



# The rescue operation in Makassar Highway accident – focus on communication



# Presentation outline

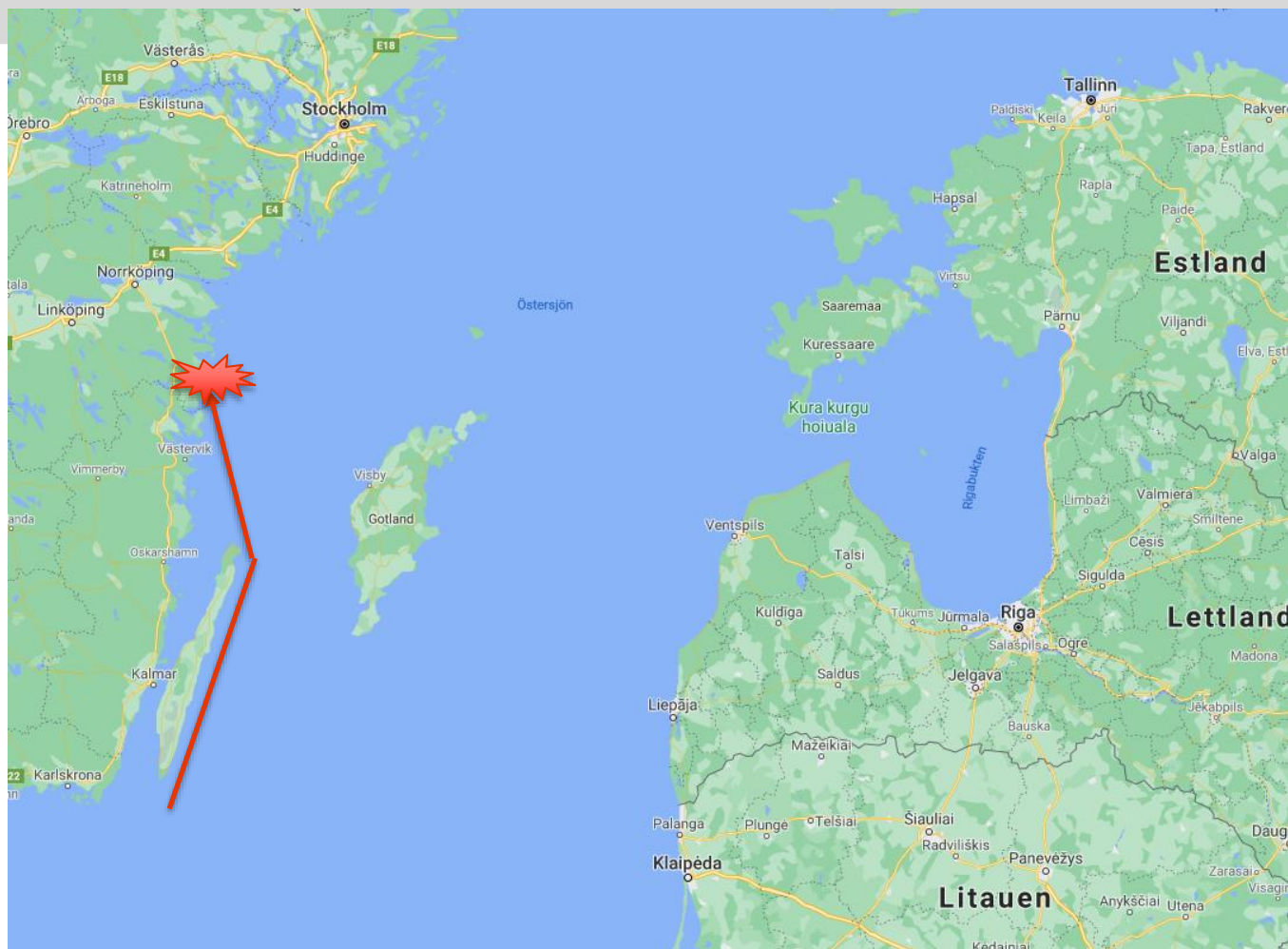
- The accident
- It's immediate consequences
- Cooperation of accident on scene between stakeholders
- Communication
- Some lessons learned



