Kampfmittel-Teil-Freigabe/ *UXO Partial-Clearance Certificate (ALARP) Teil/Part #11*

Auftraggeber / *Client*	ENGIE Deutschland AG Ella-Barowsky-Straße 44 10829 Berlin, Germany	**Verteiler/ *Distribution***	Kunde/ *client* KBD/ *EOD Authority* *SeaTerra GmbH*

Teil/ partial: x Abschluss/ final:	Protokoll über die Sondierung und Räumung kampfmittelbelasteter Flächen/ Survey and clearance protocol of UXO contaminated areas		
Version/ R*evision*	20240216	**Datum / D*ate***	16.02.2024
Auftrag/ *Contract*	Sondierung und Räumung FSRU Terminal in Wilhelmshaven Survey and clearance FSRU terminal in Wilhelmshaven	**Projekt Nr./ *Project No.* *MBD Nr./No.:***	2023-035 RS-2023-00537
Anlagen/ A*ttachments*	Anlage-1-clearance chart Anlage-2-master target list (MTL)	**2**	21.04.2023 - 16.02.2024
1. Lage der Räumstelle/ *Project location*	FSRU Terminal in Wilhelmshaven / FSRU terminal in Wilhelmshaven	**Fertigstellungsdatum/ *Finalization date***	16.02.2024

2. Beschreibung der Arbeiten/ *Description of works*

Methodik/ M*ethodology*	**Technologie/ *Technology***	**Fläche, Targets / *Area, Targets***
Kampfmittelsondierung/ *UXO Survey*	Einsatz von Unterwasser-Array (Scanfish+fixer Rahmen) bestückt mit 4 x G882 Magnetometer/ *Deployment of underwater array (Scanfish +fixed frame) with 4 x G882 magnetometer*	1 854 675 m^2
Kampfmittelräumung/ *UXO Clearance*	Kampfmittel-Taucher-Untersuchung und Räumung von potentiellen Kampfmitteln ≥ 10 kg/ 50 kg *EOD diver investigation and clearance of potential UXO ≥ 10 kg/ 50 kg*	1049 Targets (248 UXO)

3. Kampfmittelfreigabebescheinigung nach ATV DIN 18299 Abs. 0.1.17 VOB/C
UXO Clearance (ALARP) Certificate

Die Freigabe basiert auf den beigefügten Unterlagen. Die Sondierung und Räumung wurde nach dem neuesten Stand der Technik und nach besten Wissen und Gewissen und Können durchgeführt. Die Arbeiten wurden gemäß den Regeln und Gesetzen des deutschen Sprengstoffgesetzes (§7 und §20) durchgeführt.

The clearance certificate is based on the attachments. The survey and clearance was carried out with the state of the art technology and according to the best of our knowledge, belief and ability. The works have been executed according to the German Explosive Law (§7 and §20).

Die Kampfmittelfreigabe wird hiermit erteilt. Die Freigabebescheinigung wird wie folgt beschrieben:
The UXO clearance is herewith declared. The clearance certificate is described as follows:

Freigabebescheinigung für die untersuchten Objekte / Kampfmittel: *UXO Clearance Certificate for investigated targets*	1049 Stck./ pce.

4. Anmerkungen für den Auftraggeber, Einschränkungen und besondere Vorkommnisse/ Comments for the Client, limitations and other comments

SeaTerra GmbH untersuchte die vorgegebene Baufläche auf potentielle Kampfmittel. Die Ergebnisse wurden analysiert und ausgewertet. Diese vorgegebenen Flächen wurden durch die oben beschriebene Methodik untersucht und geräumt.
Es wurden insgesamt 1752 Anomalien festgestellt. Untersucht und geräumt wurden hiervon 1049 Anomalien ≥ 10 kg/ 50 kg (50 kg im „post dredge Bereich“) metallische Modell-Masse.
Bei den 1049 Anomalien welche sich im Baubereich befinden erfolgte eine Inspektion und Räumung durch Tauchereinsatz.

Die in der Anlage dargestellten grün schraffierten Flächen und grün markierten Punkte werden für weitere Bauarbeiten in Bezug auf Kampfmittel ≥ 10 kg frei gegeben. Da ein Grenzwert, basierend auf einer Risiko Einschätzung, für die Sondierung und Räumung angewendet wurde, wurden alle Anstrengungen unternommen um alle Kampfmittel zu räumen. Jedoch kann die Existenz von kleineren Kampfmitteln nicht ausgeschlossen werden. Insofern sollten alle nachfolgenden Arbeiten trotz der Freigabe mit entsprechender Vorsicht durchgeführt werden.
Maßnahmen zur Vermeidung von Schäden durch kleinere Munition sollten insbesondere bei Baggerarbeiten beachtet werden. Hier raten wir zu einer baubegleitenden Kontrolle durch Truppführer bei Baggerarbeiten und ein Anbringen eines 10 cm Schutzgitters vor dem Saug-Kopf.

Das Risiko bei Jack-up Arbeiten wird als niedrig eingeschätzt und es sind keine weiteren Maßnahmen erforderlich.

SeaTerra surveyed the outlined construction area for potential UXOs. The results were analysed and interpreted. The outlined areas were investigated and cleared according the methodology described above.
A total of 1752 anomalies were detected. 1049 anomalies ≥ 10 kg/ 50 kg (50 kg in the post-dredged area) were inspected and cleared.
The investigation of these detected 1049 anomalies within the construction area was carried out by EOD diver investigation.

The green hatched areas and green marked targets as outlined in the attachments are declared as UXO free ≥ 10 kg. All identified UXOs within the target area were removed. As a threshold, based on a risk-assessment that was implemented for the survey and clearance operations, every effort has been undertaken to identify all UXOs to be removed. However, the presence of smaller UXO’s cannot be excluded.
Exercise caution for intrusive activities such as dredging, etc. We recommend to consider the reduction of risk due to small ammunitions during dredging operations. We recommend the presence of EOD supervisors during dredging and the installation of a 10 cm protection grid in front of the dredge head.

The jacking operation is seen as low risk and no further mitigations are envisaged.

Die Kolkschutzfläche/ JBB119 Fläche wird für Objekte ≥ 10 kg bis in Tiefen von 3.5 m und ≥ 50kg bis 6m unter Grund frei gegeben.
The scour protection area/ JBB119 area is certified clear for targets ≥ 10 kg to 3.5 m and ≥ 50kg to 6m below ground.

Die Pfahlpositionen und Ankerpfahl-Positionen des Skylla Schiffes werden für Objekte ≥ 50 kg bis in Tiefen von 6 m unter Grund frei gegeben.

The pile locations and spud-pile locations of the Skylla vessel are certified clear of targets ≥ 50 kg to 6 m below ground.

Die Rohrleitungstrasse (TCP area) wird für Objekte ≥ 10kg bis in Tiefen von 4.5 m unter Grund frei gegeben.
The pipe laying area (TCP) is certified clear for targets ≥ 10 kg to 4.5 m below ground.
Die Rohrleitungstrasse (TCP area) von KP 0+900 bis KP 1+600 wird für Objekte ≥ 10kg bis in Tiefen von 4.5 m unter Grund frei gegeben (Stand Bathymetrie 30.01.2024)
The pipe laying area (TCP) is certified clear for targets ≥ 10 kg to 4.5 m below ground.
The pipe laying area (TCP) from KP 0+900 to KP 1+600 is certified clear for targets ≥ 10 kg to 4.5 m below ground (Status Bathymetry 30.01.2024)

Die Ankerflächen für die Rohr-Verlege-Arbeiten werden für Objekte ≥ 10 kg bis in Tiefen von 3.5 m unter Grund frei gegeben.
The anchor corridor for the trenching and pipe laying operations are certified clear of targets ≥ 10 kg to 3.5 m below ground.

Die bereits gebaggerten Flächen werden für Objekte ≥ 50 kg bis in Tiefen von 2 m unter Grund frei gegeben.
The post-dredge areas are certified clear of targets ≥ 50 kg to 2 m below ground.

Die noch zu baggernden Flächen werden für Objekte ≥ 10 kg bis in Tiefen von 3.5 m unter Grund frei gegeben.
The open pre-dredge areas are certified clear of targets ≥ 10 kg to 3.5 m below ground.

Die Zufahrtsfläche vom Fahrwasser in die gebaggerte Fläche wird für Objekte ≥ 50 kg bis in Tiefen von 2 m unter Grund frei gegeben.
The access route area from the fairway into the the dredged area are certified clear of targets ≥ 50 kg to 2 m below ground.

5. Identifizierte / geborgene Kampfmittel - i*dentified and cleared UXOs*

ID Nr./ *No.*	**Bezeichnung / *description***	**Anzahl-Menge/ *number-quantity***	**Anmerkung/ *comment***
1	10 cm Granaten/ grenades	7	
2	10.5 cm HE Granaten/ grenades	35	17 x Verdacht auf Kampfstoffmunition, 17 untersucht = Nebelgranate 17 chemical suspects, 17 analysed = smoke grenade
3	12 cm HE Granaten/ grenades	19	
4	12.2 cm Granaten/ grenades	6	
5	12.8/ 12.5 cm Granaten/ grenades	7	
6	15 cm Granaten/ grenades	6	
7	17 cm Granaten/ grenades	22	
8	2 cm Granaten/ grenades	2	
9	2 Zoll/ inch Mörser Granaten /morter grenades	2	
10	21 cm Flugzeug Rakete/ aircraft rocket	1	
11	21 cm Granaten/ grenades	7	

12	22 cm Granaten/ grenades	6	
13	3.7 cm Granaten/ grenades	10	
14	30 cm Flugzeug Rakete/ aircraft rocket/ Wurfkörper42 Spreng.	2	
15	4.8 Zoll Mörser Granate/ inch mortar grenades	1	
16	7 cm Granaten/ grenades	1	
17	7.5 cm Granaten/ grenades	17	
18	7.62 cm HE Granaten/ grenades	23	
19	7.7 cm Granaten/ grenades	1	
20	8 cm Granaten/ grenades	4	
21	Artillerie Zünder /artillery fuse	1	
22	30 lbs INC GB Brandbombe/ incendiary bomb	4	
23	Treibladung/ booster charge	2	
24	Patrone/ Teile cartridge/ parts	2	
25	Wasserbombe/ depth charge - WBD II (German)	1	
26	SD 70 HE Fliegerbombe Deutsch/ aerial bomb	35	
27	Munitionskiste / munition box(100 x 2 cm Flak Granaten)	1	
28	Munitionskiste / munition box (3 x 7.62cm Geschosse/ full rounds)	9	
29	Munitionskiste / munition box (3.7cm projectiles), 18 pieces	1	
30	Munitionskiste / munition box (4 x 5cm HE projectiles)	2	
31	Transportkiste/ Transport box (3 x 8cm HE Mörser Granaten/ mortar grenades)	4	
32	Munitionskiste / munition box (8 x EA S-Mine 44)	1	
33	Munitionskiste / munition box (parts with explosive in wooden box)	1	
34	Sprengladung mit Zünderteilen/ explosive charge without a detonator (parts)	1	
35	Panzerfaust / anti tank bazooka head (German)	1	
36	28 cm Granaten/ grenades	1	
37	8.8 cm RPG Anti tank	1	
38	95 mm smoke emission grenade Q.F./ Nebelgranate	1	
		248	

6. Freigabeflächen / cleared areas

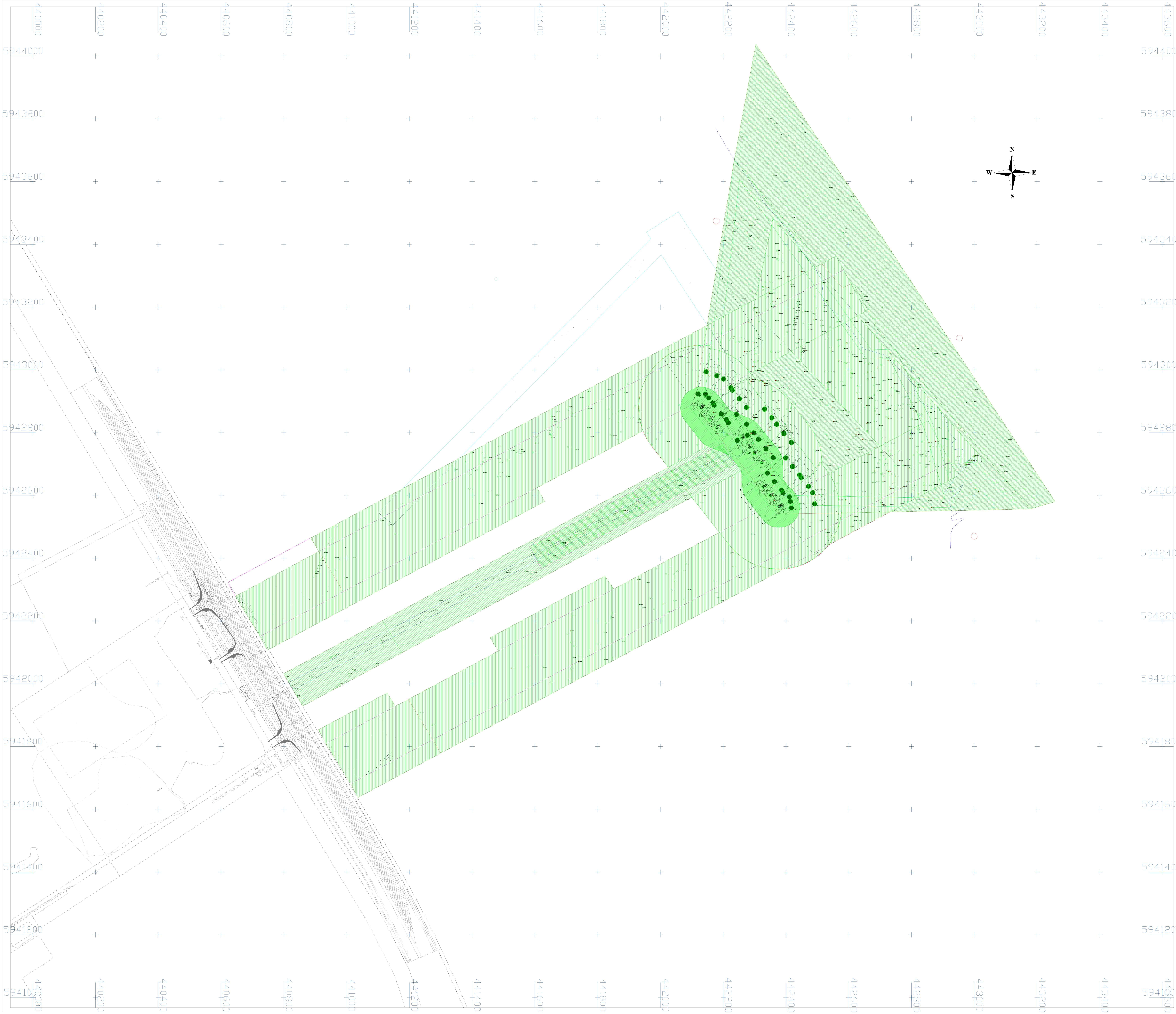
ID Nr./ *No.*	**Bezeichnung / *description***	**Anzahl-Menge/ *number-quantity (m^2)***	**Anmerkung/ *comment***
1	Pipe Trasse/ pipe route	167 877	
2	Anleger und Arbeitsbereich Anleger und Kolkschutz/ pile area and work area piling and scour protection	290 655	
3	Gebaggerte Fläche/ post-dredge area	210 536	
4	Ankerfläche/ anchor corridor	654 853	
5	nicht gebaggerte Fläche/ pre-dredge area	127 477	
6	Zufahrtsfläche zum Fahrwasser/ access area to fairway	274 869	
7	Pipe Trasse/ pipe route KP 0+900 – KP 1+1600	56 000	+/-40m

