



Koninklijk Nederlands Instituut voor Zeeonderzoek

NIOZ and OFEG update

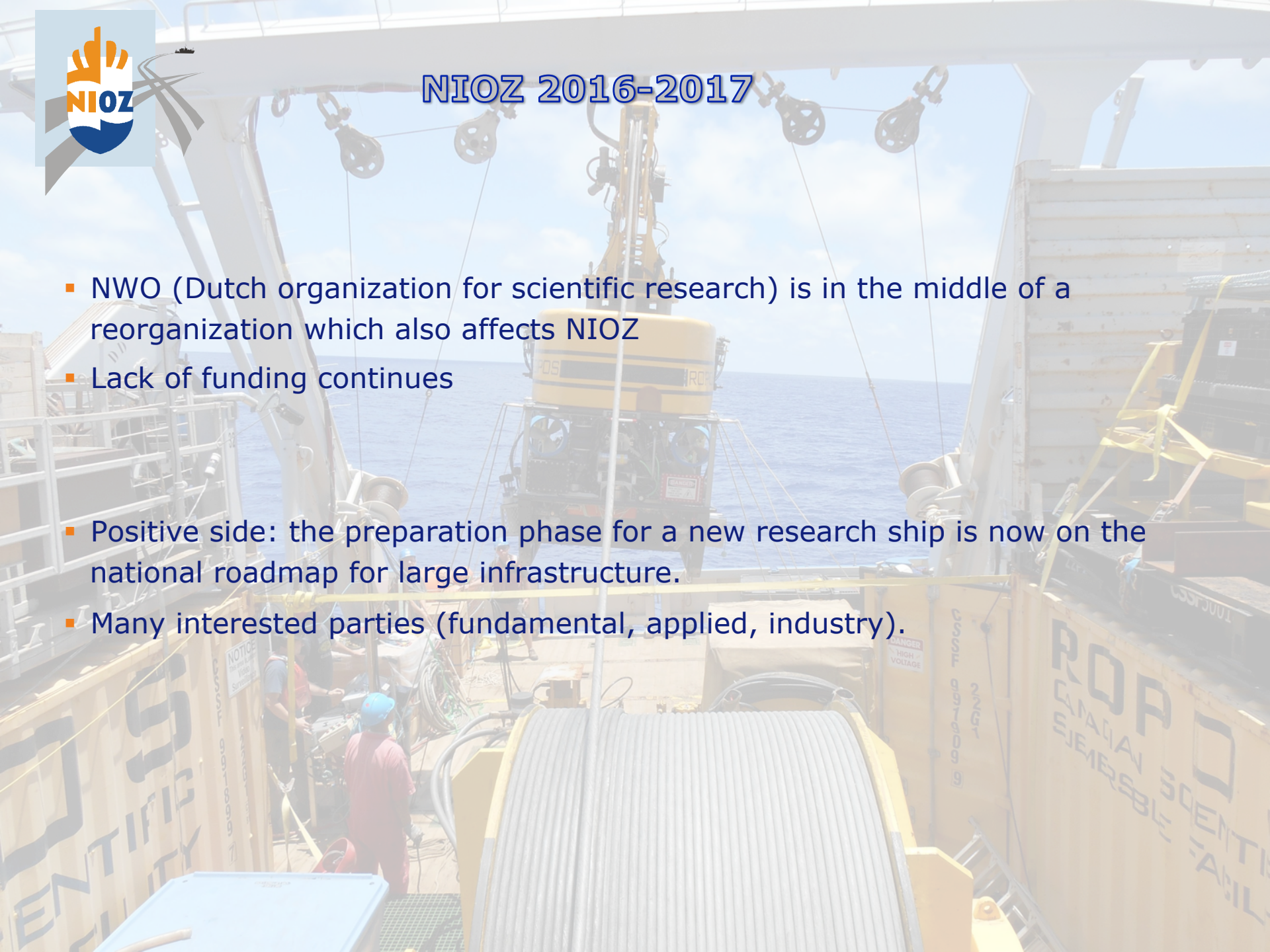


Erica Koning, RVOC 2017



NIOZ 2016-2017

- NWO (Dutch organization for scientific research) is in the middle of a reorganization which also affects NIOZ
- Lack of funding continues
- Positive side: the preparation phase for a new research ship is now on the national roadmap for large infrastructure.
- Many interested parties (fundamental, applied, industry).