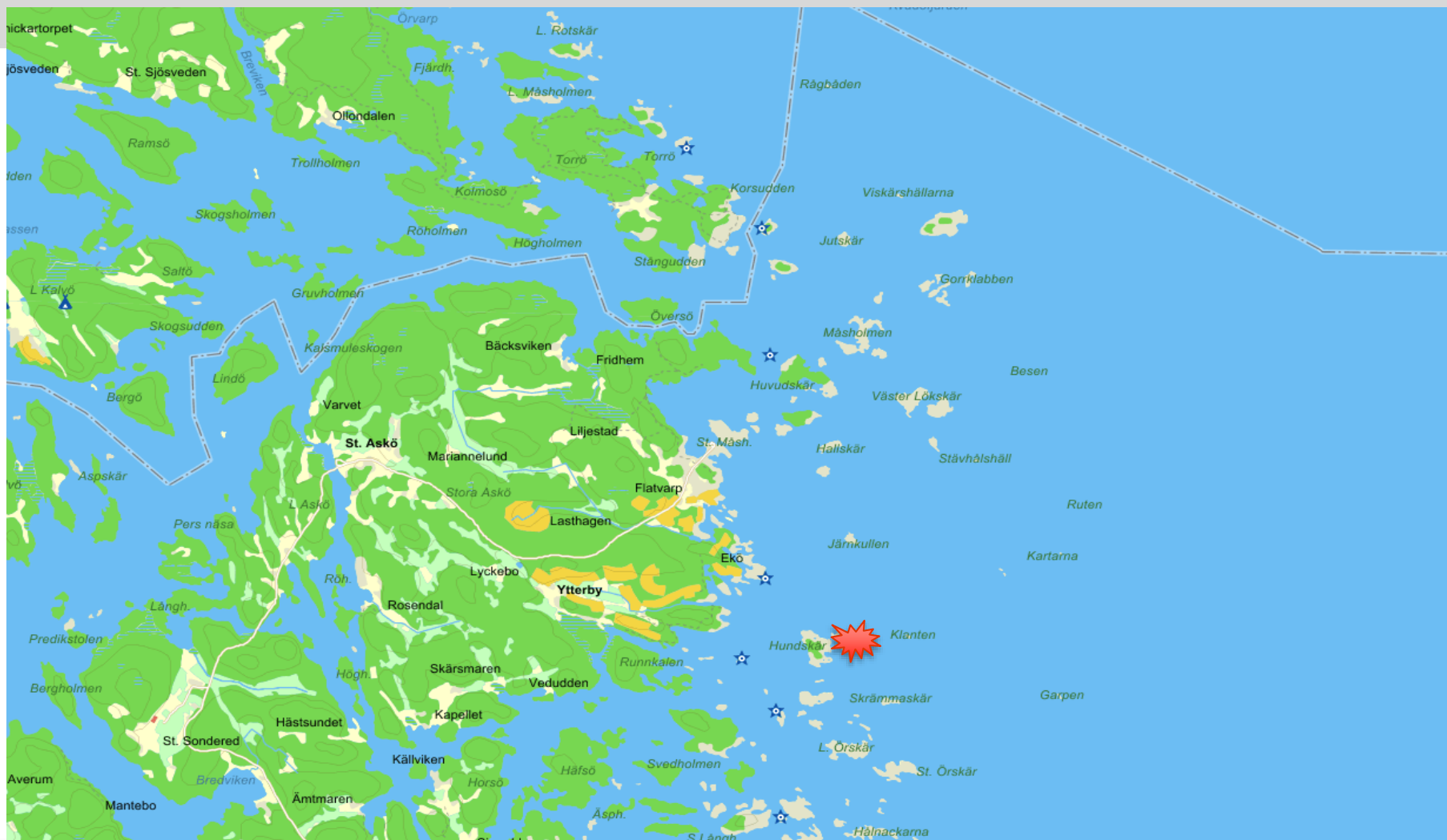
# The accident

- Makassar is on the way to Södertälje but deviates from normal course to get mobile coverage because the satellite system is out of order.
- Hits the ground outside Flatvarp on the morning of July 23 in high speed.
- About 400m<sup>3</sup> liters of oil on board.
- Carrying 1325 cars.