Wandlitz 16.02.2024

Geophysik & Kampfmittel
Dienstleistungen GmbH
Geophysics & EOD Services
An der Trift 21; 16348 Wandlitz; Germany
Tel.: +49 (0)33397 297 27
Fax: +49 (0)33397 297 29
Mobil: +49 (0)160 4715580
Email: e.schwab@seaterra.de
www.seaterra.de

Ort, Datum;
Place, date

Unterschrift/ signature; SeaTerra GmbH



LEGENDE / legend

Allgemein/ general

- Arbeitsgebiet/ working area
- Sondierfläche/ survey area

- detektierte Anomalie/ detected anomaly
- nicht geräumte Anomalie/ not cleared anomaly
- geräumte / frei gegebene Anomalie/ cleared anomaly
- nicht geräumte Anomalie, Freigabe bis 3.5m anchor zone/2m post dredge area/4.5m TCP route u.G. /not cleared anomaly, clear to 3.5m anchor zone/2m post dredge area/4.5m TCP route b. ground
- UXO Punkt geräumt/ UXO cleared
- UXO Punkt nicht geräumt/ UXO not cleared
- punktuelle Interpretation, Freigabe nach punktueller Räumung: >=10kg/ 3.5m b. g. target interpretation, clear after singular target clearance
- punktuelle Interpretation, Freigabe nach punktueller Räumung: TCP route >=10kg/4.5m b. g. target interpretation, clear after singular target clearance
- Pfähle & Kolkschutzfläche punktuelle Interpr., Freigabe nach punkt. Räumung: >=50kg/ 6m b. g. piles & scour protection area, target interpretation, clear after singular target clearance
- Freigabe nach punktueller Räumung ("post dredge" Fläche): >=50kg/ 2m b. g. clear after singular target clearance ("post dredge area")
- punktuelle Interpretation, Freigabe nach punktueller Räumung: TCP route >=10kg/4.5m b. g. Bezug: Bathymetrie 30.01.2024/ KP 0+900 - KP 1+600 target interpretation, clear after singular target clearance Referenz: Bathymetry 30.01.2024/ KP 0+900 - KP 1+600

Anmerkungen/ Comments

SURVEY EQUIPMENT

Vessel :	TRIO, ST01, ST04, MIRA A, HT8
GPS Receiver (Primary)	BX982 / Sapos
GPS Receiver (Secondary)	MPS865 / SAPOS
GPS Backup (Secondary)	C-NAV 3050
Heading / Motion Reference Unit (Primary)	MPS865 heading system
Heading / Motion Reference Unit (Secondary)	IxBlue Octans3000
USBL Positioning System	Edgetech bats
Acoustic Mini Beacons	Edgetech bats
Magnetometer/ EM system	SeaTerra G882
ROTV/ Sensor Platform	Scanfish 3D

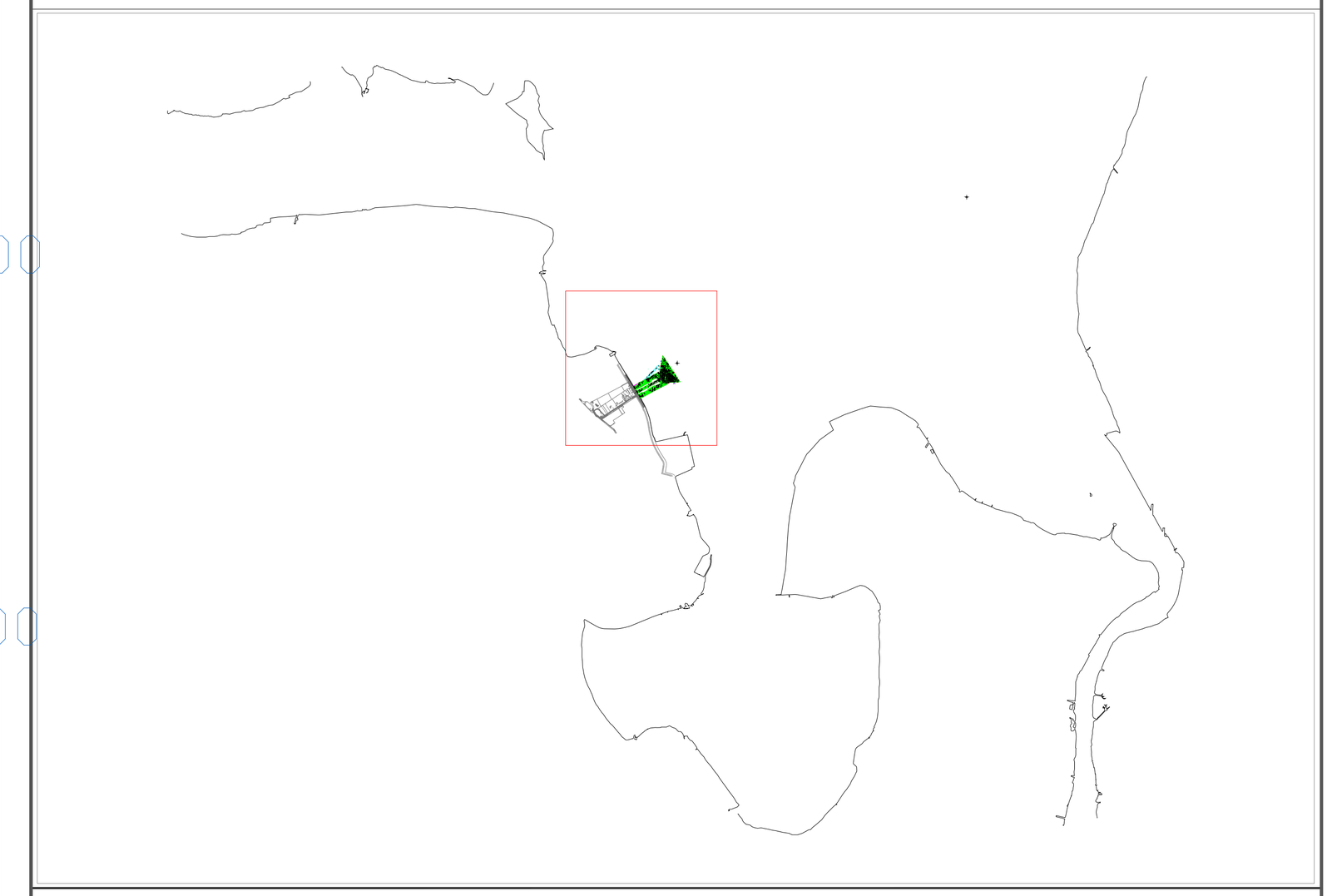
GEODETISCHE PARAMETER / geodetic parameter

HORIZONTALER BEZUG/ horizontal reference

GPS Geodetic Parameters		Project Projection Parameters	
Geodetic Datum:	ETRS89	Projection:	UTM
Spheroid:	GRS80	Zone:	32N
Semi Major Axis:	6378137.000	Central Meridian:	12° East
Inverse flattening:	1/298.2572221010	Latitude of Origin:	Equator
		False Easting:	500000.00m
		False Northing:	0
		Scale Factor:	0.9996

VERTIKALER BEZUG/ vertical reference

Verwendetes Höhenmodell/ / used height model: Deutsches Haupthoehennetz DHHN92



ENGIE Deutschland AG

Ella-Barowsky-Straße 44 10829 Berlin, Germany

SeaTerra GmbH

Geophysik & Kampfmittel Dienstleistungen

An der Trift 21, 16348 Wandlitz, Germany
Tel: +49 (0) 33397 29727, E-mail: info@seaterra.de

UXO Survey & Clearance Survey and clearance FSRU Terminal in Wilhelmshaven Freigabeplan / clearnce chart

Masstab/ scale 1 : 2500

0 40 80 160 240 320 400 m

Vessel: various Arbeitszeitraum/ work period: 04.2023- 16.02.2024 Project Nr.: 2023-035

WSA Revision	ST Revision	Datum/ date	Beschreibung/ description	gez/ sign	kont. / check	gene./ approv
11	11	16/02/2024	Freigabe/ clearance #11	GJ	KR	ES
01-10	1-10	22/12/2023	Freigabe/ clearance #1-#10	GJ	KR	ES
00	0	20/07/2023	interne Revision/ internal revision	GJ	KR	ES

Drawing No.: 20240223-clearance-chart-ENGIE-WHV FSRU PROJECT-v11 | Plan: FSRU WHV | Orig. A0