NIOZ 2016-2017

- Last year: I mentioned Pelagia might go around the world.
- Coming Saturday Pelagia will return to Texel, after a long trip that started on 6 May 2016.
- Original plan when we started out was to go via the Caribbean to Fiji, then to Mauritius for a possible charter and continuing to the Red Sea for a science program and Black Sea and Mediterranean for more science work.
- Charter didn't happen and the Red Sea program had to be cancelled or postponed because arrangements with the Saudis couldn't be made in time.
- Instead we replaced a surface buoy that was drifting near Cape Verde Islands and had been picked up by our German OFEG partners.



NIOZ 2016-2017

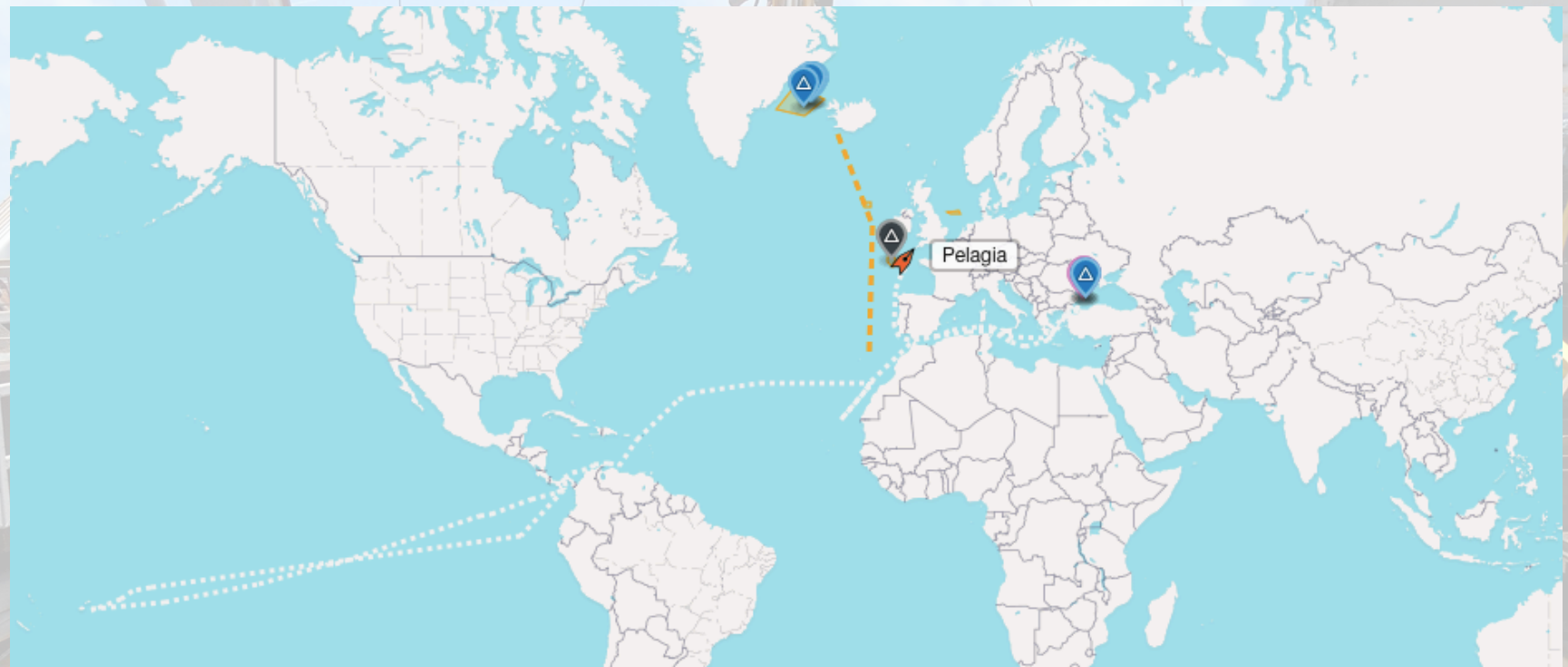


- We spent 2 months working near Fiji
- Very long transits
- Return via Panama to avoid Gulf of Aden and Red Sea, not as interesting and a few days longer but we saved on armed protection.





