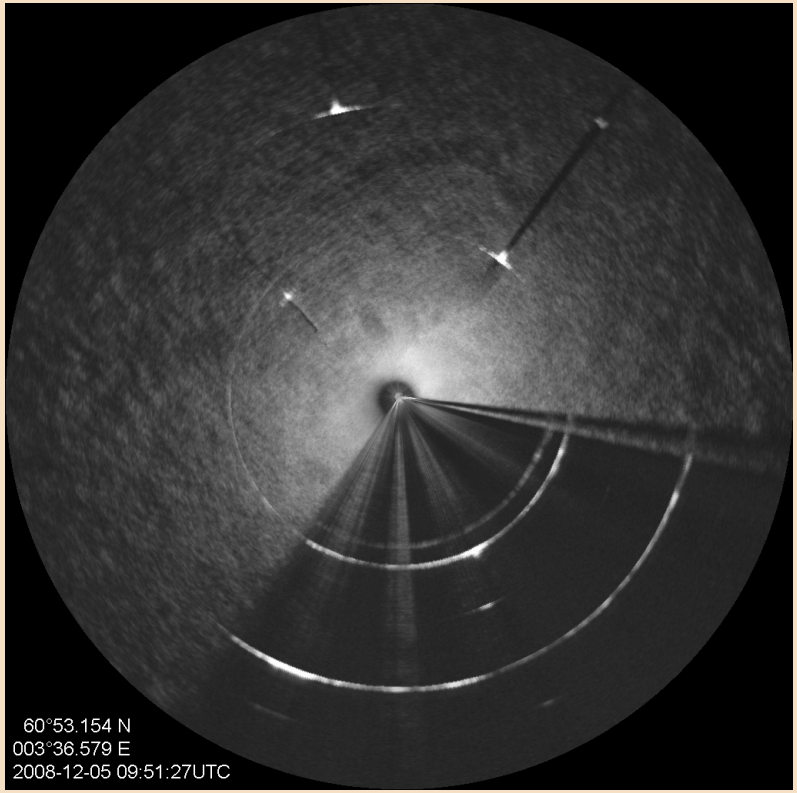
SEA DARQ
SAFER, CLEANER SEAS

Oil Spill Test
Toll C
Dec 5 2008

Oil Spill 1

1 m^3 of oil/water mixture released (250 l of oil) at 1.1-1.6 Nm

After release

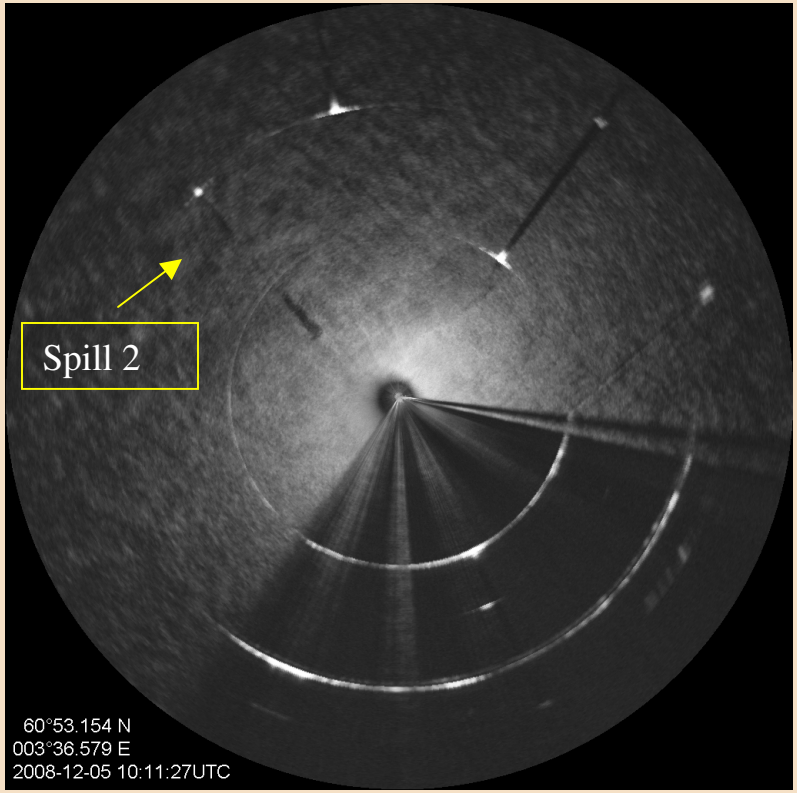


After ~ 7 min

Oil Spill 2

6 m^3 of oil/water mixture released (250 l of oil) at 2.5-3.5 Nm

After release



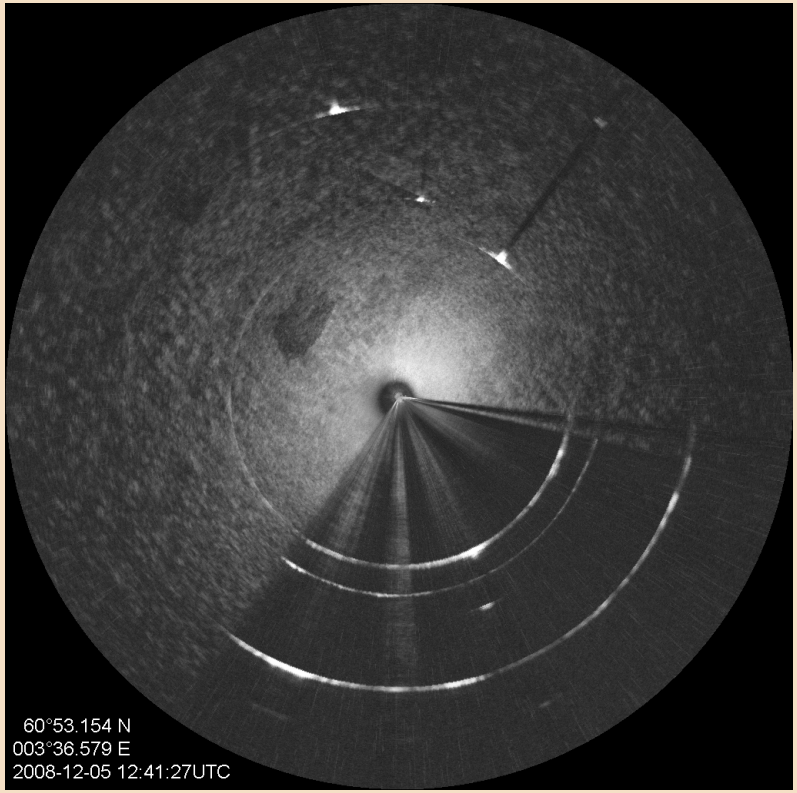
The spill is just visible near the ship

Note:
The image quality depends on
the number of processed radar images (32).
Processing more radar images will enhance the contrast.
The images are internal memory snapshots and
have a fixed contrast ratio, the screen visible to user
has contrast enhancement tools available to make the
contrast better (See Contrast enhanced Images).