# Place of the accident



# Place of the accident





# First hours (coast guard)

- Coast Guard initiate staff to support the rescue leader.
- KBV305 first unit in place.
  - First status report
  - Assists the police in the investigation
  - Puts out a first boom as first preventative action
- Overview, assisted by police-helicopter because Coast Guard flight was involved in the wild fires.
- First damage reports, water penetration forepeak and bow thruster compartment, minor discharge of hydraulic oil as stopped.



# First hours (coast guard)

- KBV003 Lays out a larger boom around the entire wreck
- Agreement with Swedish Sea Rescue Society (voluntary organization) activated - booms and mapping
- Early collaboration with the Swedish Transport Agency, County Administrative Board, municipalities and the shipping company's representative and others.





## Next days (coast guard)

- Aim to have the ship emptied of oil as soon as possible.
- The rescue leader's focus was to plan and conduct a salvage plan together with the towing company, but at the same time prepare for things to get worse.
- The Coast Guard built up resources to be able to be prepared for a development in the wrong direction.



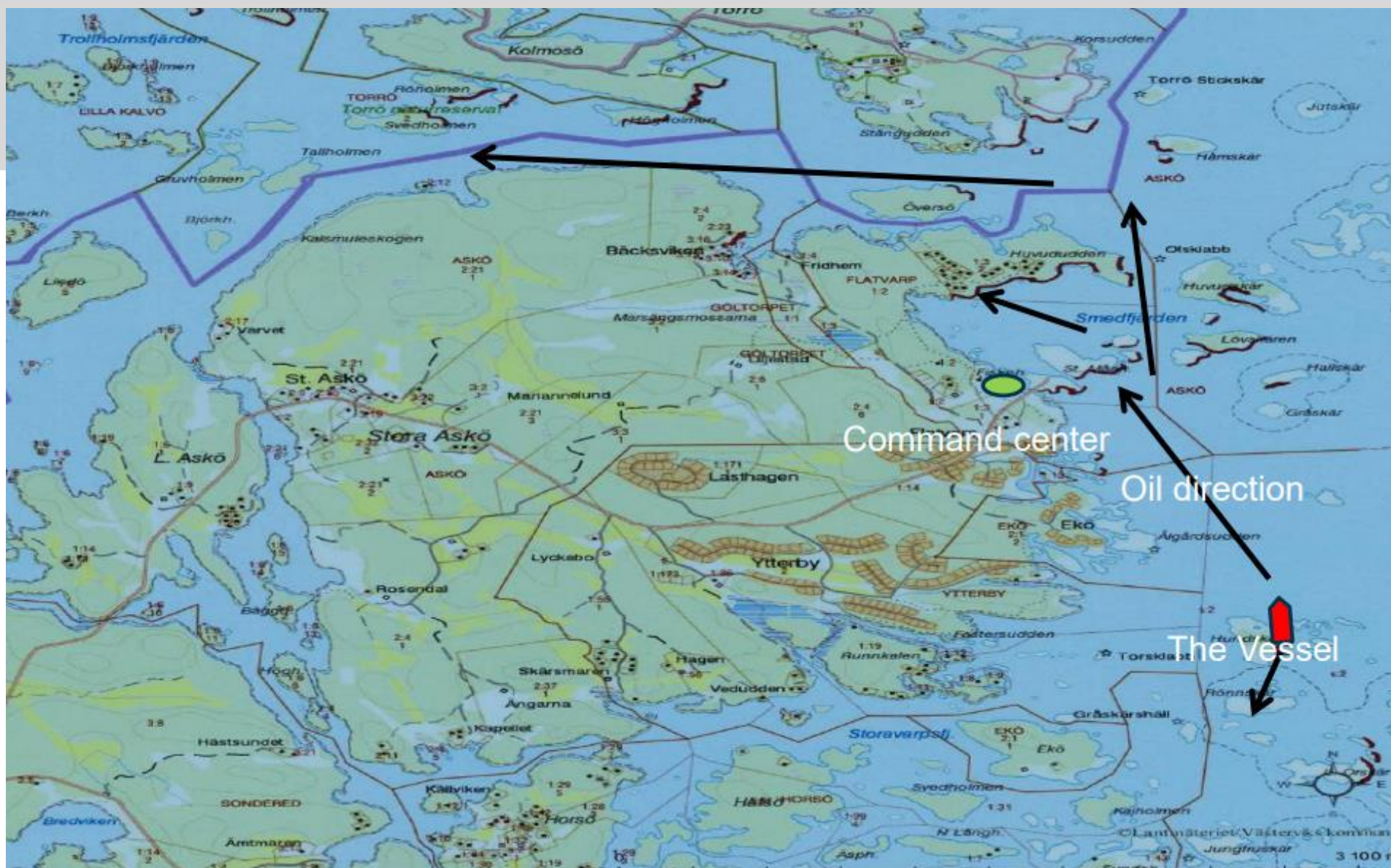




# Start leaking oil – Saturday 28<sup>th</sup> of July

- During the 5th day, the wind increased and the wreck turned about 20 degrees. An unknown amount of fuel oil leaked.
- Coast Guard's booms prevented the oil from spreading.
- A day later, the wreck slipped off the ground. The protective booms that surrounded the ship broke and the oil spill that has occurred then spread.
- Coast Guard sends out a warning/important message to the public regarding the oil spill (radio, tv, webpages, textmessage to cell-phone..).







# Direct after oil spread

- Fire and rescue services from two communities was alarmed.
- Crisis management of County Administrative Boards of Östergötland and Kalmar was activated.
- National reinforcements from Swedish Civil Contingencies Agency - booms, beach cover, personal protection equipment etc.
- Home guard mobilized for oil decontamination on shore.
- Coast Guard flight maps oil in open water and along the shoreline.