NIOZ 2016-2017





deep see cable:

- Next: maintenance on ship and deep-sea winch
- Testing a new cable

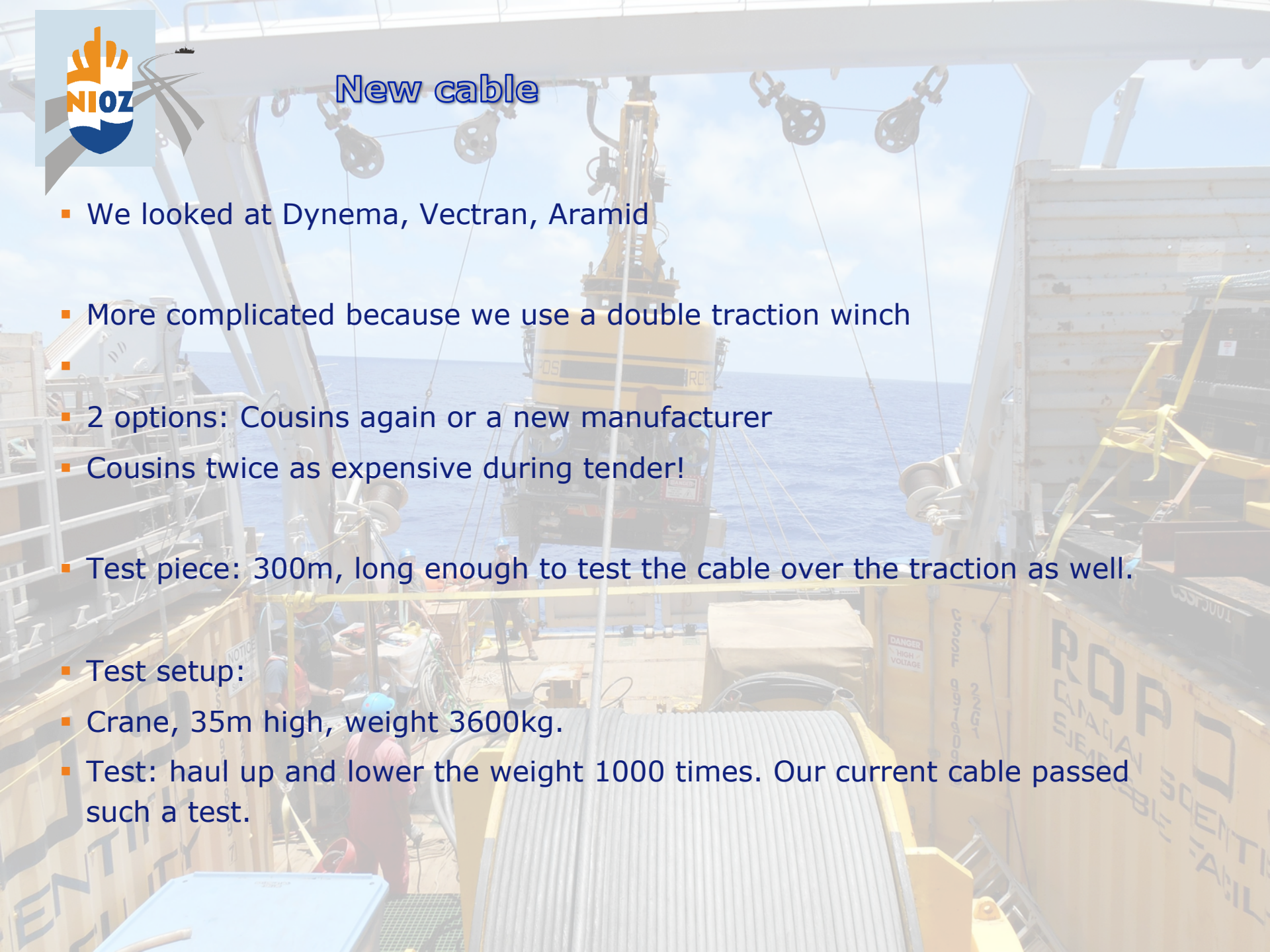
Cousins cable	New Cable
20mm	20mm?
aramid	Vectran/Arnitel mantle?
Copper and optic fiber	Copper and optic fibers
20Tn / 10Tn	More stable
8000m	9600 if 20mm

- Difficult process; limited number of manufacturers, not an off-the-shelf product. Expensive.