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	veigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance							b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-0061		442079.230	5943254.150	533805.5257	80726.4990	-11.7	-16.0	4.3	324.6	26.0	21.87	0.02	9.84	21.85		A		0																n	
ITP-0062		442084.700	5943260.510	533805.7336	80726.7925	-11.3	-16.5	5.2	331.3	26.5	14.03	-4.67	12.48	18.70		A		0																n	
ITP-0063		442093.600	5943276.930	533806.2684	80727.2660	-10.8	-16.8	6.0	745.8	59.7	-0.20	-17.22	8.11	17.02		A		0																n	
ITP-0064		442100.630	5943283.470	533806.4828	80727.6444	-10.6	-14.7	4.1	94.6	7.6	1.11	-5.73	8.01	6.84		B		0																n	
ITP-0065		442078.060	5943386.400	533809.8041	80726.3467	-10.3	-12.6	2.3	382.8	30.6	33.04	-29.35	3.62	62.38		A		0																n	
ITP-0066		442076.100	5943450.130	533811.8653	80726.1973	-10.3	-11.6	1.3	88.5	7.1	15.21	-15.82	2.60	31.02		B		0																n	
ITP-0067		442043.880	5943471.370	533812.5397	80724.4289	-10.4	-12.7	2.3	70.8	5.7	7.86	-6.39	5.69	14.25		B		0																n	
ITP-0081		441403.310	5942825.630	533751.3902	80649.9935		-1.7	1.7	1543.4	123.5	214.93	-205.70	4.34	420.63		A		0																n	
ITP-0085		441510.890	5942910.580	533754.1821	80655.7920		-0.2	0.2	14.3	1.1	18.86	-4.56	6.69	23.41		D		0																n	
ITP-0087		441529.920	5942972.100	533756.1802	80656.7862		0.0	0.0	25.9	2.1	49.40	-23.21	2.37	72.61		C		0																n	
ITP-0088		441533.840	5942967.720	533756.0400	80657.0026		-1.0	1.0	152.0	12.2	76.63	-14.22	3.79	90.85		B		0																n	
ITP-0089		441539.770	5942929.740	533754.8136	80657.3511		-1.0	1.0	48.6	3.9	9.22	-12.17	2.46	21.39		C		0																n	
ITP-0091		441544.110	5942988.100	533756.7036	80657.5478		-1.1	1.1	407.3	32.6	142.44	-59.94	3.21	202.38		A		0																n	
ITP-0092		441549.020	5942948.570	533755.4266	80657.8419		-1.8	1.8	324.2	25.9	38.93	-38.77	3.49	77.70		A		0																n	
ITP-0093		441600.460	5943043.740	533758.5264	80700.5777		-3.8	3.8	823.9	65.9	64.91	-9.41	9.50	74.32		A		0																n	
ITP-0094		441612.170	5943044.470	533758.5547	80701.2146		-2.4	2.4	97.9	7.8	7.56	-8.04	8.07	15.60		B		0																n	
ITP-0096		441641.250	5943083.490	533759.8289	80702.7713	-9.0	-13.9	4.9	2451.8	196.1	214.60	-84.47	17.07	299.07		A		0																n	
ITP-0099		441662.790	5943040.400	533758.4434	80703.9729	-11.0	-19.1	8.1	1590.3	127.2	3.85	-16.41	9.92	20.26		A		0																n	
ITP-0100		441661.760	5943093.140	533800.1493	80703.8813	-11.8	-22.1	10.3	9016.7	2073.3	90.23	-114.02	17.54	204.24		A		0																n	
ITP-0102		441667.820	5943036.370	533758.3150	80704.2495	-10.9	-14.8	3.9	427.0	34.2	31.44	-11.46	7.75	42.91		A		0																n	
ITP-0103		441686.800	5943109.600	533800.6919	80705.2332	-11.3	-15.0	3.7	322.2	25.8	39.92	-2.40	5.37	42.31		A		0																n	
ITP-0107		441699.040	5943114.740	533800.8632	80705.8961	-10.8	-10.8	0.0	10.2	0.8	40.48	-0.79	4.13	41.28		D																		n	
ITP-0108		441706.370	5943120.500	533801.0525	80706.2912	-10.3	-12.4	2.1	160.6	12.8	1.83	-25.12	4.99	26.95		B		0																n	
ITP-0109		441711.400	5943091.630	533800.1204	80706.5845	-10.1	-11.1	1.0	49.4	4.0	14.49	-10.45	3.02	24.94		C		0																n	
ITP-0111		441713.630	5943127.340	533801.2767	80706.6818	-9.8	-13.0	3.2	658.2	52.7	1.91	-50.78	8.89	52.69		A		0																n	
ITP-0112		441722.640	5943135.210	533801.5349	80707.1670	-9.4	-11.0	1.6	99.2	7.9	43.60	0.91	9.32	42.69		B		0																n	
ITP-0113		441767.840	5943161.190	533802.3936	80709.6100	-8.1	-11.6	3.5	174.6	14.0	15.86	-4.98	9.77	20.84		B		0																n	
ITP-0114		441788.110	5943233.470	533804.7403	80710.6648	-11.8	-14.5	2.7	241.5	19.3	19.37	-11.90	5.05	31.27		B		0																n	
ITP-0115		441872.760	5943238.570	533804.9392	80715.2696	-15.0	-16.1	1.1	20.7	1.7	19.19	-4.79	3.31	23.98		C		0																n	
ITP-0118		441895.710	5943330.690	533807.9289	80716.4570	-14.0	-14.4	0.4	19.1	1.5	21.52	-8.07	6.50	29.59		C		0																n	
ITP-0119		441905.670	5943327.200	533807.8199	80717.0016	-14.2	-14.5	0.3	44.4	3.5	54.85	-4.91	3.41	59.76		C		0																n	
ITP-0120		441917.250	5943349.990	533808.5619	80717.6166	-13.6	-14.8	1.2	37.2	3.0	26.35	-3.90	7.74	30.26		C		0																n	
ITP-0121		441918.040	5943292.060	533806.6879	80717.6986	-14.9	-14.9	0.0	1.2	0.1	5.50	-1.85	4.20	7.34		F		0																n	
ITP-0123		441931.470	5943316.770	533807.4928	80718.4131	-14.0	-15.8	1.8	2143.8	171.5	337.00	-260.40	5.11	597.39		A		0																n	
ITP-0125		441940.090	5943340.670	533808.2695	80718.8663	-13.2	-16.6	3.4	2414.8	193.2	64.44	-162.44	4.75	226.88		A		0																n	
ITP-0128		441948.160	5943350.610	533808.5943	80719.2990	-12.8	-13.9	1.1	17.0	1.4	8.77	-3.69	4.02	12.46		C		0																n	
ITP-0129		441964.490	5943336.750	533808.1524	80720.1973	-12.7	-13.2	0.5	41.3	3.3	3.33	-25.02	3.59	28.34		C		0																n	
ITP-0130		440816.600	5942006.170	533724.6394	80618.6179	-2.3	-2.3	0.0	53.7	4.3	11.12	-98.94	2.40	110.07		C	x	4	22.08.23	16:16:00	HT08	. Scheffl	I. Mikute	25.0	0.20	0.80	1.2		y	y		y	y	scrap, (car tyre)
ITP-0131		440821.400	5941993.540	533724.2327	80618.8878	-2.3	-2.3	0.0	55.5	4.4	783.07	-176.81	1.20	959.88		C	x	5	19.08.23	09:30:00	HT08	. Scheffl	I. Mikute	30.0	1.40	0.70	0.7		y	y		y	y	scrap
ITP-0132		440835.140	5941984.120	533723.9335	80619.6420	-2.3	-2.3	0.0	21.4	1.7	46.97	-57.44	1.17	104.42		C	x	4	19.08.23	09:35:00	HT08	. Scheffl	I. Mikute	5.0	0.90	0.02	0.1		y	y		y	y	scrap
ITP-0133		440889.600	5942021.330	533725.1595	80622.5805	-2.1	-2.4	0.3	19.3	1.5	27.10	-0.93	5.80	28.03		C	x	4	23.08.23	17:40:00	HT08	. Scheffl	I. Mikute	12.0	1.00	0.03	2.1		y	y		y	y	scrap
ITP-0134		440941.860	5942071.740	533726.8118	80625.3903	-1.6	-4.7	3.1	125.0	10.0	1.16	-11.47	7.64	12.63		B	x	4	26.11.23	11:54:00	HT01	M. Kano		2.0	0.60	0.01	3.6		y	y		y	y	metal rod
ITP-0135		440947.190	5942081.610	533727.1333	80625.6736	-1.5	-1.5	0.0	37.5	3.0	318.05	-35.01	3.14	353.06		C	x	4	10.08.23	06:54:00	HT08	. Scheffl	I. Mikute	10.0	1.50	0.05	1.2		y	y		y	y	scrap
ITP-0136		440949.660	5942084.870	533727.2397	80625.8058	-1.5	-1.5	0.0	56.5	4.5	87.35	-51.01	2.06	138.36		C	x	4	10.08.23	07:20:00	HT08	. Scheffl	I. Mikute	10.0	1.30	0.02	1.8		y	y		y	y	scrap
ITP-0137		440953.340	5942085.460	533727.2603	80626.0057	-1.4	-1.4	0.0	11.9	1.0	191.24	-31.53	1.73	222.77		D	x	4	11.08.23	07:25:00	HT08	. Scheffl	I. Mikute	8.0	1.20	0.03	1.6		y	y		y	y	scrap
ITP-0138		440957.500	5942089.060	533727.3785	80626.2296	-1.4	-1.4	0.0	17.3	1.4	70.54	-13.02	1.80	83.56		C	x	4	11.08.23	07:40:00	HT08	. Scheffl	I. Mikute	8.0	2.10	0.20	2.2		y	y		y	y	scrap
ITP-0139		440962.430	5942091.480	533727.4588	80626.4963	-1.4	-1.4	0.0	21.8	1.7	61.24	-9.11	4.70	70.35		C	x	4	23.08.23	18:26:00	HT08	. Scheffl	I. Mikute	15.0	0.80	0.10	1.8		y	y		y	y	scrap
ITP-0140		440965.740	5942093.640	533727.5300	80626.6750	-1.3	-1.3	0.0	25.4	2.0	81.58	-8.52	2.38	90.10		C	x	4	11.08.23	08:40:00	HT08	. Scheffl	I. Mikute	5.0	0.35	0.04	2.6		y	y		y	y	scrap
ITP-0141		440966.000	5942088.580	533727.3964	80626.6926	-1.3	-1.6	0.3	16.6	1.3	5.73	-10.60	2.20	16.33		C	x	4	11.08.23	07:55:00	HT08	. Scheffl	I. Mikute	5.0	0.30	0.04	2.0		y	y		y	y	scrap
ITP-0142		441099.800	5942125.700	533728.6217	80633.9493	-0.5	0.5	0.0	6.4	0.5	13.44	-6.46	1.60	19.90		E		4																n	
ITP-0143		441109.280	5942138.000	533729.0235	80634.4569	-0.8	-1.4	2.1	234.8	18.8	16.87	-27.50	4.23	44.37		B	x	4	21.10.23	16:50:00	HT08	K. Orth	I. Mikute	2.0	1.20	0.02	3.1		y	y		y	y	metal bar