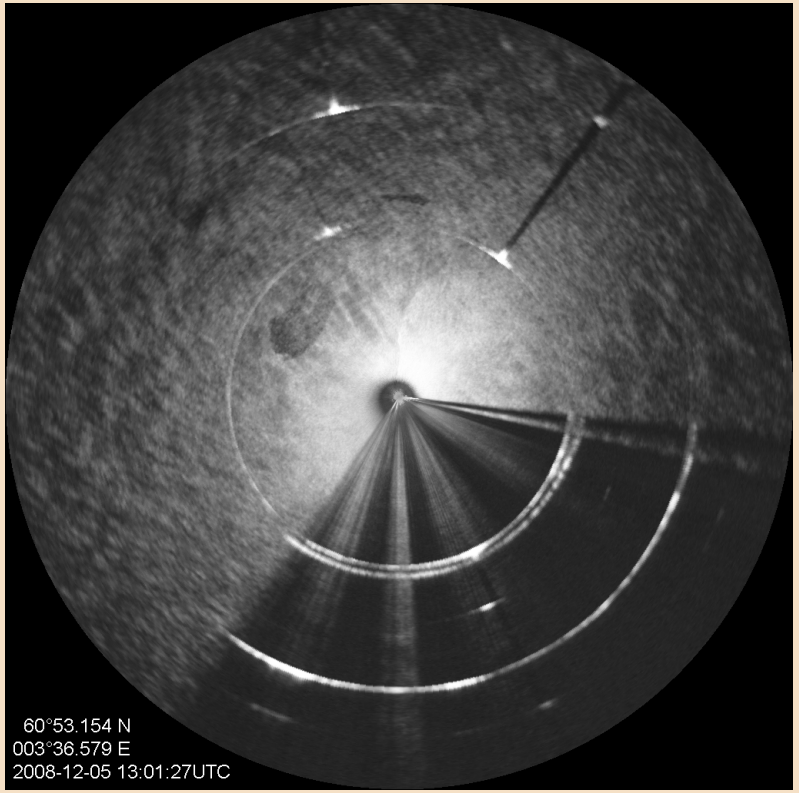
Oil Spill 3

6 m^3 of oil/water mixture released (250 l of oil) at 2-2.25 Nm

After release

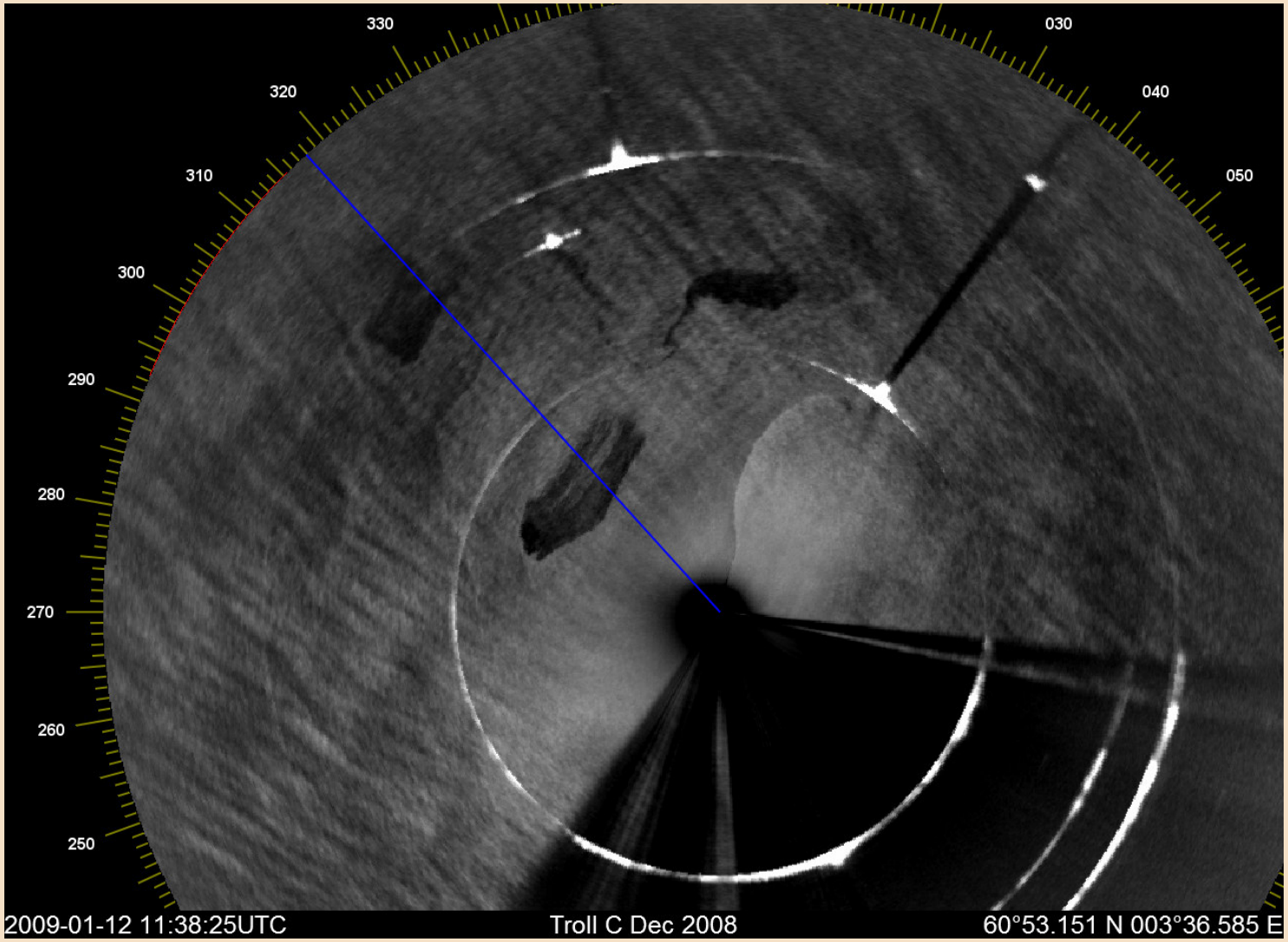


After ~15 min



Images

Contrast Enhanced



Enhanced image was obtained by reprocessing one of the recordings with a different number (128) of radar images in the radar stack.
Also the relative brightness of the image was altered with the on screen controls.