New cable

- We looked at Dynema, Vectran, Aramid
- More complicated because we use a double traction winch
- 2 options: Cousins again or a new manufacturer
- Cousins twice as expensive during tender!
- Test piece: 300m, long enough to test the cable over the traction as well.
- Test setup:
 - Crane, 35m high, weight 3600kg.
 - Test: haul up and lower the weight 1000 times. Our current cable passed such a test.





winch





After 220 cycles.....



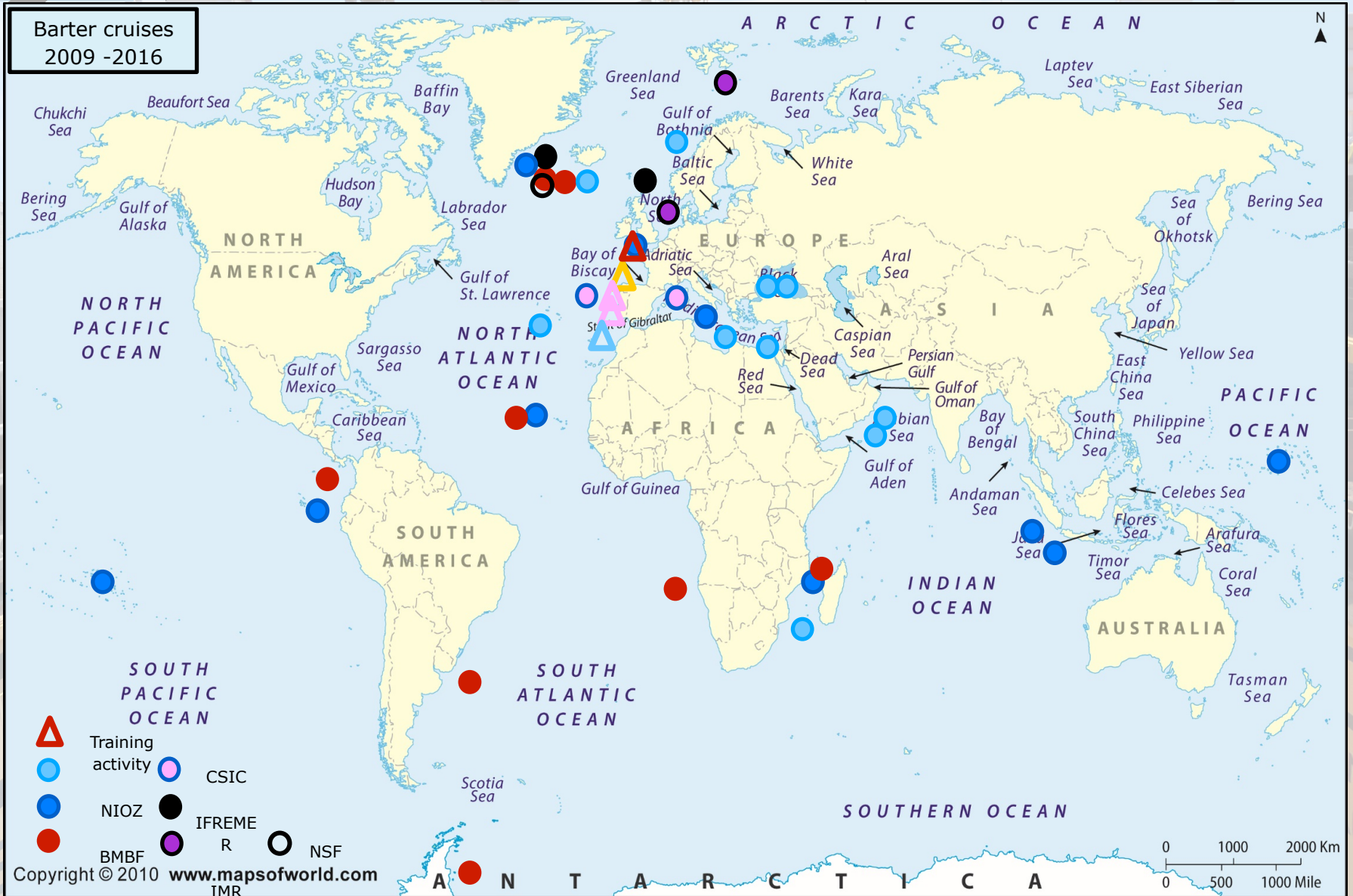
Ongoing.....