ITP-0144		441295.690	5942264.800	533733.2014	80644.5162	-0.8	-7.8	8.6	2872.1	229.8	15.50	-16.00	11.40	31.50		A	x	4	20.10.23	10:00:00	HT08	K. Orth	I. Mikute				3.5		y	n		y	y	target very deep; clear to 4.5m below ground
ITP-0145		441534.300	5942342.400	533735.8082	80657.4506	-5.2	-7.9	2.7	126.3	10.1	28.90	-22.20	4.20	51.02		B	x	4	09.08.23	13:29:00	HT08	. Scheffl	I. Mikute	15.0	1.00	0.30	2.3		y	y		y	y	scrap
ITP-0146		441591.090	5942411.740	533738.0745	80700.4947	-7.1	-8.6	1.5	25.1	2.0	2.13	-5.92	5.13	8.05		C	x	4	02.08.23	14:45:00	HT08	. Scheffl	I. Mikute	100.0	0.40	1.40	2.5		y	y		y	y	scrap; tyre and 2 x steel wire rope
ITP-0147		441642.060	5942452.060	533739.3995	80703.2417	-7.5	-9.0	1.1	773.9	61.9	156.92	-172.17	2.73	329.09		A	x	4	20.07.23	16:30:00	HT08	. Scheffl	I. Mikute	40.0	1.00	0.20	3.2		y	y		y	y	scrap
ITP-0149		441688.440	5942446.440	533739.2363	80705.7699	-7.5	-7.9	0.4	26.0	2.1	29.49	-5.02	4.53	34.51		C	x	4	20.07.23	15:30:00	HT08	. Scheffl	I. Mikute	50.0	1.20	0.80	3.3		y	y		y	y	scrap
ITP-0151		441831.890	5942525.650	533741.8565	80713.5245	-8.1	-11.2	2.5	190.1	14.4	21.51	-20.66	2.27	42.17		B	x	4	03.08.23	15:50:00	HT08	. Scheffl	I. Mikute	15.0	0.60	0.60	2.2		y	y		y	y	scrap
ITP-0152		441931.860	5942568.540	533743.2842	80718.9370	-5.8	-6.5	0.7	185.2	14.8	55.18	-71.86	2.63	127.04		B	x	4	21.07.23	10:01:00	HT08	. Scheffl	I. Mikute				2.5		n	n		y	y	nothing found
ITP-0153		441932.130	5942560.020	533743.0086	80718.9574	-5.9	-6.4	0.5	172.6	13.8	52.29	-98.56	1.06	150.85		B	x	4	21.07.23	09:32:00	HT08	. Scheffl	I. Mikute				2.5		n	n		y	y	nothing found
ITP-0154		441920.980	5942565.180	533743.1711	80718.3471	-6.1	-6.2	0.1	11.6	0.9	20.28	-0.46	2.31	20.74		D	x	4	21.07.23	10:29:00	HT08	. Scheffl	I. Mikute				2.5		n	n		y	y	nothing found
ITP-0156		442048.390	5942645.450	533745.8191	80725.2283	-9.8	-12.6	2.8	519.3	41.5	30.54	-33.08	5.13	63.62		A	x	4	22.07.23	10:32:00	HT08	. Scheffl	I. Mikute	15.0	0.25	0.60	3.2		y	y		y	y	scrap (tyre)
ITP-0157		442055.680	5942632.350	533745.3981	80725.6339	-9.3	-12.1	2.8	193.4	15.5	5.94	-13.86	4.07	19.81		B	x	4	21.07.23	16:40:00	HT08	. Scheffl	I. Mikute	20.0	3.00	0.04	3.2		y	y		y	y	scrap
ITP-0158		442060.690	5942631.560	533745.3746	80725.9071	-9.1	-12.0	2.9	204.7	16.4	8.82	-14.30	4.53	23.12		B	x	4	22.07.23	09:49:00	HT08	. Scheffl	I. Mikute	15.0	0.25	0.15	2.9		y	y		y	y	scrap (loudspeaker system)
ITP-0161		442276.430	5942733.830	533748.7693	80737.5818	-12.3	-12.6	0.3	5.0	0.5	5.11	-11.44	6.02	16.55		E	x	1	13.05.23	01:05:00	MIRA A	C. Richte	G. Maric				0.1		y	n		y	y	geology
ITP-0162		442279.690	5942736.640	533748.8615	80737.7574	-12.2	-13.4	1.2	18.8	3.0	15.77	-11.51	5.78	27.28		C	x	1	13.05.23	06:59:00	MIRA A	C. Richte	G. Maric				0.8		y	n		y	y	geology
ITP-0166		442296.740	5942763.470	533749.7363	80738.6676	-12.1	-12.6	0.3	26.5	2.4	18.52	-5.92	4.56	24.44		C	x	1	14.05.23	21:46:00	MIRA A	C. Richte	G. Maric	56.0	0.60	0.15	2.2		y	y	x	y	y	15 cm HE projectile
ITP-0174		441117.130	5942119.530	533728.4290	80634.8967	-0.7	-0.3	1.0	61.8	4.9	12.80	-14.78	2.83	27.58		C	x	4	21.08.23	17:12:00	HT08	. Scheffl	I. Mikute	15.0	1.20	0.06	2.5		y	y		y	y	scrap
ITP-1000		442422.780	5942450.840	533739.6712	80745.7365	-9.6	-12.1	2.5	72.1	5.8	5.85	-5.22	4.38	11.06		B	x	32	31.07.23	18:12:00	HT08	. Scheffl	I. Mikute	20.0	2.00	0.05	3.5		y	y		y	y	scrap, hydraulic pipe
ITP-1001		442533.110	5942466.860	533740.2332	80751.7311	-11.7	-13.8	2.1	109.8	8.8	14.27	-9.05	4.33	23.31		B	x	32	19.07.23	16:05:00	HT08	. Scheffl	I. Mikute	20.0	0.70	0.10	2.5		y	y		y	y	scrap
ITP-1002		442292.130	5942476.330	533740.4442	80738.6083	-8.8	-11.6	2.8	105.4	8.4	6.78	-5.65	4.62	12.43		B	x	32	31.07.23	19:12:00	HT08	. Scheffl	I. Mikute	40.0	0.60	0.40	4.0		y	y		y	y	scrap, bucket with bitumen
ITP-1003		442527.280	5942481.460	533740.7033	80751.4041	-12.2	-12.4	0.2	40.9	3.3	87.12	-123.41	3.65	210.53		C	x	32	19.07.23	14:29:00	HT08	. Scheffl	I. Mikute	75.0	10.00	0.05	0.8		y	y		y	y	scrap, steel wire rope, about both targets 1003 and 1004
ITP-1004		442529.720	5942481.780	533740.7146	80751.5367	-12.2	-12.2	0.0	26.8	2.1	56.62	-40.46	1.41	97.08		C	x	32	19.07.23	14:29:00	HT08	. Scheffl	I. Mikute	75.0	10.00	0.05	0.8		y	y		y	y	scrap, steel wire rope, about both targets 1004 and 1003
ITP-1005		442439.420	5942482.810	533740.7122	80746.6210	-10.7	-12.9	2.2	215.5	17.2	19.64	-18.63	4.28	38.27		B	x	32	21.07.23	16:10:00	MIRA A	M. Heinz	G. Maric				2.2		y	n		y	y	geology
ITP-1006		442232.270	5942486.320	533740.7436	80735.3435	-8.3	-11.1	2.8	120.0	9.6	6.33	-7.58	4.62	13.91		B	x	32	01.08.23	08:05:00	HT08	. Scheffl	I. Mikute	15.0	0.70	0.10	4.0		y	y		y	y	SWR (steel wire rope)
ITP-1007		442525.150	5942492.070	533741.0457	80751.2811	-12.4	-12.8	0.4	2198.4	175.9	1377.65	-879.06	3.07	2256.72		A	x	32	22.07.23	04:30:00	MIRA A	D. Mirjani	G. Maric	127.0	1.20	0.30	0.2		y	y	x	y	y	30 cm Wurfkoerper 42 Spr
ITP-1008		442530.630	5942495.320	533741.1530	80751.5772	-13.0	-13.0	0.0	2.1	0.2	740.86	-14.23	4.00	755.09		F		32																n	
ITP-1009		442470.140	5942500.810	533741.3067	80748.2811	-11.8	-13.7	1.9	47.9	3.8	8.07	-2.10	5.30	10.18		C	x	32	21.07.23	22:00:00	MIRA A	D. Mirjani	G. Maric	0.0	0.00	0.00	1.5		n	n		y	y	geology
ITP-1010		442508.170	5942519.600	533741.9297	80750.3385	-12.5	-14.2	1.7	23.9	1.9	6.05	-1.33	5.41	7.38		C	x	32	22.07.23	10:51:00	MIRA A	M. Heinz	G. Maric	1.0	0.05	0.05	1.5		y	y		y	y	scrap
ITP-1011		442573.360	5942522.150	533742.0195	80753.8556	-13.2	-13.7	0.5	18.1	1.4	8.16	-7.88	2.91	16.04		C	x	33	17.08.23	14:35:00	HT08	. Scheffl	I. Mikute	35.0	0.50	0.15	0.6		y	y	x	y	y	15 cm shell, HE, not fired
ITP-1012		442454.140	5942525.070	533742.0853	80747.3940	-11.9	-14.7	2.8	79.5	6.4	6.80	-2.63	5.28	9.44		B	x	32	21.07.23	10:32:00	MIRA A	M. Heinz	G. Maric				2.6		y	n		y	y	geology
ITP-1013		442359.670	5942529.700	533742.1977	80742.2489	-9.5	-13.8	4.3	238.9	19.1	2.81	-10.25	6.26	13.06		B	x	32	21.07.23	09:55:00	MIRA A	M. Heinz	G. Maric				3.2		y	n		y	y	geology
ITP-1014		442532.150	5942533.340	533742.3837	80751.6346	-12.0	-12.0	0.0	2.4	0.2	40.71	0.21	8.98	40.50		F		32																n	
ITP-1015		442333.480	5942534.490	533742.3423	80740.8202	-9.5	-17.2	7.7	933.9	74.7	7.22	-6.51	11.91	13.73		A	x	32	01.08.23	14:30:00	HT08	. Scheffl	I. Mikute	20.0	2.00	0.10	4.0		y	y		y	y	SWR (steel wire rope)
ITP-1016		442400.050	5942540.870	533742.5751	80744.4394	-11.3	-13.6	2.3	168.8	13.5	10.69	-13.29	4.97	23.98		B	x	32	29.05.23	14:30:00	MIRA A	M. Kano	G. Maric	11.0	0.65	0.12	2.5		y	y		y	y	scrap
ITP-1017		442384.450	5942555.630	533743.0465	80743.5804	-11.4	-14.5	3.1	40.3	6.4	8.08	-0.72	4.70	8.80		C	x	1	18.05.23	18:45:00	MIRA A	F. Reiche	G. Maric				2.5		y	n		y	y	geology
ITP-1018		442364.040	5942567.090	533743.4092	80742.4619	-11.3	-13.4	2.1	16.4	2.6	13.62	1.20	7.64	12.41		C	x	1	18.05.23	13:15:00	MIRA A	F. Reiche	G. Maric	17.0	1.45	0.10	2.5		y	y		y	y	scrap
ITP-1019		442561.060	5942549.000	533742.9018	80753.1978	-12.4	-12.7	0.3	4.8	0.4	2.59	-3.04	2.61	5.63		F		32																n	
ITP-1020		442926.640	5942551.780	533743.1357	80813.0948	-14.7	-14.9	0.2	9.6	0.8	11.59	-2.07	2.41	13.66		E		5																n	
ITP-1021		442738.980	5942552.450	533743.0836	80802.8798	-12.4	-12.6	0.2	12.8	1.0	17.98	-2.85	4.02	20.83		D	x	5	17.08.23	15:18:00	HT08	. Scheffl	I. Mikute			2.00	1.50	0.8	y	n		y	y	geology, boulder
ITP-1022		442691.740	5942553.900	533743.1119	80800.3076	-12.0	-12.6	0.6	14.3	1.1	5.60	-3.86	2.88	9.47		D		5																n	
ITP-1023		442362.470	5942584.340	533743.9667	80742.3649	-11.0	-15.6	4.6	30.5	4.9	4.47	0.14	17.86	4.33		C	x	1	18.05.23	06:25:00	MIRA A	C. Richte	G. Maric	10.0	0.90	0.10	3.2		y	y	x	y	y	7.62 cm HE full round

