaning operation on the shores. By the end of July 2001, a total of 10,750 tonnes of oil and oil contaminated material had been collected. But is there more to the story?

THE ENVIRONMENTAL IMPACT

Part of the area of Groensund is a Natura2000 area, with its special vegetation, marine animals, and breeding areas for wading birds. A study on the environmental impacts of the oil spill and cleaning operation concluded that there will not be irreversible damages (Storstroem County et.al, 2007).

In the years after the accident, the levels of polycyclic aromatic compounds (PACs) were measured in the water, marine animals, and plants. The levels were back to normal in almost all areas in Groensund after three years. The amount of fish had also decreased in the area. In the first 5–6 months after the accident, the fishermen did not catch any fish in the area, but after eight months, they slowly returned (Teknologiraadet, 2003, p.99).

The most significant impact on the environment was on land, especially in marshland and reed beds, where heavy machines were used to collect the oil. It led to both direct and indirect damage. The oil was pushed into the sediments, thus degrading slower and affecting the area for a longer time. It was estimated that the vegetation should be restored within 5 to 8 years.

About 1,750 birds were collected during the cleaning operation, and in the evaluation report it is estimated that up to 4,000 birds had died as a result of the oil spill. However, the environment impact study estimates that as many as 20,000 birds died. If anything about the accident can be considered lucky, it was the time of year in relation to the breeding season. Most of the birds that annually come to the area to breed had not yet arrived. Although many birds died, the overall population of breeding birds has not decreased since.

LESSONS LEARNED

The evaluation report presents three overall recommendations. The first is to create an overall plan of tasks in the operational phases and harmonize the plans at the municipality, county, and state levels. The second is to make a risk analysis of the waters around Denmark so that the type, amount, and place of equipment can be adjusted. The third recommendation is to prioritize exercises and education in handling large and long-term accidents among all operational authorities.

The Baltic Carrier accident thus has led to several changes in the Danish Maritime Environmental Response and emergency services in general. Following the first recommendation, the Danish Act for the Protection of the Marine Environment has undergone small changes, and the Guideline for Beach Clean-up was re-evaluated completely.

After a thorough risk analysis of oil spill and other pollutions in Danish waters (COWI, 2007), the Ministry of Defence made a capacity analysis of the Danish Maritime Environmental Response in 2008 (Danish Navy, 2008). As a result, DEMA purchased 18 new shallow water vessels that should all be fully operating by the end of 2020 (DEMA, 2020). In addition, the Navy's preparedness plan for pollution of the sea by oil or other hazardous materials was updated. Also, most of the municipalities updated their response plans after the incident and again in 2008 when the new Guideline for Beach Clean-up was published.

When asked, Peter Sjøe mentions the two most important lessons he learned from the oil spill: the cooperation with private entrepreneurs and the importance of ongoing evaluation.

"We must admit that the immediate impressions, experiences, and solutions during the operation were not noted down. And if you try to gather the information later on, it is already forgotten."

These two lessons can be linked as the evaluation report only describes the enthusiasm and good work of the private entrepreneurs without mentioning the problems. They were either forgotten or not known by the people creating the report. Thus, it is clear that ongoing evaluation with all relevant actors did not take place during or right after the operation.

As this blog series has presented, several major lessons were learned from the Baltic Carrier accident. Regarding the lesson of ongoing evaluation, the Danish Marine Environmental Preparedness will do better in the future. It is acknowledged that learning from the accidents enables creating better ways of cooperation, communication, and knowledge-sharing.

ONE MORE TIME?

What if the Baltic Carrier occurred again in Denmark? It is now almost 20 years since the accident, and many things have changed. The Danish Marine Environmental Preparedness has updated and exercised its plans, and new equipment has been purchased.

“We (the municipal fire and rescue services) can handle it. But it will not necessarily go better than last time. We have the experience from which we can draw now. However, other regions might not have the similar kind of experience,” says Peter Sjøe.

The four environment units used by the Navy are still the same, which means that the capacity and general functions have not changed. Thus, they should be able to handle a similar accident. Also, one small vessel has been purchased since the accident, which increases the number of the operational units in the Navy. However, the other vessels have become 20 years older and gained 20 years of wear.

In the best case, an accident like the Baltic Carrier will not happen again. To ensure that, a lot of prevention work has been done. The increased use of pilots and AIS (Automatic Identification System), for instance, decreases the risk (Rasmussen, J. S. et.al., 2003, p. 33-37). In 2006, the Danish Defence Command also launched a project called “Marine Environmental Patrol,” which encourages sailors, fishermen, surfers, and other people who use the sea to spot and report pollution at sea.

Today, the number of oil spills in Danish waters has reduced by half (Marine Environmental Patrol, 2020). However, this measure does not include accidents like the Baltic Carrier collision but concerns mostly the intended dumping of polluted water.

Have we already had “another Baltic Carrier” in Denmark? No. But there have been large oil spills. The bulk carrier Fu Shan Hai sank just off Bornholm’s coast after it collided with another ship in 2003. It was estimated that “only” 40 tonnes of the total 1,800 tonnes leaked from the ship. And in 2016, a tank on the harbour of Fredericia collapsed. The tank contained almost 4,000 tonnes of palm oil, which filled the harbour and sea.

Since the Baltic Carrier incident, ship traffic has increased but the number of oil spills in Danish waters has decreased. But even though the ratio between ships and spills is getting better, we still must be prepared. The Danish Marine Environmental Preparedness has learned a lot since the accident, and laws, procedures, and equipment have been updated. Along with the participation in the OIL SPILL project, the preparedness in both Denmark and other countries of the Baltic Sea Region will be enhanced. Still, whether we can handle another Baltic Carrier, we will not know for sure unless it happens again. In the meanwhile, it is better to be and get prepared.

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OIL SPILL

Enhancing oil spill response capability in the Baltic Sea Region

Unlike on the open sea and in international waters, combatting oil spills in shallow waters and coastal areas is often complicated. The division of tasks and responsibilities between Competent Authorities and other stakeholders, such as NGOs, is often unclear. The focus of OIL SPILL is on strengthening oil spill response capability in the Baltic Sea Region (BSR) by enhancing cooperation structures, procedures, and skills between and within the relevant stakeholders.

Fostering cooperation between competent authorities and volunteers in oil spill response

Coastal oil spill response is an arduous, long-term operation. Voluntary oil spill response capability is therefore critical in achieving optimal results and minimising environmental harm. OIL SPILL project aims to develop and promote co-operation between authorities and volunteers. Essential in optimising volunteer contribution is to establish a co-operation model for both authorities and volunteers. The OIL SPILL project aims to promote this co-operation in oil spill response.

OIL SPILL outputs

Project's overall objective is to strengthen oil spill response capability in the BSR at the levels of key responsible ministries, operative Competent Authorities, key NGOs, relevant Universities and the petrochemical industry. OIL SPILL outputs include the following:

- Identifying administrative or other procedures to improve cross-border harmonisation;
- Clarifying key legal issues at all levels (incl. ministries, Competent Authorities and NGOs);
- Building up (inter)national training schemes;
- Organising relevant training events, incl. using simulators; and
- Organising cross-border exercises.

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