OFEG

Barter cruises
2009 -2016





OFEG

- 2 main discussions at the moment: insurance
- Marine facilities planning programme to be used by OFEG members.
- Insurance of equipment. In OFEG, we agreed that risk stays with the owner.
- When more very expensive equipment gets bartered this may no longer hold up.





OFEG-Marine Facilities Planning

- MFP program is now fully operational in NIOZ and NERC and will be adopted by Norway, Spain, Germany.

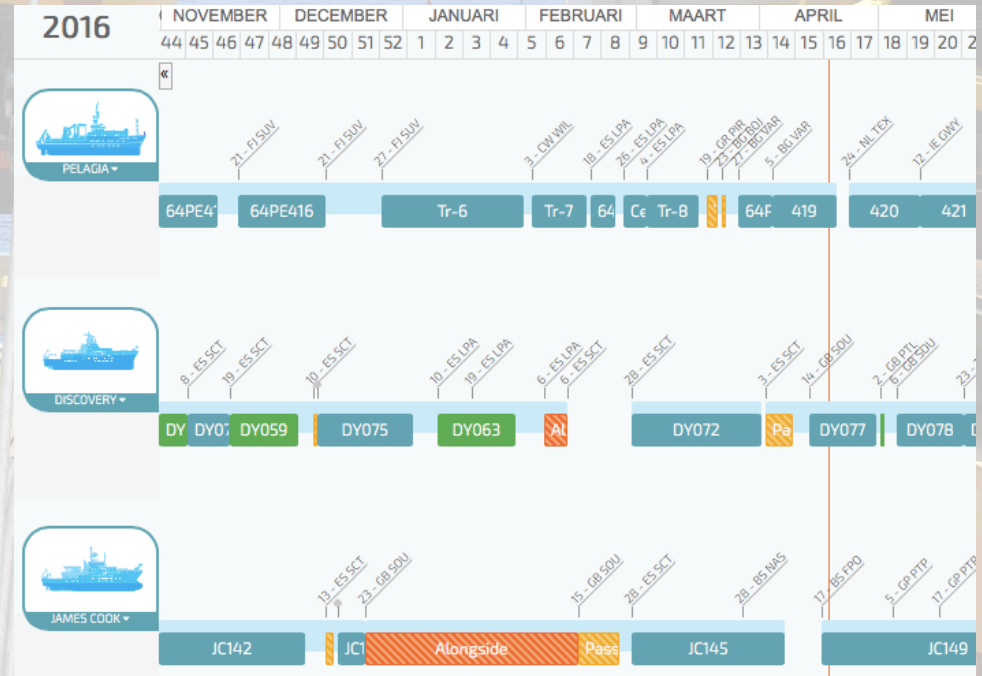
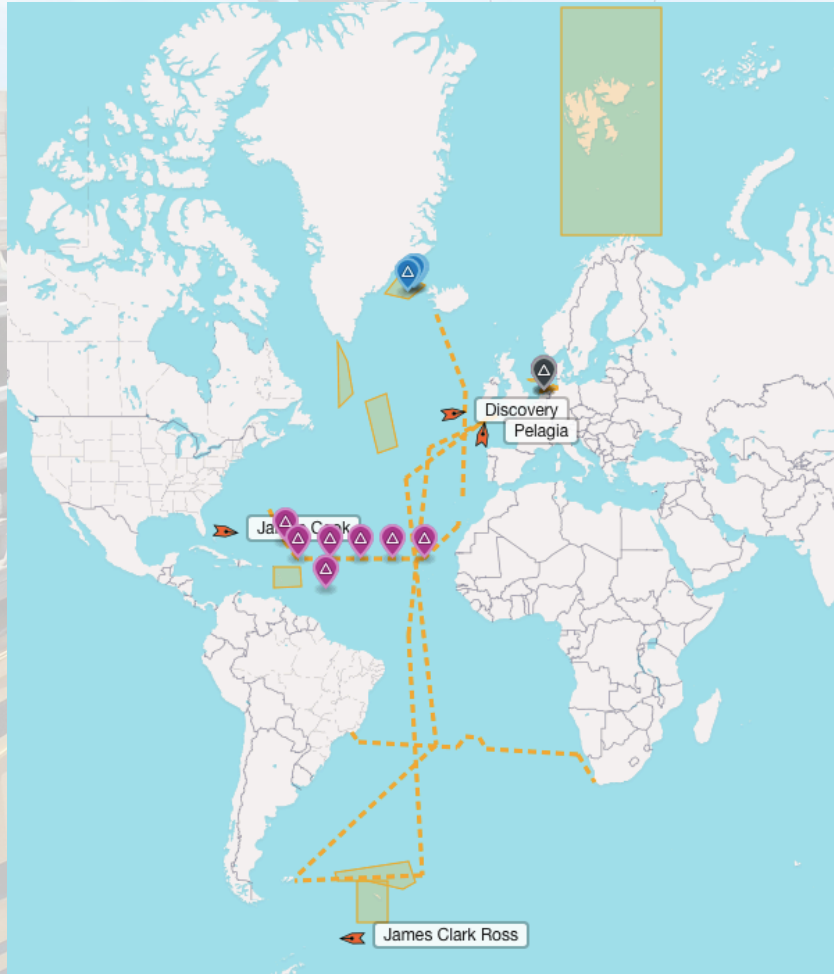