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	veigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-1024		442869.760	5942556.890	533743.2787	80809.9954	-13.8	-14.8	1.0	20.1	1.6	5.08	-5.49	3.12	10.56		C		5																n	
ITP-1025		443139.850	5942557.170	533743.3936	80824.6964	-20.5	-22.3	1.8	31.8	2.5	2.03	-4.91	4.12	6.94		C		5																n	
ITP-1026		442628.240	5942558.390	533743.2322	80756.8482	-12.8	-15.1	2.3	47.1	3.8	4.20	-3.91	4.78	8.11		C		5																n	
ITP-1027		442863.780	5942562.050	533743.4247	80809.6368	-13.6	-14.5	0.9	50.9	4.1	19.58	-9.49	2.43	29.07		C	x	33	31.07.23	05:32:00	MIRA A	D. Mirjani	G. Maric	70.0	0.80	0.20	0.2	Cleared and recovered by MIRA A on 02.08.2023.Handed over to the German EOD Authorities (KBD) on 03.08.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1028		443164.050	5942563.070	533743.5940	80826.0098	-21.1	-21.1	0.0	50.6	4.0	33.03	-59.93	1.97	92.97		C		5																n	
ITP-1029		442358.360	5942599.180	533744.4452	80742.1313	-11.7	-13.7	2.0	26.5	4.2	4.89	-5.00	4.08	9.90		C	x	1	17.05.23	12:33:00	MIRA A	T. Reiche	G. Maric	68.0	1.05	0.38	2.5		y	y	x	y	y	munition box (3 x 7.62cm full rounds)
ITP-1030		442978.780	5942564.820	533743.5781	80815.9242	-15.5	-15.5	0.0	3.5	0.3	3.55	-2.92	1.70	6.47		F		5																n	
ITP-1031		442914.680	5942568.890	533743.6846	80812.4325	-14.6	-16.2	1.6	12.9	1.0	3.48	-1.07	5.30	4.55		D	x	33	26.07.23	13:26:00	HT08	, Scheffl	., Mikute	t	1.60	1.10	0.8		y	n		y	y	boulder
ITP-1032		443017.750	5942570.420	533743.7745	80818.0417	-16.4	-17.0	0.6	9.8	0.8	9.31	-0.97	6.32	10.28		E		5																n	
ITP-1033		442732.740	5942570.680	533743.6710	80802.5281	-12.6	-15.1	2.5	86.4	6.9	13.55	-0.82	8.89	14.37		B	x	33	26.07.23	19:05:00	HT08	, Scheffl	., Mikute	15.0	0.15	0.55	2.5		y	y		y	y	tyre
ITP-1034		442706.610	5942570.810	533743.6649	80801.1058	-12.3	-12.3	0.0	13.9	1.1	34.73	-5.23	1.98	39.96		D	x	33	24.07.23	11:40:00	HT08	, Scheffl	., Mikute	15.0	0.25	0.17	0.3		y	y	x	y	y	3.7 cm Stielgranate 41 HE /warhead
ITP-1035		442358.180	5942620.110	533745.1223	80742.1075	-12.0	-13.7	1.7	16.9	1.2	6.48	-1.35	3.64	7.83		C	x	1	17.05.23	05:34:00	MIRA A	C. Richte	G. Maric				1.5		y	n		y	y	geology
ITP-1036		442459.670	5942571.540	533743.5910	80747.6641	-12.8	-13.3	0.5	7.5	0.6	9.50	0.82	2.68	8.67		E		33																n	
ITP-1037		442834.440	5942572.360	533743.7654	80808.0626	-13.0	-13.2	0.2	4.9	0.4	5.58	-1.97	2.81	7.55		F		33																n	
ITP-1038		442446.390	5942573.560	533743.6511	80746.9399	-12.8	-13.5	0.7	28.4	2.3	23.09	-1.26	6.21	24.35		C	x	33	22.07.23	16:25:00	MIRA A	M. Heinze	G. Maric	14.0	0.60	0.60	1.5		y	y		y	y	tyre
ITP-1039		442963.150	5942575.690	533743.9236	80815.0663	-16.2	-16.2	0.0	5.4	0.4	12.28	-3.29	4.75	15.57		E		5																n	
ITP-1040		442404.090	5942575.890	533743.7098	80744.6359	-11.5	-12.6	1.1	10.2	0.8	2.74	-2.45	3.68	5.20		D	x	1	29.05.23	13:40:00	MIRA A	M. Kano	G. Maric				1.1		y	n		y	y	geology
ITP-1041		442677.960	5942576.430	533743.8355	80759.5426	-12.3	-15.4	3.1	59.2	4.7	3.76	-3.19	5.85	6.95		C	x	33	24.07.23	18:45:00	HT08	, Scheffl	., Mikute	10.0	0.40	0.20	3.3		y	y		y	y	scrap
ITP-1042		443092.080	5942576.470	533743.9994	80822.0835	-19.2	-19.2	0.0	4.9	0.4	9.04	-3.28	1.81	12.32		F		5																n	
ITP-1043		442129.900	5942576.770	533743.6294	80729.7110	-7.9	-11.8	3.9	158.3	12.7	4.75	-4.82	5.83	9.58		B	x	32	02.08.23	08:30:00	HT08	, Scheffl	., Mikute	10.0	0.55	0.40	4.0		y	y		y	y	scrap, steel plate
ITP-1044		442699.260	5942577.840	533743.8895	80800.7010	-11.9	-12.8	0.9	469.7	37.6	201.01	-100.42	4.90	301.43		A	x	33	24.07.23	11:55:00	HT08	, Scheffl	., Mikute	20.0	4.00	0.04	1.4		y	y		y	y	scrap, steel wire rope
ITP-1045		442795.700	5942578.330	533743.9433	80805.9500	-12.4	-12.4	0.0	4.9	0.4	6.79	-4.78	3.61	11.57		F		33																n	
ITP-1046		442959.570	5942578.430	533744.0109	80814.8696	-16.3	-16.3	0.0	8.2	0.7	40.40	-3.86	2.00	44.26		E		5																n	
ITP-1047		442777.940	5942578.920	533743.9554	80804.9829	-12.6	-13.5	0.9	53.2	4.3	2.35	-23.08	3.13	25.43		C	x	33	25.07.23	12:05:00	HT08	, Scheffl	., Mikute	17.0	1.00	0.10	1.2		y	y	x	y	y	10.5 cm HE full round
ITP-1048		443037.820	5942581.510	533744.1412	80819.1268	-18.0	-18.0	0.0	37.2	3.0	54.37	-42.42	1.89	96.79		C		5																n	
ITP-1049		442896.080	5942581.850	533744.0966	80811.4115	-14.6	-15.6	1.0	258.2	20.7	72.80	-71.75	3.28	144.55		B	x	33	26.07.23	20:05:00	HT08	, Scheffl	., Mikute	75.0	5.00	0.05	1.0		y	y		y	y	SWR (steel wire rope)
ITP-1050		442788.220	5942582.730	533744.0827	80805.5400	-12.5	-13.4	0.9	36.5	2.9	9.95	-11.34	3.61	21.29		C	x	33	31.07.23	12:18:00	HT08	, Scheffl	., Mikute	15.0	0.49	0.10	1.2		y	y	x	y	y	10.5 cm shell,chemical agents, German: hand over to GEKA 01.08.2023
ITP-1051		442929.880	5942582.980	533744.1465	80813.2505	-15.4	-16.4	1.0	22.9	1.8	5.40	-6.00	3.61	11.40		C	x	33	26.07.23	13:00:00	HT08	, Scheffl	., Mikute	20.0	0.95	0.12	1.2		y	y		y	y	scrap
ITP-1052		442853.650	5942584.070	533744.1518	80809.1005	-13.4	-14.6	1.2	11.0	0.9	3.43	-1.38	3.65	4.81		D	x	33	26.07.23	19:30:00	HT08	, Scheffl	., Mikute	10.0	1.00	0.08	1.4		y	y		y	y	scrap
ITP-1053		442698.570	5942584.680	533744.1105	80800.6589	-12.5	-12.5	0.0	18.6	1.5	67.09	-17.76	3.22	84.85		C	x	33	24.07.23	11:25:00	HT08	, Scheffl	., Mikute	20.0	5.00	0.04	0.4		y	y		y	y	scrap, steel wire rope
ITP-1054		442306.060	5942711.600	533748.0618	80739.2095	-12.7	-15.5	2.8	42.4	6.8	5.51	-5.72	4.80	11.23		C	x	1	15.05.23	23:06:00	MIRA A	C. Richte	G. Maric				2.2		y	n		y	y	geology
ITP-1055		442944.250	5942585.150	533744.2223	80814.0313	-15.9	-16.1	0.2	27.1	2.2	42.22	-5.47	3.44	47.69		C		5																n	
ITP-1056		442427.520	5942585.360	533744.0255	80745.9050	-12.5	-12.5	0.0	1.1	0.1	28.79	0.18	6.92	28.61		F	x	1	19.07.23	14:30:00	MIRA A	M. Heinze	G. Maric				0.0		y	n		y	y	geology
ITP-1057		442507.470	5942586.250	533744.0859	80750.2561	-13.1	-15.4	2.3	115.5	9.2	18.39	-2.53	4.61	20.93		B	x	33	23.07.23	11:50:00	HT08	, Scheffl	., Mikute	15.0	0.35	0.20	2.5		y	y		y	y	scrap
ITP-1058		442572.160	5942586.380	533744.1156	80753.7772	-13.5	-14.2	0.7	12.3	1.0	6.12	-3.63	3.02	9.74		D	x	33	23.07.23	17:38:00	HT08	, Scheffl	., Mikute	20.0	0.50	0.25	2.5		y	y	x	y	y	munition box (4 x 5 cm HE cartridge)
ITP-1059		442815.710	5942586.400	533744.2123	80807.0339	-13.0	-14.0	1.0	18.3	1.5	4.27	-4.35	2.34	8.61		C	x	33	25.07.23	13:07:00	HT08	, Scheffl	., Mikute	10.0	0.60	0.05	0.5		y	y		y	y	scrap
ITP-1060		442306.350	5942722.850	533748.4259	80739.2178	-12.5	-14.1	1.6	15.4	1.1	1.99	-2.44	2.57	4.43		C	x	1	15.05.23	10:02:00	MIRA A	M. Kano	G. Maric				1.5		y	n		y	y	geology
ITP-1061		442992.320	5942587.950	533744.3318	80816.6459	-16.9	-16.9	0.0	10.0	0.8	83.83	-9.25	1.90	93.08		D	x	5	18.08.23	09:45:00	HT08	, Scheffl	., Mikute	70.0	0.80	0.20	0.2		y	y	x	y	y	SD 70, German HE aerial bomb; recovered and moved to wetstore; position for SD70 No. 33; 442146,9 E ; 5943268,9 N
ITP-1062		442278.450	5942732.430	533748.7248	80737.6927	-12.3	-15.8	3.5	234.3	37.5	16.12	-23.84	5.65	39.96		B	x	1	15.05.23	16:02:00	MIRA A	M. Kano	G. Maric	100.4	0.78	0.22	3.5		y	y	x	y	y	22 cm HE projectile (French origin)
ITP-1063		442949.500	5942589.800	533744.3748	80814.3140	-15.9	-15.9	0.0	1.4	0.1	4.25	-2.80	1.65	7.05		F		5																n	
ITP-1064		442296.050	5942739.730	533748.9680	80738.6459	-12.1	-15.5	3.4	20.3	3.3	2.37	-1.74	5.49	4.11		C	x	1	15.05.23	09:25:00	MIRA A	M. Kano	G. Maric				2.2		y	n		y	y	geology
ITP-1065		442449.620	5942594.520	533744.3306	80747.1018	-13.7	-13.9	0.2	8.5	0.7	11.48	-2.16	3.71	13.64		E		33																n	
ITP-1066		442469.460	5942594.570	533744.3400	80748.1817	-13.9	-14.3	0.4	173.6	13.9	71.38	-94.26	2.95	165.63		B	x	33	23.07.23	10:50:00	HT08	, Scheffl	., Mikute	20.0	1.00	0.30	1.2		y	y		y	y	scrap