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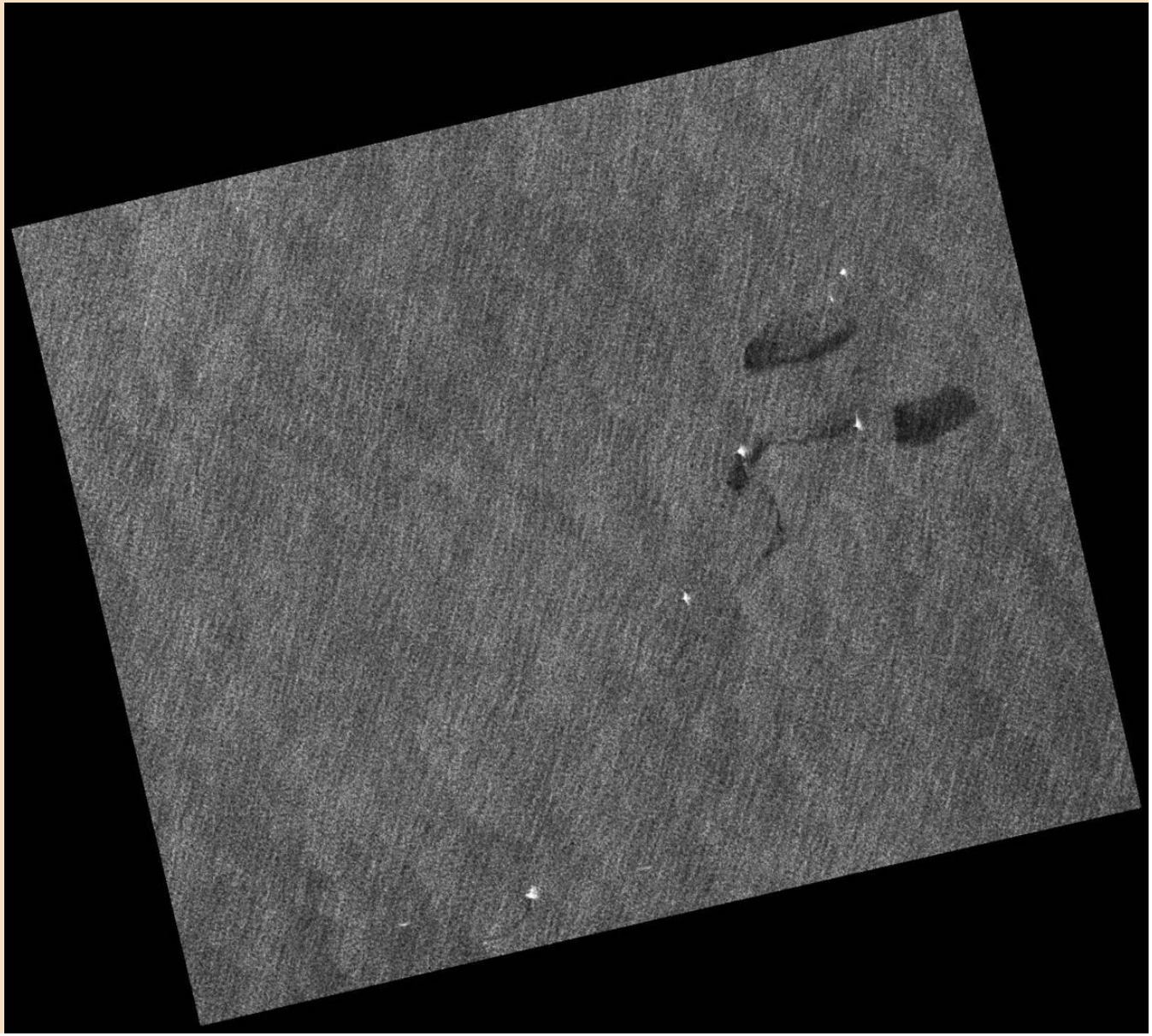
Satellite Image of Oil Spill