- Latest addition: Phone app!



OFEG-Marine Facilities Planning

- OFEG partners will be able to share programs and we can see where each others ships are in case of problems with equipment.





OFEG-Marine Facilities Planning

- Because MFP is web-based, master and chief officer on board have direct access to all relevant information related to the cruise. Science party, dangerous goods and safety sheets, diplomatic clearance, work plan.

PROGRAMME
MY SCHEDULE MAP PROGRAMME HYBRID

ips ▾ << < Today > >> Period: 1-11-2016 - 1-11-2017 12 MONTHS

NOVEMBER	DECEMBER	JANUARI	FEBRUARI	MAART	APRIL	MEI	JUNI	JULI	AUGUSTUS	SEPTEMBER	OKTOBER
44 45 46 47 48 49 50 51 52	1 2 3 4	5 6 7 8 9	10 11 12 13 14	15 16 17 18 19 20 21	22 23 24 25 26 27 28 29 30	31 32 33 34 35	36 37 38 39 40 41 42 43				

64PE41	64PE416	Tr-6	Tr-7	64	Ce	Tr-B	64P	419	420	421	422	423	ReCerv	425	426	
FUJI CHARTER LEG 1 64PE41 18/031 Days: 25 FISUV 25-11-2016 FISUV 13-10-2016 FISUV 18-11-2016 Erica Koning	FUJI CHARTER LEG 2 64PE416 Days: 25 FISUV 21-11-2016 FISUV 13-12-2016 Erica Koning	TRANSIT FUJI - CURACAO Tr-6 Days: 47 FISUV 27-12-2016 CWVIL 3-2-2017 ESPLA 1-2-2017 Erica Koning	TRANSIT CURACAO - LAS PALMAS Tr-7 Days: 14 CWVIL 3-2-2017 ESPLA 17-2-2017 Erica Koning	DUST BUOY CARMEN 64PE417 Days: 6 ESPLA 18-2-2017 ESPLA 24-2-2017 Jan-Berend Stuur	SHIPYARD LAS PALMAS Cert-refit Days: 9 ESPLA 28-2-2017 ESPLA 4-3-2017 Joop van Haaren	TRANSIT LAS PALMAS - PIRAEUS Tr-8 Days: 13 ESPLA 4-3-2017 GRPR 17-3-2017 Erica Koning	BLACK SEA NIOZ 2017 64PE418 17/077 Days: 9 BGVAR 3-2-2017 BGVAR 3-4-2017 Lu Villalobos	STUUT. JAN-BEREND 419 17/097 Days: 18 BGVAR 5-4-2017 NLTEX 21-4-2017 Jan-Berend Stuur	VIDI - DICK VAN DEVELEN 420 16/039 Days: 18 NLTEX 2-4-2017 NLTEX 1-1-2017 Deelen	BYPASS? 421 16/050 Days: 17 IEQUY 12-5-2017 NLTEX 28-5-2017 NLTEX 15-8-2017 Karline	PULS AND SANDBOX 422 16/035 Days: 14 NLTEX 15-6-2017 NLTEX 30-6-2017 Jacco Kromkamp	NORTH SEA MONITORING 423 Days: 15 NLTEX 15-6-2017 NLTEX 30-6-2017 Jacco Kromkamp	RECERT/REFIT Days: 15 1-7-2017 16-7-2017	STRATIPHYT-17 425 17/082 Days: 29 NLTEX 20-7-2017 ESPLA 18-8-2017 Corina	ALONGSIDE Days: 4 NLRM 1-9-2017 NLRM 5-9-2017	DS OVERFLU 426 17/112 Days: 1 ISREY 12-2017 ISREY 26-2017 Kerst Jochnims