ITP-1067		442376.950	5942752.530	533749.4142	80743.0409	-13.9	-14.0	0.1	368.3	58.9	909.88	-779.33	1.85	1689.20		A	x	2	14.05.23	02:54:00	MIRA A	C. Richte	G. Maric	200.0	1.55	0.80	1.5		y	y		y	y	steel plate
ITP-1068		442698.350	5942548.240	533742.9314	80800.6711	-12.2	-13.1	0.9	27.4	2.2	12.01	-3.73	3.79	15.75		C		5																n	
ITP-1069		442379.660	5942755.250	533749.5033	80743.1866	-14.0	-14.4	0.0	177.2	28.3	13.89	-178.87	3.33	192.76		B	x	2	14.05.23	09:08:00	MIRA A	M. Kano	G. Maric	25.0	1.05	0.38	0.8		y	y	x	y	y	munition box (3 x 7.62cm full rounds)
ITP-1070		442994.900	5942600.310	533744.7327	80816.7782	-16.6	-16.6	0.0	5.4	0.4	40.94	-6.88	1.26	47.82		E		5																n	
ITP-1071		443040.050	5942600.560	533744.7584	80819.2356	-17.9	-18.0	0.1	117.6	9.4	7.46	-123.24	2.13	130.70		B		5																n	
ITP-1072		442730.480	5942601.340	533744.6621	80802.3848	-12.6	-12.6	0.0	2.5	0.2	8.47	-3.79	4.53	12.26		F		31																n	
ITP-1073		443020.860	5942602.140	533744.8021	80818.1900	-16.9	-16.9	0.0	1.1	0.1	9.10	-1.84	1.41	10.94		F		5																n	
ITP-1074		442877.120	5942602.260	533744.7495	80810.3660	-14.4	-14.4	0.0	1.6	0.1	4.36	-0.35	2.00	4.71		F		31																n	
ITP-1075		442276.790	5942769.710	533749.9303	80737.5775	-12.4	-15.1	2.7	19.8	3.2	8.28	-0.32	16.18	8.60		C	x	1	12.05.23	18:19:00	MIRA A	M. Kano	G. Maric				2.5		y	n		y	y	geology
ITP-1076		442242.320	5942770.450	533749.9406	80735.7007	-11.6	-13.4	1.8	15.9	1.6	3.67	-2.51	3.79	6.17		C	x	1	12.05.23	19:00:00	MIRA A	M. Kano	G. Maric				1.5		y	n		y	y	geology
ITP-1077		442992.720	5942603.650	533744.8399	80816.6573	-16.4	-16.6	0.2	22.1	1.8	23.88	-19.51	2.44	43.39		C	x	5	18.08.23	09:30:00	HT08	, Scheffl	., Mikute	15.0	0.45	0.10	0.3		y	y	x	y	y	10.5 cm german shell, chemical, not fired
ITP-1078		442188.910	5942780.050	533750.2299	80732.7870	-11.6	-14.6	3.0	555.6	88.9	57.15	-86.58	4.48	143.73		A	x	1	21.05.23	09:06:00	MIRA A	T. Reiche	G. Maric	402.0	2.00	0.33	1.5		y	y		y	y	scrap
ITP-1079		442254.920	5942790.290	533750.5875	80736.3733	-12.7	-14.7	2.0	19.1	3.1	15.31	0.29	7.26	15.02		C	x	1	12.05.23	13:02:00	MIRA A	M. Kano	G. Maric	3.0	3.00	0.02	2.2		y	y		y	y	SWR (steel wire rope)
ITP-1080		442214.320	5942792.470	533750.6419	80734.1618	-12.1	-14.5	2.4	173.6	27.8	57.24	-52.54	7.03	109.78		B	x	1	20.05.23	14:21:00	MIRA A	T. Reiche	G. Maric				0.5		y	n		y	y	geology
ITP-1081		442859.000	5942605.280	533744.8401	80809.3777	-13.9	-16.1	2.2	43.7	3.5	6.25	-2.33	4.66	8.59		C	x	31	22.06.23	17:00:00	HT08	, Scheffl	., Mikute	25.0	1.00	0.10	2.5		y	y	x	y	y	10.5 cm HE full round
ITP-1082		442256.840	5942793.630	533750.6963	80736.4755	-12.8	-14.8	2.0	140.9	22.5	2.25	-44.23	6.45	46.49		B	x	1	12.05.23	12:32:00	MIRA A	M. Kano	G. Maric	9.0	8.00	0.02	2.2		y	y		y	y	SWR (steel wire rope)
ITP-1083		442780.760	5942607.540	533744.8825	80805.1175	-12.7	-12.7	0.0	11.0	0.9	12.80	-5.78	1.72	18.58		D	x	31	23.06.23	10:45:00	HT08	, Scheffl	., Mikute	10.0	0.40	0.10	0.2		y	y	x	y	y	10.5 cm projectile, not fired
ITP-1084		442210.840	5942796.600	533750.7741	80733.9696	-11.8	-13.4	1.6	97.5	15.6	15.32	-53.81	3.73	69.13		B	x	1	20.05.23	14:01:00	MIRA A	C. Richte	G. Maric				0.5		y	n		y	y	geology
ITP-1085		442175.000	5942796.930	533750.7706	80732.0185	-11.1	-13.0	1.9	66.1	10.6	20.81	-22.79	3.60	43.59		C	x	1	11.05.23	00:51:00	MIRA A	C. Richte	G. Maric				1.5		y	n		y	y	thin metal sheet, fell apart
ITP-1086		442985.170	5942608.660	533744.9990	80816.2431	-15.9	-16.4	0.5	33.2	2.7	32.89	-3.06	2.83	35.95		C	x	5	18.08.23	09:40:00	HT08	, Scheffl	., Mikute	90.0	0.75	0.21	0.5		y	y	x	y	y	21 cm german shell, HE, not fired
ITP-1087		442597.260	5942609.620	533744.8775	80755.1280	-13.2	-13.2	0.0	1.1	0.1	11.91	-1.92	1.44	13.83		F		31																n	
ITP-1088		442916.700	5942611.610	533745.0676	80812.5142	-15.2	-15.9	0.7	84.6	6.8	28.37	-24.26	2.79	52.64		B	x	33	26.07.23	12:35:00	HT08	, Scheffl	., Mikute	60.0	0.90	0.25	1.1		y	y		y	y	scrap
ITP-1089		442644.390	5942612.670	533744.9948	80757.6913	-12.7	-13.3	0.6	11.9	0.9	1.94	-7.14	5.16	9.07		D	x	31	09.06.23	11:25:00	HT08	, Scheffler		25.0	1.00	0.50	0.5		y	y		y	y	scrap
ITP-1090		443012.980	5942613.020	533745.1510	80817.7539	-16.9	-17.2	0.3	41.6	3.3	21.06	-22.99	2.55	44.06		C	x	5	18.08.23	09:00:00	HT08	, Scheffl	., Mikute	15.0	0.45	0.10	0.3		y	y	x	y	y	10.5 cm german shell, chemical, not fired
ITP-1091		442627.600	5942613.560	533745.0169	80756.7768	-13.0	-13.8	0.8	57.7	4.6	12.39	-18.82	2.76	31.20		C	x	31	09.06.23	11:45:00	HT08	, Scheffler		25.0	0.50	0.15	0.8		y	y		y	y	scrap
ITP-1092		442403.300	5942614.260	533744.9509	80744.5674	-12.9	-14.0	1.1	26.7	2.1	10.01	-3.43	4.08	13.44		C	x	1	29.05.23	07:53:00	MIRA A	M. Kano	G. Maric	5.0	1.05	0.13	1.2		y	y		y	y	scrap
ITP-1093		442551.200	5942614.740	533745.0249	80752.6175	-12.8	-14.2	1.4	49.9	4.0	8.81	-8.51	2.94	17.32		C	x	31	09.06.23	11:11:00	HT08	, Scheffler		10.0	1.20	0.04	0.5		y	y		y	y	SWR (steel wire rope)
ITP-1094		442838.310	5942615.580	533745.1653	80808.2447	-14.1	-16.3	2.2	137.5	11.0	6.56	-15.73	4.29	22.28		B	x	31	22.06.23	10:40:00	HT08	, Scheffl	., Mikute	20.0	0.50	0.20	2.2		y	y		y	y	scrap
ITP-1095		442471.390	5942616.550	533745.0520	80748.2721	-14.5	-14.5	0.0	13.9	1.1	21.27	-16.84	2.04	38.11		D	x	31	07.06.23	09:20:00	HT08	, Scheffler		15.0	1.40	0.05	0.3		y	y		y	y	SWR (steel wire rope)
ITP-1096		442803.750	5942616.600	533745.1847	80806.3629	-12.9	-14.0	1.1	387.5	31.0	235.35	-2.53	12.95	237.88		A	x	31	14.06.23	16:05:00	HT08	, Scheffler		3500.0	20.00	0.30	1.5		y	y		y	y	scrap, chain
ITP-1097		443097.330	5942617.800	533745.3387	80822.3421	-19.5	-21.4	1.9	475.2	38.0	44.82	-60.65	4.00	105.47		A		5																n	
ITP-1098		442311.600	5942619.940	533745.0983	80739.5722	-11.1	-13.6	2.5	63.0	5.0	7.63	-2.72	5.00	10.35		C	x	1	29.05.23	20:30:00	MIRA A	C. Richte	G. Maric				2.2		y	n		y	y	geology
ITP-1099		442879.270	5942620.050	533745.3260	80810.4713	-14.1	-16.1	2.0	913.6	73.1	366.69	0.09	1.54	366.59		A	x	31	21.06.23	16:40:00	HT08	, Scheffl	., Mikute	60.0	0.60	0.21	2.2		y	y	x	y	y	21 cm shell, not fired
ITP-1100		443004.330	5942621.060	533745.4077	80817.2778	-16.6	-16.7	0.1	12.4	1.0	7.06	-11.24	2.24	18.31		D	x	5	18.08.23	08:45:00	HT08	, Scheffl	., Mikute	15.0	0.45	0.10	0.1		y	y	x	y	y	10.5 cm german shell, chemical, not fired
ITP-1101		442733.510	5942621.660	533745.3207	80802.5363	-12.7	-13.3	0.6	44.2	3.5	82.90	3.42	11.09	79.48		C	x	31	23.06.23	17:40:00	HT08	, Scheffl	., Mikute	100.0	0.40	0.40	0.2		y	y	x	y	y	3.7 cm cartridge ammo box
ITP-1102		442803.050	5942623.380	533745.4038	80806.3203	-12.9	-13.2	0.3	76.6	6.1	94.03	-11.52	3.97	105.55		B	x	31	14.06.23	16:05:00	HT08	, Scheffler		3500.0	20.00	0.30	0.7		y	y		y	y	scrap, chain
ITP-1103		442172.970	5942858.770	533752.7706	80731.8666	-12.4	-15.1	0.1	15.9	1.9	2.36	-1.45	4.39	3.81		C	x	1	11.05.23	17:10:00	MIRA A	M. Kano	G. Maric				0.5		y	n		y	y	geology
ITP-1104		442918.770	5942624.970	533745.5007	80812.6181	-14.9	-15.1	0.2	10.7	0.9	2.54	-10.40	5.46	12.94		D	x	33	26.07.23	12:20:00	HT08	, Scheffl	., Mikute	10.0	0.60	0.45	0.5		y	y		y	y	scrap
ITP-1105		442168.620	5942864.680	533752.9601	80731.6259	-12.5	-13.5	1.0	15.1	1.4	14.28	-1.09	4.16	15.37		C	x	1	11.05.23	11:51:00	MIRA A	M. Kano	G. Maric	14.0	0.45	0.14	1.2		y	y	x	y	y	30 lbs MK1 incendiary bomb
ITP-1106		442775.040	5942628.360	533745.5539	80804.7924	-13.1	-14.2	1.1	34.3	2.7	9.89	-6.01	3.39	15.90		C	x	31	23.06.23	11:00:00	HT08	, Scheffl	., Mikute	20.0	0.50	0.13	0.2		y	y	x	y	y	12.8 cm shell, not fired
ITP-1107		442470.730	5942630.620	533745.5069	80748.2268	-14.5	-14.5	0.0	74.4	6.0	64.13	-77.73	2.15	141.86		B	x	31	07.06.23	09:57:00	HT08	, Scheffler		5.0	1.60	0.03	0.4		y	y		y	y	SWR (steel wire rope)
ITP-1109		442856.700	5942632.220	533745.7109	80809.2347	-13.7	-14.5	0.8	35.4	2.8	15.33	-11.57	3.50	26.90		C	x	31	22.06.23	10:45:00	HT08	, Scheffl	., Mikute	10.0	0.60	0.40	1.5		y	y		y	y	scrap