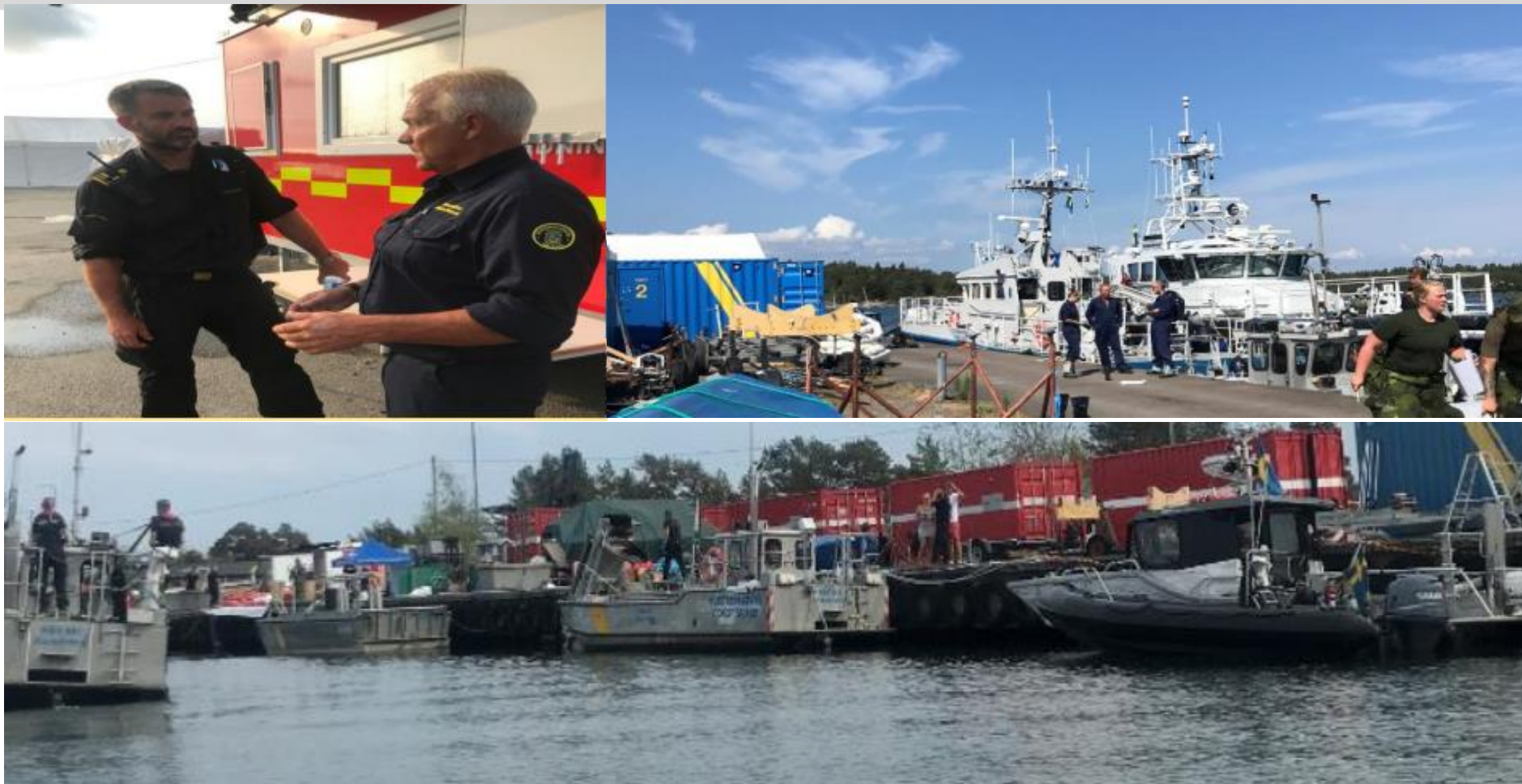


# Focal point for leading operations on shore

- Work began to establish commanders focal point and a base for the rescue operations on shore and at sea.
- Must be a place able to serve 150 people.
- Decision made it was to be at the harbour of Flatvarp.
- It's a small harbour and at the moment full of material so the first step was to clean away existing material.
- The base consists of many containers that contain protective equipment, decontamination station, boats, quad bikes, management site, etc.



# Focal point for leading operations on shore







# Focal point for leading operations on shore



# Action measurements

- High sea booms were laid out by Coast Guard, Swedish Sea Rescue Society and Fire and Rescue services
- Inventory and mapping of contaminated areas.
- Prioritization of areas and workforce. Based on where oil had contaminated and sensitive areas for wildlife
- A lot of oil is led into an already very contaminated bay.
- Oil taken up by small vessels
- Decontamination by hand.
- An external expert is hired through HaV, (Ingrid håstad).