KSAT/StatoilHydro/NOFO

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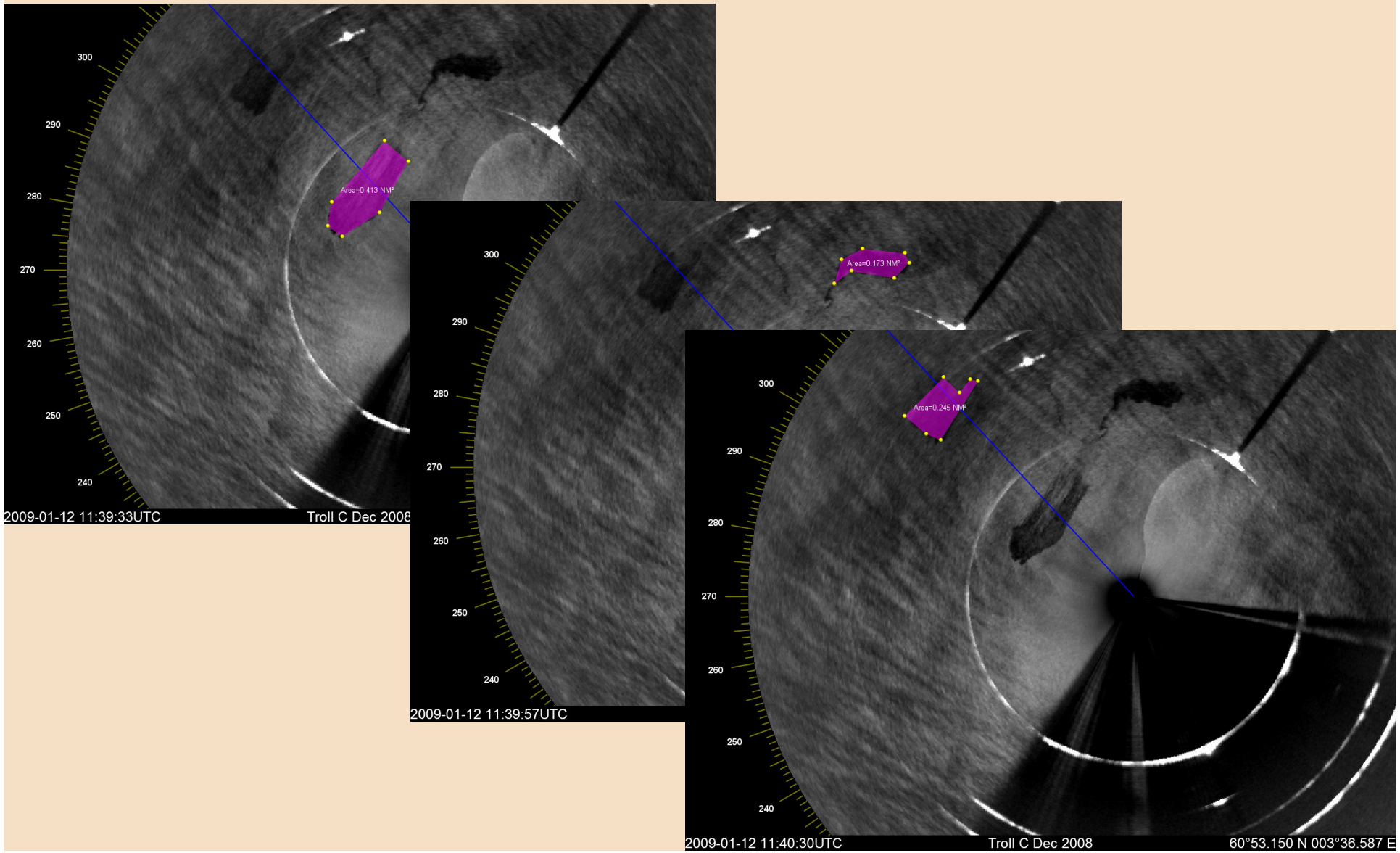
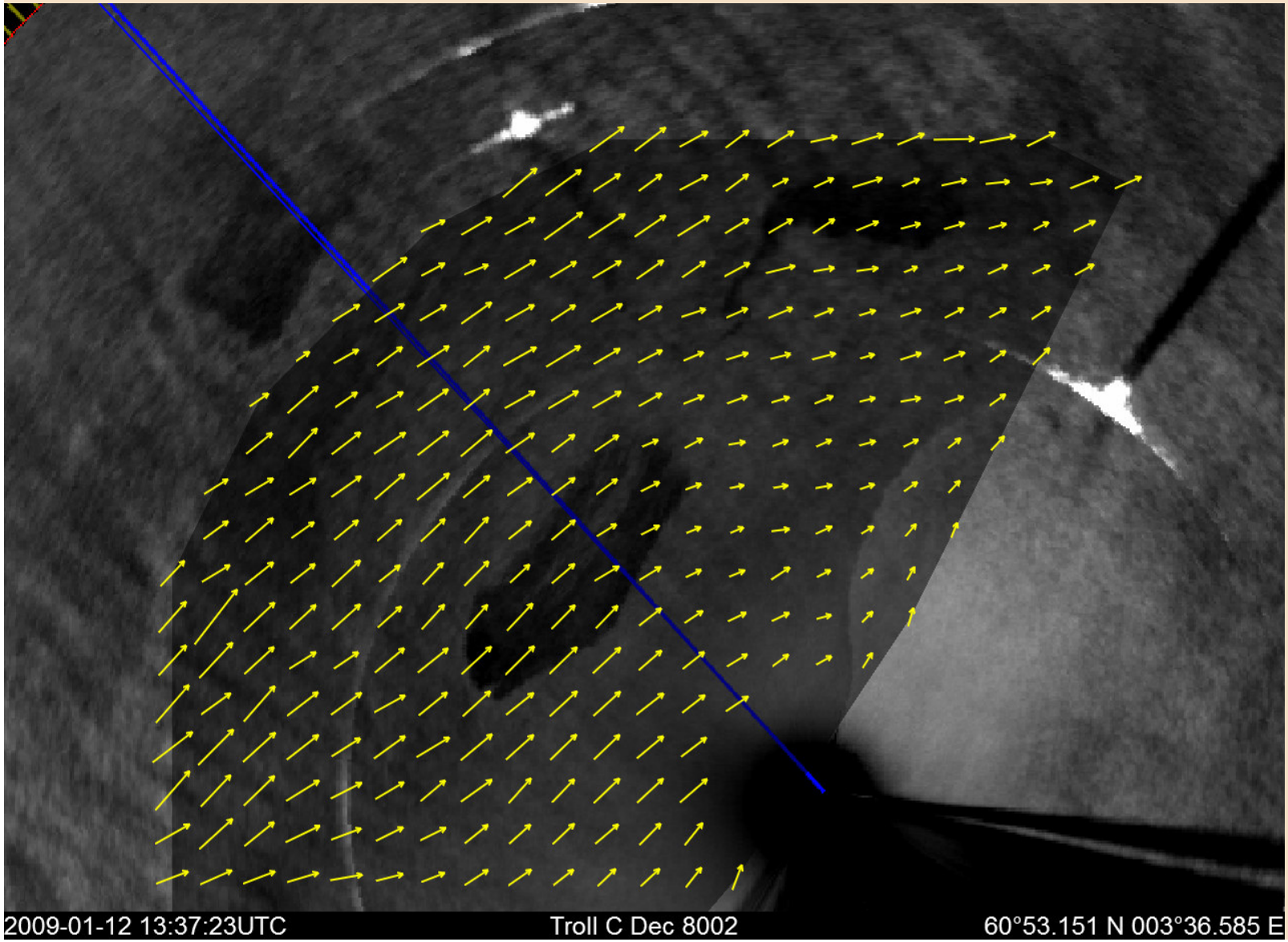
Spill Sizes



Surface Current Field



Average surface current 0.2 m/s.

The surface current field is calculated by the SeaDarQ system from the radar images.

Comments Regarding the Test

The wind speed was 3 m/s which limited the detection range to approx. 3.5 Nm.

This is as predicted by the Carpet modeling program.

As expected from previous experiments done by SeaDarQ, VV polarization gives the best results.