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

total		finsihed	open	
45	Prio1:	45	0	targets piling area
56	Prio 2:	56	0	bearthing zone
393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
47	Prio 3.2:	47	0	barge area
59	Prio 3.3:	59	0	dredge area safety zone
229	Prio 4:	229	0	pipe routes
31	Prio 5:	31	0	outside
>50 kg 43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg 74	Prio 7:	74	0	not dredged survey
>50 kg 72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP No.	SSS Contact No.	UTM zone 32N/ETRS 89 East (mE)	UTM zone 32N/ETRS 89 North (mN)	WGS84 Latitude (deg, min,sec)	WGS84 Longitude (deg, min,sec)	SKN water depth (m)	target depth SKN (m)	model depth b. g. (m)	model weigt (kg)	magn. moment (Am²)	max (nT)	min (nT)	dist max-min (m)	p-p max-min (nT)	ITP notes ST-Project No.	munition category	in/out scope (in=x)	Priotity area	date inspection	time of clearance	vessel	EOD	GEO	weigHT0 (kg)	length (m)	width/ diameter (m)	depth b. ground (m)	TR comment	found (y/n)	salvage (y/n)	UXO (X)	clear (y,n, w)	clear QA (y/n)	inspection results
ITP-1110		442140.080	5942878.500	533753.3958	80730.0631	-12.1	-12.6	0.0	11.2	1.8	6.00	-6.96	3.29	12.96		D	x	1	11.05.23	11:04:00	MIRA A	M. Kano	G. Maric	10.4	0.45	0.12	1.4		y	y		y	y	scrap
ITP-1111		442839.910	5942632.460	533745.7120	80808.3206	-14.2	-14.2	0.0	44.2	3.5	29.46	-14.42	3.65	43.88		C	x	31	22.06.23	10:30:00	HT08	. Scheffl	. Mikutei	40.0	0.50	0.15	0.2		y	y	x	y	y	15 cm shell, not fired
ITP-1112		442359.230	5942632.660	533745.5288	80742.1563	-12.4	-13.0	0.6	18.0	1.4	11.47	-6.02	3.03	17.49		C	x	1	29.05.23	02:07:00	MIRA A	M. Kano	G. Maric	25.0	1.05	0.12	1.6		y	y	x	y	y	7.62 cm full round (not fused)
ITP-1113		442699.210	5942633.540	533745.6916	80800.6614	-12.4	-12.4	0.0	7.6	0.6	1.62	-9.48	2.45	11.10		E		31																n	
ITP-1114		442873.630	5942635.130	533745.8117	80810.1543	-13.0	-13.1	0.1	40.3	3.2	21.36	-30.61	1.84	51.97		C	x	31	21.06.23	15:35:00	HT08	. Scheffl	. Mikuteit				1.2	geology, dreged by airlift	y	n		y	y	geology, dredged away by airlift
ITP-1115		442262.780	5942636.280	533745.6076	80736.9040	-10.3	-10.3	0.0	7.1	0.6	9.72	-8.58	3.12	18.30		E		32																n	
ITP-1116		442131.930	5942638.120	533745.6152	80729.7804	-9.5	-12.5	3.0	590.8	47.3	42.94	-24.71	5.88	67.65		A	x	32	22.07.23	17:13:00	HT08	. Scheffl	. Mikutei	100.0	1.50	1.20	4.0		y	y		y	y	scrap
ITP-1117		442562.600	5942639.000	533745.8144	80753.2219	-13.3	-14.8	1.5	11.2	0.9	4.27	-0.63	5.12	4.90		D	x	31	23.07.23	10:26:00	HT08	. Scheffl	. Mikutei		1.50	1.50	1.0		y	n		y	y	boulder
ITP-1118		442364.800	5942639.330	533745.7468	80742.4551	-12.5	-12.6	0.1	3.5	0.3	7.66	0.06	4.23	7.60		F	x	1	19.07.23	15:11:00	MIRA A	M. Heinz	G. Maric	9.0	0.25	0.15	1.2		y	y		y	y	boulder
ITP-1119		442738.410	5942640.090	533745.9190	80802.7908	-12.6	-12.6	0.0	28.7	2.3	47.78	-24.13	2.63	71.90		C	x	31	23.06.23	17:00:00	HT08	. Scheffl	. Mikutei	20.0	1.00	0.10	0.1		y	y	x	y	y	10.5 cm HE full round
ITP-1120		442869.360	5942641.050	533746.0015	80809.9180	-14.6	-14.6	0.0	8.9	0.7	14.12	-4.95	2.24	19.07		E		31																n	
ITP-1121		442675.960	5942641.560	533745.9419	80759.3905	-12.9	-12.9	0.0	46.1	3.7	34.27	-53.02	1.70	87.29		C	x	31	12.06.23	08:05:00	HT08	. Scheffler		10.0	1.00	0.04	0.2		y	y		y	y	scrap, Steel wire
ITP-1122		442632.680	5942641.730	533745.9304	80757.0346	-12.8	-13.8	1.0	16.3	1.3	4.26	-4.72	3.54	8.98		C	x	31	25.06.23	18:05:00	HT08	. Scheffl	. Mikutei	10.0	0.40	0.08	1.5		y	y		y	y	scrap
ITP-1123		443098.240	5942642.790	533746.1476	80822.3752	-19.3	-20.7	1.4	70.9	5.7	24.61	-6.84	4.67	31.45		B		5																n	
ITP-1124		442709.490	5942643.800	533746.0276	80801.2141	-12.5	-12.6	0.1	22.6	1.8	20.40	-10.18	1.84	30.58		C	x	31	24.06.23	17:25:00	HT08	. Scheffl	. Mikutei	60.0	0.50	0.17	0.2		y	y	x	y	y	17 cm shell, not fired
ITP-1125		443001.540	5942643.800	533746.1424	80817.1110	-17.5	-17.5	0.0	7.9	0.6	29.52	-9.12	1.84	38.64		E		5																n	
ITP-1126		442784.760	5942644.840	533746.0909	80805.3105	-13.2	-13.3	0.1	163.3	13.1	210.20	-102.33	2.81	312.53		B	x	31	23.06.23	11:35:00	HT08	. Scheffl	. Mikutei	15.0	0.80	0.15	0.2		y	y	x	y	y	3.7 cm Stielgranate 41 (German origin)
ITP-1127		442688.740	5942644.980	533746.0576	80800.0839	-12.7	-12.7	0.0	16.6	1.3	24.71	-19.51	2.24	44.22		C	x	31	12.06.23	08:45:00	HT08	. Scheffler		10.0	1.00	0.04	0.2		y	y		y	y	scrap
ITP-1128		442819.240	5942607.920	533744.9099	80807.2118	-13.2	-14.1	0.9	50.1	4.0	12.89	-16.76	4.02	29.65		C	x	31	14.06.23	16:45:00	HT08	. Scheffler		50.0	0.25	0.30	0.3		y	y		y	y	scrap
ITP-1129		442589.200	5942648.840	533746.1433	80754.6632	-13.0	-13.8	0.8	9.6	0.8	4.05	-1.76	2.95	5.82		E		31																n	
ITP-1130		442292.470	5942652.640	533746.1488	80738.5091	-11.5	-13.1	1.6	28.6	2.3	3.44	-2.77	3.72	6.20		C	x	1	30.05.23	02:29:00	MIRA A	C. Richte	G. Maric				0.0		n	n		y	y	nothing found
ITP-1131		442107.840	5942654.820	533746.1459	80728.4580	-9.6	-11.4	1.8	19.9	1.6	0.72	-3.20	3.98	3.92		C	x	32	31.05.23	03:33:00	MIRA A	M. Kano	G. Maric				1.7		y	n		y	y	boulder
ITP-1132		442228.190	5942656.500	533746.2481	80735.0077	-10.0	-11.0	1.0	16.4	1.3	8.01	-1.12	3.54	9.13		C	x	32	25.07.23	18:30:00	HT08	. Scheffl	. Mikutei	25.0	0.35	0.35	1.2		y	y	x	y	y	munition box (8 x S-Mine 44)
ITP-1133		442625.160	5942658.840	533746.4810	80756.6139	-12.6	-15.1	2.5	49.4	4.0	6.17	-1.68	4.33	7.84		C	x	31	24.06.23	19:00:00	HT08	. Scheffl	. Mikutei	50.0	0.70	0.40	2.5		y	y	x	y	y	3.7 cm cartridge ammo box with 30 EA
ITP-1134		442941.580	5942660.840	533746.6702	80813.8360	-15.5	-15.5	0.0	3.9	0.3	14.88	-1.01	2.41	15.88		F		5																n	
ITP-1135		442834.900	5942661.040	533746.6348	80808.0290	-13.8	-14.6	0.8	44.9	3.6	12.27	-16.31	2.41	28.58		C	x	31	24.06.23	11:00:00	HT08	. Scheffl	. Mikutei	5.0	0.50	0.40	1.2		y	y		y	y	scrap
ITP-1136		442748.870	5942661.400	533746.6126	80803.3460	-12.7	-12.7	0.0	15.4	1.2	27.19	-13.58	2.00	40.77		C	x	31	10.06.23	18:21:00	HT08	. Mikutei	Gebhar	40.0	0.48	0.17	0.3		y	y	x	y	y	17 cm HE shell
ITP-1137		442741.130	5942662.240	533746.6367	80802.9241	-13.2	-13.2	0.0	4.7	0.4	16.83	-0.90	3.79	17.73		F		31																n	
ITP-1138		442711.800	5942662.400	533746.6303	80801.3276	-12.6	-12.8	0.2	15.5	1.2	16.17	-5.15	2.15	21.32		C	x	31	11.06.23	13:06:00	HT08	. Mikutei	Gebhar	49.0	0.48	0.17	0.5		y	y	x	y	y	17 cm HE shell
ITP-1139		442568.540	5942664.070	533746.6279	80753.5285	-12.9	-14.5	1.6	49.5	4.0	9.75	-5.40	3.74	15.16		C	x	31	25.06.23	19:00:00	HT08	. Scheffl	. Mikutei	70.0	0.80	0.20	3.5	Recovered and cleared by MIRA A on 27.07.2023. Handed over to the German EOD Authorities (KBD) on 27.07.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb; wet store on position x 442565.44; y 5942650.74
ITP-1140a		442351.990	5942664.380	533746.5522	80741.7411	-12.5	-12.5	0.0	8.0	0.6	10.24	-5.51	2.15	15.74		E	x	1	19.07.23	15:50:00	MIRA A	M. Heinz	G. Maric	6.0	0.30	0.07	0.3		y	y	x	y	y	7.62 cm HE projectile
ITP-1140b		442351.990	5942664.380	533746.5522	80741.7411	-12.5	-12.5	0.0	8.0	0.6	10.24	-5.51	2.15	15.75		E	x	1	19.07.23	15:55:00	MIRA A	M. Heinz	G. Maric	6.0	0.30	0.07	0.3		y	y	x	y	y	7.62 cm HE projectile
ITP-1140c		442354.700	5942663.300	533746.5183	80741.8893	-12.5	-12.5	0.0	8.0	0.6	10.24	-5.51	2.15	15.74		E	x	1	19.07.23	15:57:00	MIRA A	M. Heinz	G. Maric	6.0	0.30	0.07	0.4		y	y	x	y	y	7.62 cm HE projectile
ITP-1140d		442353.600	5942663.600	533746.5276	80741.8292	-12.5	-12.5	0.0	8.0	0.6	10.24	-5.51	2.15	15.74		E	x	1	19.07.23	16:00:00	MIRA A	M. Heinz	G. Maric	6.0	0.30	0.07	0.3		y	y	x	y	y	7.62 cm HE projectile
ITP-1140e		442353.000	5942665.700	533746.5953	80741.7952	-12.6	-12.6	0.0	8.0	0.6	10.24	-5.51	2.15	15.74		E	x	1	19.07.23	20:55:00	MIRA A	D. Mirjani	G. Maric	6.0	0.30	0.07	0.5		y	y	x	y	y	7.62 cm HE projectile
ITP-1141		442588.490	5942668.060	533746.7648	80754.6118	-12.6	-13.4	0.8	7.1	0.6	4.61	-0.75	3.25	5.36		E		31																n	
ITP-1142		443078.990	5942668.180	533746.9615	80821.3106	-19.8	-19.8	0.0	3.7	0.3	15.50	-3.76	1.61	19.26		F		5																n	
ITP-1143		442702.550	5942668.200	533746.8143	80800.8202	-12.6	-12.7	0.1	20.9	1.7	20.61	-12.41	2.60	33.02		C	x	31	12.06.23	13:50:00	HT08	. Scheffler		50.0	0.60	0.40	0.5		y	y		y	y	scrap, Concrete block with chain
ITP-1144		442737.320	5942668.470	533746.8368	80802.7126	-13.1	-14.0	0.9	50.0	4.0	22.65	-11.60	4.00	34.25		C	x	31	10.06.23	18:53:00	HT08	D. Mikutei	Gebhar	40.0	0.48	0.17	1.1		y	y	x	y	y	17 cm HE shell
ITP-1145		442991.450	5942669.110	533746.9573	80816.5450	-15.9	-16.2	0.3	40.4	3.2	14.70	-22.21	2.94	36.91		C		5																n	
ITP-1146		442620.720	5942669.880	533746.8364	80756.3649	-12.6	-13.9	1.3	79.0	6.3	19.98	-15.33	3.67	35.31		B	x	31	24.06.23	17:45:00	HT08	. Scheffl	. Mikutei	70.0	1.00	0.20	0.5	Recovered and cleared by MIRA A on 27.07.2023. Handed over to the German EOD Authorities (KBD) on 27.07.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1147		443000.770	5942670.340	533747.0008	80817.0515	-16.1	-16.1	0.0	1.8	0.1	44.26	0.04	0.83	44.22		F		5																n	
ITP-1148		442707.480	5942670.550	533746.8923	80801.0870	-12.8	-12.9	0.1	20.5	1.6	14.02	-13.93	1.92	27.95		C	x	31	11.06.23	12:43:00	HT08	D. Mikuteit		80.0	1.10	0.80	0.5		y	y		y	y	scrap
ITP-1149		442675.250	5942672.300	533746.9362	80759.3315	-12.7	-12.9	0.2	19.6	1.6	11.96	-12.08	2.43	24.04		C	x	31	13.06.23	09:40:00	HT08	. Scheffler		30.0	0.70	0.50	0.2		y	y		y	y	scrap
ITP-1150		442805.570	5942672.540	533746.9953	80806.4249	-13.9	-13.9	0.0	1.3	0.1	7.22	-2.17	2.56	9.39		F		31																n	
ITP-1151		442882.420	5942672.780	533747.0333	80810.6079	-14.4	-14.4	0.0	1.6	0.1	6.68	-14.52	2.91	21.21		F		33																n	
ITP-1152		442419.850	5942673.370	533746.8700	80745.4288	-12.6	-13.0	0.4	7.3	0.6	2.92	-4.14	2.67	7.06		E		2																n	
ITP-1153		442797.570	5942673.870	533747.0352	80805.9886	-13.6	-13.6	0.0	3.3	0.3	2.80	-8.47	2.04	11.27		F		31																n	
ITP-1154		442990.060	5942673.920	533747.1124	80816.4662	-16.0	-16.0	0.0	21.3	1.7	62.39	-60.77	1.79	123.16		C		5																n	
ITP-1155		442922.850	5942674.320	533747.0990	80812.8076	-13.9	-15.1	1.2	26.1	2.1	8.93	-4.53	3.67	13.46		C	x	5	24.08.23	13:02:00	HT08	. Scheffl	. Mikutei	10.0	0.70	0.04	3.4		y	y		y	y	scrap
ITP-1156		443031.330	5942675.180	533747.1694	80818.7118	-17.9	-19.3	1.4	23.8	1.9	8.18	-2.78	4.18	10.97		C		5																n	
ITP-1157a		442356.740	5942675.320	533746.9081	80741.9923	-13.1	-14.5	1.4	24.4	2.0	7.57	-2.60	4.28	10.18		C	x	1	28.05.23	19:15:00	MIRA A	M. Kano	G. Maric	54.0	1.05	0.38	1.5		y	y	x	y	y	munition box (3 x 7.62cm full rounds)
ITP-1157b		442356.740	5942675.320	533746.9081	80741.9923	-13.1	-14.5	1.4	24.4	2.0	7.57	-2.60	4.28	10.18		C	x	1	28.05.23	19:20:00	MIRA A	C. Richte	G. Maric	0.0	0.01	0.04	1.6		y	y	x	y	y	3.7 cm SAP projectile
ITP-1158a		442726.070	5942676.950	533747.1067	80802.0947	-13.5	-14.3	0.8	18.9	1.5	8.32	-5.24	3.21	13.56		C	x	31	08.07.23	10:55:00	HT08	. Scheffl	. Mikutei	25.0	0.94	0.10	1.5		y	y	x	y	y	10.5 cm HE full round
ITP-1158b		442724.920	5942675.520	533747.0600	80802.0330	-13.5	-15.2	1.7	66.9	5.4	13.39	-6.96	4.87	20.36		C	x	31	08.07.23	10:30:00	HT08	. Scheffl	. Mikutei	20.0	0.50	0.10	1.0		y	y	x	y	y	10.5 cm shell, not fired
ITP-1159		442986.830	5942675.660	533747.1674	80816.2892	-15.9	-15.9	0.0	5.9	0.5	47.29	-16.73	1.79	64.01		E		5																n	
ITP-1160		442994.690	5942677.040	533747.2152	80816.7162	-16.2	-16.2	0.0	19.2	1.5	10.48	-26.65	2.21	37.14		C		5																n	
ITP-1161		442729.970	5942677.150	533747.1147	80802.3068	-13.5	-14.3	0.8	48.9	3.9	18.30	-13.61	3.29	31.91		C	x	31	10.06.23	19:11:00	HT08	D. Mikutei	Gebhar	40.0	0.48	0.17	1.1		y	y	x	y	y	17 cm HE shell
ITP-1162		442682.310	5942678.010	533747.1238	80759.7120	-12.7	-13.2	0.5	42.9	3.4	15.32	-23.56	3.56	38.88		C	x	31	13.06.23	09:30:00	HT08	. Scheffler		20.0	0.90	0.20	0.5		y	y		y	y	scrap
ITP-1163		442977.180	5942678.720	533747.2627	80815.7620	-15.3	-15.3	0.0	1867.6	149.4	922.90	-1833.19	2.20	2756.09		A	x	5	10.08.23	08:10:00	MIRA A	T. Reiche	A. Franz	101.0	0.75	0.22	1.5	clear within 2m radius, magnetic boulder (0.5x0.8m) still insitu	y	y	x	y	y	22 cm HE projectile (French origin)
ITP-1164		442280.890	5942678.730	533746.9883	80737.8614	-11.8	-15.4	3.6	205.7	16.5	8.22	-7.73	4.81	15.94		B	x	1	19.07.23	21:47:00	MIRA A	D. Mirjani	G. Maric				2.5		y	n		y	y	geology
ITP-1165		443064.430	5942680.650	533747.3593	80820.5099	-19.0	-19.0	0.0	5.7	0.5	22.32	-5.26	1.71	27.58		E		5																n	
ITP-1166		442290.890	5942680.690	533747.0557	80738.4044	-11.7	-14.1	2.4	70.9	5.7	3.67	-8.20	3.93	11.87		B	x	1	30.05.23	03:22:00	MIRA A	C. Richte	G. Maric				0.0		n	n		y	y	nothing found
ITP-1167		443069.720	5942683.280	533747.4465	80820.7961	-18.9	-19.2	0.3	11.6	0.9	6.05	-6.81	2.55	12.86		D		5																n	
ITP-1168		442043.930	5942683.280	533747.0413	80724.9601	-9.5	-13.7	4.2	303.6	24.3	8.35	-9.46	6.79	17.81		A	x	32	28.11.23	14:02:00	Susanne A	M. Heinz	Sobanski				5.0	borhole survey	y	n		y	y	object deeper than 4.5 m
ITP-1169		442809.780	5942683.360	533747.3471	80806.6469	-13.1	-13.1	0.0	4.3	0.3	2.05	-4.08	2.41	6.13		F		31																n	
ITP-1170		443066.860	5942683.850	533747.4638	80820.6401	-18.9	-18.9	0.0	1.6	0.1	5.13	-5.71	1.08	10.84		F		5																n	
ITP-1171		443031.200	5942685.220	533747.4941	80818.6981	-17.0	-17.1	0.1	12.9	1.0	3.50	-12.58	4.40	16.08		D		5																n	
ITP-1172		442920.470	5942685.610	533747.4633	80812.6706	-15.2	-16.0	0.8	25.5	2.0	6.17	-9.57	2.81	15.74		C		5																n	
ITP-1173		442792.040	5942686.380	533747.4378	80805.6793	-13.3	-13.3	0.0	17.9	1.4	43.56	-3.73	2.21	47.29		C	x	31	26.06.23	12:15:00	HT08	. Scheffl	. Mikutei	70.0	0.80	0.20	0.2	25.07.2923, 18:44 recovered and handed over to KBD 26.07.2023 for detonation	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1174		442350.740	5942686.720	533747.2745	80741.6581	-13.2	-14.6	1.4	51.0	4.1	8.99	-8.31	4.24	17.30		C	x	1	28.05.23	12:54:00	MIRA A	M. Kano	G. Maric	54.0	1.04	0.38	1.7		y	y	x	y	y	munition box (3 x 7.62cm full rounds)
ITP-1175		442376.240	5942687.470	533747.3089	80743.0457	-13.4	-13.4	0.0	44.9	3.6	249.68	-87.89	3.63	337.57		C	x	2	19.05.23	02:04:00	MIRA A	C. Richte	G. Maric	10.0	2.10	0.03	0.7		y	y		y	y	SWR (steel wire rope)
ITP-1176		442794.010	5942689.010	533747.5237	80805.7848	-13.2	-13.2	0.0	5.5	0.4	19.16	-3.56	2.06	22.72		E		31																n	
ITP-1177		442688.260	5942689.060	533747.4836	80800.0285	-13.0	-13.2	0.2	12.0	1.0	6.88	-7.65	2.44	14.53		D	x	31	12.06.23	14:20:00	HT08	. Scheffler		20.0	0.70	0.30	0.4		y	y		y	y	scrap, chain
ITP-1178		442983.170	5942690.000	533747.6300	80816.0806	-15.0	-15.4	0.4	100.7	8.1	126.06	-17.69	3.07	143.74		B	x	5	10.08.23	14:50:00	MIRA A	T. Reiche	A. Franz	2600.0	1.20	1.00	0.4		y	y		y	y	concrete block, parts of chain
ITP-1179		442605.160	5942690.050	533747.4829	80755.5046	-12.4	-13.3	0.9	8.8	0.7	6.61	-0.32	5.42	6.94		E		31																n	