# Action measurements







# Action measurements





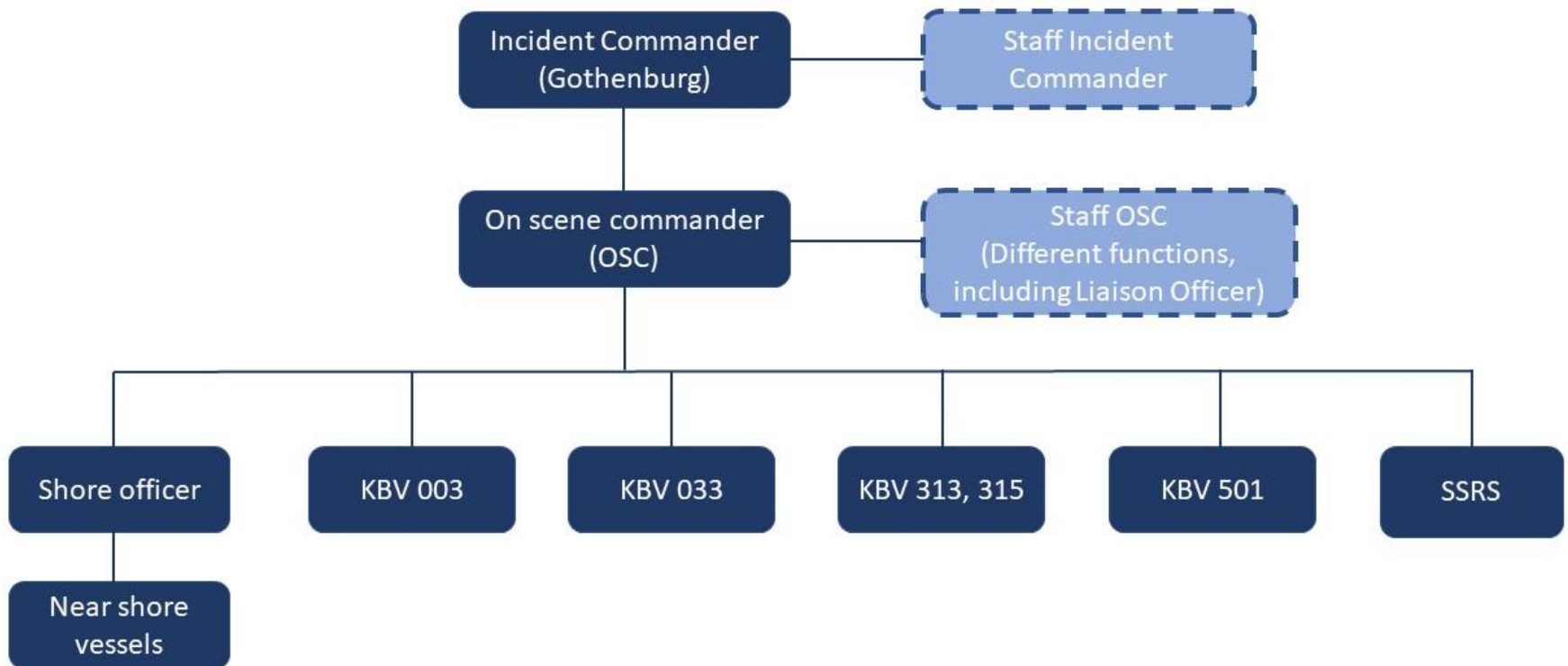
# Towing the ship

- Tuesday 31:rd the ship was towed towards the harbor of Oskarshamn.
- Risk for more oil spill along the coast
- Was a need to do it in a bit of a hurry, the damages on the ship was larger than first expected.
- Preparedness with more resources for oil spill