Cruise - BYPASS?

code: 421

17 Sail date
12-5-2017 Galway - Ireland

Dock date
29-5-2017 Texel - Netherlands

Scientist
Furu Mienis

[Cruise overview](#)

[Cruise Application](#) [Cruise Plan](#) [Technicians](#) 2

[Form](#) [Equipment](#) [download](#)

TITLE OF PROJECT

BYPASS?

Last modified 29-3-2017 Furu Mienis

Submitted 7-11-2016 Erica Koning

Accepted 6-2-2017 Furu Mienis

PRINCIPAL INVESTIGATOR

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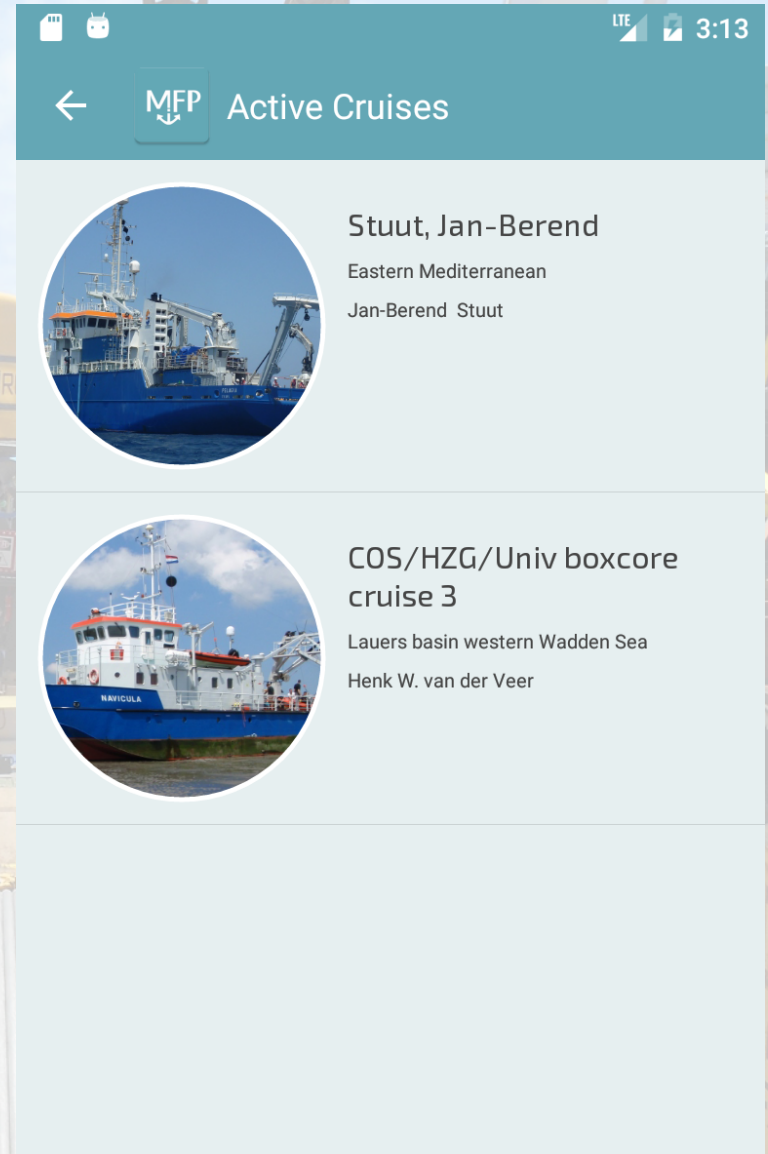
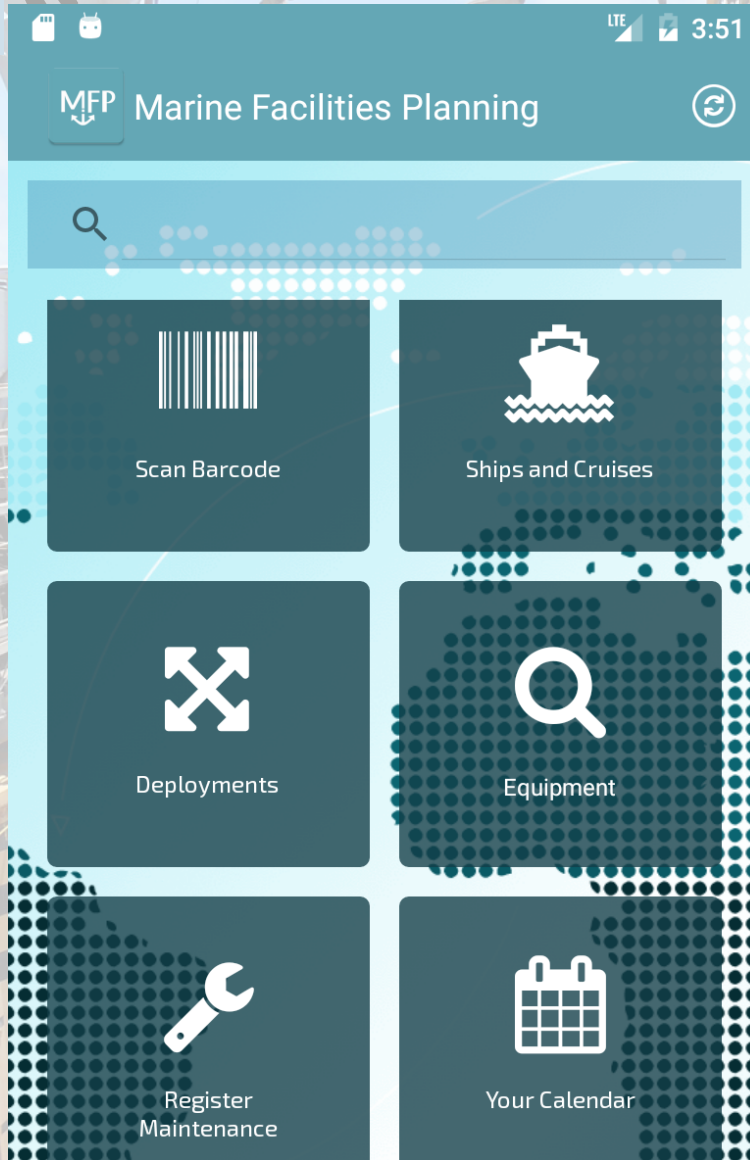
DESCRIPTION OF RESEARCH PROJECT