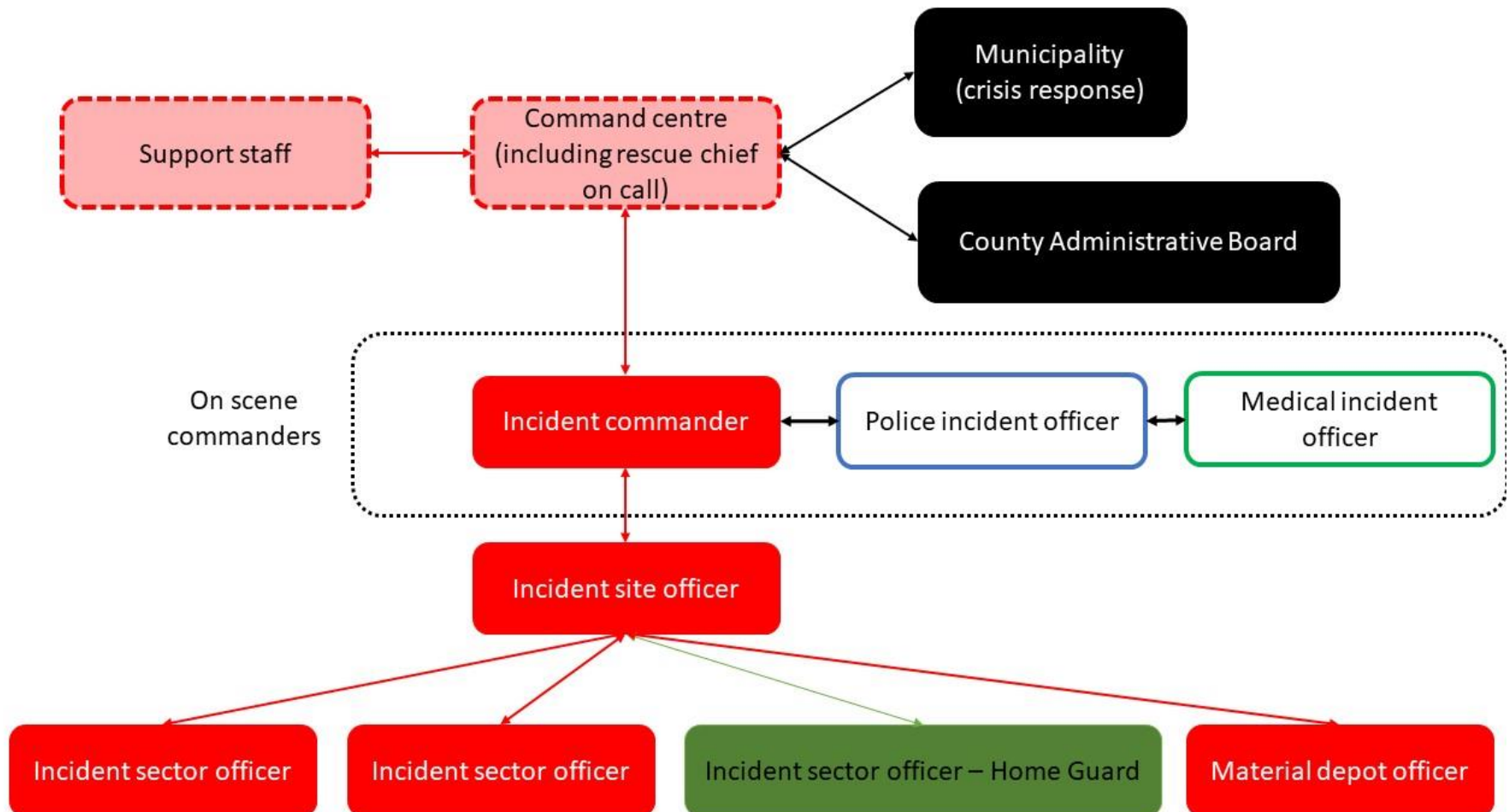
# Commanding at sea







# Commanding on land

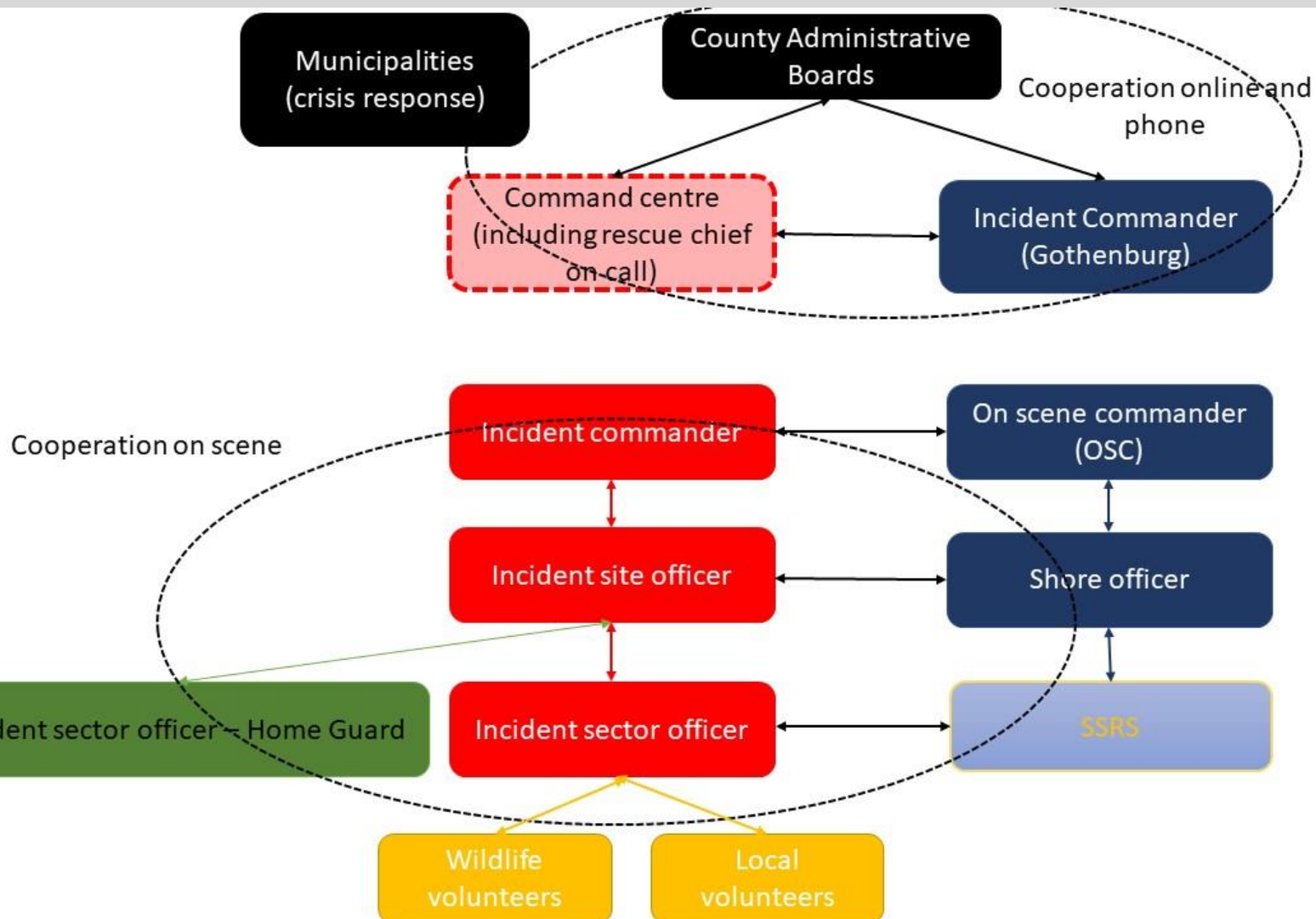


# Cooperation

- Involving 2 municipalities with 2 fire and rescue services with their geographical jurisdiction.
- 2 county administrative boards.
- Several other national authorities, such as Swedish Civil Contingencies Agency, Swedish Home Guard, Swedish Agency for Marine and Water Management and Swedish Transport Agency.
- Swedish Sea Rescue Society, Volunteer Wildlife Rescue and local volunteers.
- Makes it a challenge to coordinate and lead the incident in a efficient way at sea and land.



# Cooperation and communication





# Communication

- Between authorities at command centres – regular meetings online and on phone
- Between authorities on scene – morning and afternoon meetings.  
Phone and radio (Tetra)
- Between authorities and SSRS – Same as above, SSRS works as an authority
- Between authorities and other volunteers – face to face meetings and phone.
- Between authorities and public – warning and information messages, information through media and webpages.



# Communication – keys for success

- Regular meetings in the morning and afternoon – gives a continuity.
- A liaison between sea and land to coordinate aims, assessments and measurements – worked well.
- The same units carry out inventory of shoreline – otherwise different assessments and information – makes it hard to prioritize correct.
- Have regular cooperation meetings with volunteers.
- Important with the safety - always make sure it's communicated what safety rules apply.

# Lessons learned

- Early request for resources gives a good start.
- Cooperation on scene worked well.
- Advantage of having one focal point – what if several were needed?
- Hard task to keep water clear of leisure boats during the summer – can help the oil spread.
- The authority or unit best suited for a task should do it. Example use of local volunteers for navigating and local information of shoreline.
- Local volunteers can be subjective to priorities - wants their own shoreline to be contaminated first





# Afterwards

- 7.5 tons of oil leaked
- 14 tons of waste was collected on land
- The ship's captain was convicted of sea drunkenness and a 60-day fine.
- The Coast Guard's preliminary investigation into environmental crimes is still ongoing.
- Decided water pollution fee