DESCRIPTION

Whereas it is clear that on geological timescales the marine



MFP phone app





Deployments, moorings, gliders etc.

- ← MFP Deployments
- Agulhas Mooring C 2016
 - Agulhas Mooring D 2016
 - B
 - Black Sea M1 2015
Caroline Slomp
 - D
 - Dust buoy 2017-CB28
Jan-Berend Stuit
 - Dust Buoy Laura 2016
Jan-Berend Stuit
 - Dust Buoy Michelle 2016
Jan-Berend Stuit
 - DUSTTraffic M1 2016

← MFP Dust buoy 2017-CB28

North Atlantic Ocean

Google
uriname

Contact
Jan-Berend Stuit

Depth
4225

Latitude
21.2708

Longitude
-20.983




Mobile app interface for MFP (My Field Planner) showing a calendar for May 2017. The app is running on an Android device, as indicated by the status bar at the top showing LTE, signal strength, and the time 3:59. The calendar view is for May 2017, with the date Tuesday, May 16, selected. Below the calendar, a notification for '421: BYPASS?' is visible, accompanied by a blue icon of a person with a gear. The background of the app is a semi-transparent view of a ship's deck with yellow containers and equipment.

← MFP Your Calendar

May 2017

Sun	Mon	Tue	Wed	Thu	Fri	Sat
42... 30	420... 1	420... 2	420... 3	420... 4	420... 5	420... 6
420... 7	420... 8	420... 9	42... 10	42... 11	Ga... 12 +2	421... 13
42... 14	42... 15	42... 16	42... 17	42... 18	42... 19	42... 20
42... 21	42... 22	42... 23	42... 24	42... 25	42... 26	42... 27
42... 28	No... 29 Te...	30	31	1	2	3
4	5	6	7	8	9	10

TUESDAY, MAY 16

 421: BYPASS?

- The crew uses MFP on board and they are very happy with the option to see the schedules.