SeaTerra Geophysics & EOD Services GmbH
UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

total		finsihed	open	
45	Prio1:	45	0	targets piling area
56	Prio 2:	56	0	bearthing zone
393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
47	Prio 3.2:	47	0	barge area
59	Prio 3.3:	59	0	dredge area safety zone
229	Prio 4:	229	0	pipe routes
31	Prio 5:	31	0	outside
43	Prio 6:	43	0	post dredge survey to max depth 2m
74	Prio 7:	74	0	not dredged survey
72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
1049		1049	0	

>50 kg
>10 kg
>50 kg

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	veigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-1180		442845.900	5942690.650	533747.5971	80808.6082	-13.2	-13.6	0.4	13.3	1.1	8.26	-6.37	2.41	14.62		D	x	31	24.06.23	10:50:00	HT08	. Scheffl	M. Mikuteit				1.5		y	n		y	y	geology; dredged by airlift
ITP-1181		442350.280	5942692.890	533747.4740	80741.6290	-13.6	-15.5	1.9	38.5	3.1	8.62	-2.65	6.35	11.27		C	x	1	28.05.23	06:50:00	MIRA A	M. Kano	G. Maric				1.2		y	n		y	y	geology
ITP-1182		442499.880	5942693.320	533747.5471	80749.7718	-13.7	-13.7	0.0	106.5	8.5	149.83	-231.25	1.70	381.08		B	x	31	07.06.23	16:35:00	HT08	. Scheffl	M. Mikuteit	60.0	0.60	0.20	0.5		y	y	x	y	y	21 cm shell, not fired
ITP-1183		442943.730	5942693.510	533747.7281	80813.9314	-14.0	-15.4	1.4	39.0	3.1	13.83	-3.20	5.04	17.03		C	x	5	06.08.23	11:28:00	MIRA A	T. Reiche	G. Maric	7.0	0.24	0.14	0.5		y	y		y	y	boulder
ITP-1184		442754.920	5942694.860	533747.6976	80803.6532	-13.1	-14.0	0.9	13.6	1.1	5.78	-2.45	3.03	8.23		D	x	31	12.06.23	14:00:00	HT08	. Scheffl	M. Mikuteit				1.0	Geology, dredged away by airlift	y	n		y	y	geology
ITP-1185		442773.410	5942695.130	533747.7136	80804.6594	-12.8	-13.5	0.7	33.5	2.7	19.31	-6.50	3.26	25.81		C	x	31	08.07.23	11:45:00	HT08	. Scheffl	M. Mikuteit		0.60	1.00	1.0		y	n		y	y	boulder
ITP-1186		442747.490	5942695.780	533747.7244	80803.2481	-12.9	-13.7	0.8	26.3	2.1	17.71	-1.51	3.76	19.22		C	x	31	08.07.23	11:05:00	HT08	. Scheffl	M. Mikuteit	12.0	0.23	0.65	1.5		y	y		y	y	car tyre
ITP-1187		442983.560	5942696.850	533747.8518	80816.0973	-15.2	-15.2	0.0	2.7	0.2	17.79	0.91	8.45	16.88		F		5															n	
ITP-1188		442504.680	5942696.910	533747.6652	80750.0307	-14.0	-14.0	0.0	29.2	2.3	77.81	-6.40	4.11	84.22		C	x	31	07.06.23	16:10:00	HT08	. Scheffler		40.0	0.40	0.60	0.7		y	y		y	y	slag block
ITP-1189		442712.940	5942697.080	533747.7528	80801.3666	-13.4	-14.2	0.8	555.0	44.4	127.11	-183.63	3.10	310.74		A	x	31	12.06.23	13:35:00	HT08	. Scheffler		50.0	1.60	0.60	0.8		y	y		y	y	scrap (mine sweeping gear, buoyancy body)
ITP-1190a		442974.000	5942698.500	533747.8829	80815.5465	-13.4	-14.2	0.8	714.4	57.2	214.04	-180.23	4.20	394.26		A	x	33	22.08.23	10:45:00	HT08	. Scheffl	M. Mikuteit	17.0	0.45	0.10	0.2		y	y	x	y	y	10.5 cm german shell, chemical, not fired
ITP-1190b		442975.200	5942697.600	533747.8727	80815.6417	-14.4	-15.6	1.2	714.4	57.2	214.04	-180.23	4.20	394.26		A	x	5	22.08.23	11:02:00	HT08	. Scheffl	M. Mikuteit	500.0	10.00	0.30	1.8		y	y		y	y	scrap, chain
ITP-1190c		442976.210	5942698.150	533747.8724	80815.6670	-14.4	-15.6	1.2	714.4	57.2	214.04	-180.23	4.20	394.26		A	x	33	23.08.23	12:40:00	HT08	. Scheffl	M. Mikuteit	17.0	0.45	0.10	0.6		y	y	x	y	y	10.5 cm fog grenade, german origin
ITP-1190d		442972.740	5942697.860	533747.8617	80815.4783	-14.4	-15.6	1.2	714.4	57.2	214.04	-180.23	4.20	394.26		A	x	33	23.08.23	12:40:00	HT08	. Scheffl	M. Mikuteit	17.0	0.45	0.10	0.4		y	y	x	y	y	10.5 cm fog grenade, german origin
ITP-1190e		442975.020	5942699.990	533747.9315	80815.6010	-14.4	-15.6	1.2	714.4	57.2	214.04	-180.23	4.20	394.26		A	x	33	23.08.23	12:43:00	HT08	. Scheffl	M. Mikuteit	25.0	0.65	0.15	1.0		y	y		y	y	scrap
ITP-1191		443031.380	5942698.690	533747.9300	80818.6990	-16.7	-16.7	0.0	10.3	0.8	48.79	-8.11	1.79	56.90		D		5															n	
ITP-1192		442691.530	5942699.780	533747.8318	80800.1994	-13.3	-13.3	0.0	9.5	0.8	23.98	-6.46	1.90	30.44		E		31															n	
ITP-1193		442140.690	5942700.570	533747.6392	80730.2154	-10.5	-11.1	0.6	131.0	10.5	67.31	-50.41	2.88	117.72		B	x	32	30.05.23	14:45:00	MIRA A	M. Kano	G. Maric	9.0	4.00	0.04	0.6		y	y		y	y	SWR (steel wire rope)
ITP-1194		442715.000	5942700.820	533747.8747	80801.4763	-13.4	-13.7	0.3	95.2	7.6	77.28	-49.28	2.67	126.57		B	x	31	06.07.23	09:10:00	HT08	. Scheffl	M. Mikuteit	10.0	0.10	0.10	0.6		y	y		y	y	scrap
ITP-1195a		442972.890	5942703.050	533748.0482	80815.5124	-15.0	-15.0	0.0	21.5	1.7	115.79	-89.39	0.89	205.18		C	x	5	11.08.23	16:10:00	MIRA A	T. Reiche	A. Franz	10.0	0.45	0.10	0.5		y	y	x	y	y	10.5 cm fog grenade, german origin
ITP-1195b		442971.200	5942702.470	533748.0102	80815.3914	-15.0	-15.0	0.0	21.5	1.7	115.79	-89.39	0.89	205.18		C	x	33	23.08.23	11:32:00	HT08	. Scheffl	M. Mikuteit	17.0	0.45	0.10	0.4		y	y	x	y	y	10.5 cm fog grenade, german origin
ITP-1196		442693.230	5942703.150	533747.9415	80800.2897	-13.3	-13.4	0.1	15.4	1.2	20.70	-7.81	3.45	28.51		C	x	31	30.06.23	11:45:00	HT08	. Scheffl	M. Mikuteit	15.0	0.70	0.50	0.5		y	y		y	y	scrap
ITP-1197		442179.250	5942703.160	533747.7383	80732.3126	-9.9	-12.6	2.7	120.9	9.7	6.15	-8.50	4.94	14.65		B	x	32	31.05.23	04:36:00	MIRA A	M. Kano	G. Maric				2.2		y	n		y	y	boulder
ITP-1198		442826.790	5942703.310	533747.9992	80807.5596	-12.5	-12.5	0.0	16.3	1.3	20.01	-6.33	2.42	26.34		C	x	31	08.07.23	13:00:00	HT08	. Scheffl	M. Mikuteit	15.0	0.20	0.75	1.1		y	y		y	y	car tyre
ITP-1199		442508.540	5942704.330	533747.9068	80750.2358	-12.5	-13.3	0.8	16.0	1.3	-1.12	-20.20	7.60	19.08		C	x	31	07.06.23	15:50:00	HT08	. Scheffler					1.5	small pieces of slag, dredged away with airlift	y	n		y	y	small pieces of slag, dredged away with airlift
ITP-1200		442393.110	5942705.010	533747.8831	80743.9522	-13.1	-13.1	0.0	4.5	0.4	27.78	0.33	0.81	27.45		F		2															n	
ITP-1201		442650.200	5942705.200	533747.9908	80757.9461	-12.6	-13.1	0.5	14.6	1.2	17.88	0.58	4.02	17.30		D	x	31	06.07.23	16:01:00	HT08	. Scheffl	M. Mikuteit				1.5		y	n		y	y	geology; dredged by airlift
ITP-1202		442089.350	5942705.830	533747.7890	80727.4173	-10.4	-11.2	0.8	115.9	9.3	28.40	-48.06	2.68	76.46		B	x	32	30.05.23	22:15:00	MIRA A	C. Richte	G. Maric				0.8		y	n		y	y	boulder
ITP-1203		442643.750	5942707.280	533748.0556	80757.5937	-12.6	-14.0	1.4	24.5	2.0	8.33	-1.24	5.84	9.57		C	x	31	06.07.23	16:15:00	HT08	. Scheffl	M. Mikuteit				1.5		y	n		y	y	geology; dredged by airlift
ITP-1204		443022.750	5942708.180	533748.2337	80818.2230	-16.6	-16.9	0.3	6.9	0.6	4.26	-3.37	2.13	7.63		E		5															n	
ITP-1205		442602.290	5942709.880	533748.1234	80755.3352	-12.1	-12.1	0.0	3.3	0.3	6.35	-1.27	2.25	7.61		F		31															n	
ITP-1206		442856.410	5942710.050	533748.2289	80809.1675	-12.8	-12.8	0.0	15.0	1.2	15.69	-14.99	1.75	30.68		D	x	31	25.06.23	13:05:00	HT08	. Scheffl	M. Mikuteit	15.0	0.55	0.04	1.2		y	y		y	y	scrap
ITP-1207		442761.580	5942710.880	533748.2185	80804.0051	-13.2	-14.0	0.8	27.2	2.2	17.56	-4.07	3.82	21.63		C	x	31	08.07.23	11:20:00	HT08	. Scheffl	M. Mikuteit	70.0	1.00	0.20	1.0	26.07.2923, 00:30 recovered and handed over to KBD 26.07.2023 for detonation	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1208		442993.050	5942711.140	533748.3178	80816.6044	-14.4	-14.4	0.0	97.5	7.8	47.69	-86.16	1.84	133.86		B	x	5	11.08.23	02:15:00	MIRA A	T. Reiche	A. Franz	12.0	0.41	0.10	1.2	magnetic boulder (2x1m) left insitu	y	y	x	y	y	10.5 cm fog projectile (German origin)
ITP-1209		442984.290	5942711.670	533748.3315	80816.1272	-14.6	-14.8	0.2	10.3	0.8	19.70	0.09	15.55	19.60		D	x	5	11.08.23	14:55:00	MIRA A	T. Reiche	A. Franz				0.0		y	n		y	y	boulders, left insitu
ITP-1210		442941.560	5942711.900	533748.3222	80813.8012	-14.0	-14.0	0.0	32.8	2.6	42.07	-62.42	1.28	104.49		C	x	5	06.08.23	05:58:00	MIRA A	D. Mirjani	G. Maric	4.0	0.60	0.08	0.1		y	y		y	y	scrap
ITP-1211		442591.530	5942584.850	533744.0738	80754.8325	-12.8	-14.0	1.2	19.5	1.6	5.25	-3.30	3.67	8.54		C	x	33	24.07.23	11:20:00	HT08	. Scheffl	M. Mikuteit	15.0	0.25	0.17	2.1		y	y	x	y	y	3.7 cm Stielgranate 41 HE /warhead
ITP-1212		442698.730	5942712.450	533748.2445	80800.5829	-13.2	-13.8	0.6	12.0	1.0	8.36	-2.29	2.81	10.65		D	x	31	30.06.23	10:55:00	HT08	. Scheffl	M. Mikuteit	1000.0	1.00	1.00	1.0		y	y		y	y	boulder
ITP-1213		442683.590	5942712.710	533748.2470	80759.7587	-13.5	-14.2	0.7	7.4	0.6	4.57	-3.10	3.44	7.66		E		31															n	
ITP-1214		442373.870	5942712.830	533748.1285	80742.8998	-13.9	-14.7	0.8	338.5	27.1	89.76	-100.19	2.36	189.95		A	x	2	19.05.23	06:41:00	MIRA A	C. Richte	G. Maric	126.0	1.10	1.10	0.8		y	y		y	y	steel ring
ITP-1215		442618.570	5942714.800	533748.2890	80756.2181	-12.3	-12.3	0.0	3.5	0.3	10.32	-7.49	3.21	17.81		F		31															n	
ITP-1216		442785.340	5942714.850	533748.3563	80805.2958	-13.4	-14.8	1.4	21.8	1.7	7.34	-2.58	3.54	9.93		C	x	31	09.07.23	11:47:00	HT08	. Scheffl	M. Mikuteit		1.00	0.80	1.8		y	n		y	y	boulder
ITP-1217		442992.730	5942715.620	533748.4627	80816.5840	-14.8	-14.9	0.1	41.9	3.4	44.06	-27.09	4.35	71.15		C	x	5	11.08.23	09:30:00	MIRA A	T. Reiche	A. Franz	12.0	0.41	0.10	0.3		y	y	x	y	y	10.5 cm fog projectile (German origin)
ITP-1218		442272.960	5942715.670	533748.1803	80737.4051	-12.0	-12.4	0.4	15.9	1.3	16.22	-11.73	5.67	27.95		C	x	1	30.05.23	09:15:00	MIRA A	M. Kano	G. Maric	3.0	2.00	0.02	0.6		y	y		y	y	SWR (steel wire rope)
ITP-1219		442376.090	5942715.960	533748.2306	80743.0185	-14.1	-15.3	1.2	598.7	47.9	209.62	-100.06	3.81	309.68		A	x	2	19.05.23	07:55:00	MIRA A	T. Reiche	G. Maric	305.0	1.05	1.05	1.2		y	y		y	y	steel ring
ITP-1220		442965.220	5942716.380	533748.4765	80815.0861	-15.6	-15.6	0.0	5.3	0.4	20.69	-2.18	1.98	22.87		E		5															n	
ITP-1221		442717.290	5942716.550	533748.3845	80801.5905	-13.4	-14.5	1.1	36.3	2.9	20.61	-1.61	6.53	22.22		C	x	31	06.07.23	09:35:00	HT08	. Scheffl	M. Mikuteit	10.0	0.50	0.10	1.5		y	y		y	y	scrap
ITP-1222		442059.390	5942716.560	533748.1242	80725.7794	-7.5	-12.2	4.7	1736.8	138.9	25.24	-42.67	6.60	67.91		A	x	32	03.08.23	09:36:00	HT08	. Scheffl	M. Mikuteit				0.0		y	n		y	y	target is still there and more than 4 m below the ground
ITP-1223		442365.120	5942718.150	533748.2971	80742.4199	-13.8	-14.0	0.2	6.2	0.5	5.40	-9.57	4.42	14.97		E		2															n	
ITP-1224		442899.120	5942719.170	533748.5408	80811.4863	-14.8	-15.2	0.4	12.2	1.0	13.83	-4.70	4.67	18.53		D	x	33	30.07.23	23:40:00	MIRA A	D. Mirjani	G. Maric	34.0	0.85	0.15	1.1		y	y	x	y	y	15 cm fog rocket (German origin)
ITP-1225		442348.940	5942719.420	533748.3318	80741.5384	-13.8	-13.8	0.0	44.7	3.6	77.38	-15.17	2.06	92.55		C	x	2	19.05.23	14:22:00	MIRA A	T. Reiche	G. Maric	45.0	1.05	0.38	1.1		y	y	x	y	y	munition box (3 x 7.62cm full rounds)
ITP-1226		442676.750	5942720.780	533748.5054	80759.3810	-13.8	-14.8	1.0	7.0	0.6	3.40	-1.41	8.14	4.81		E		31															n	
ITP-1227		442137.080	5942721.260	533748.3072	80730.0051	-10.5	-13.0	2.5	72.9	5.8	4.43	-7.28	3.69	11.71		B	x	32	30.05.23	15:15:00	MIRA A	M. Kano	G. Maric				0.3		y	n		y	y	geology
ITP-1228		442875.130	5942586.970	533744.2541	80810.2678	-14.2	-14.2	0.0	2.9	0.2	4.45	-2.21	2.67	6.65		F		33															n	
ITP-1229a		442996.800	5942723.320	533748.7134	80816.8005	-15.3	-15.3	0.0	19.0	1.5	32.74	-12.83	1.56	45.57		C	x	5	10.08.23	20:20:00	MIRA A	D. Mirjani	A. Franz	12.0	0.41	0.10	0.1		y	y	x	y	y	10.5 cm fog projectile (German origin)
ITP-1229b		442997.100	5942725.200	533748.7558	80816.7862	-15.3	-15.3	0.0	19.0	1.5	32.74	-12.83	1.56	45.57		C	x	5	10.08.23	20:24:00	MIRA A	D. Mirjani	A. Franz	12.0	0.41	0.10	0.1		y	y	x	y	y	10.5 cm fog projectile (German origin)
ITP-1230		442944.760	5942723.480	533748.6982	80813.9677	-13.7	-13.7	0.0	30.0	2.4	44.15	-20.94	2.24	65.08		C	x	5	09.08.23	13:00:00	MIRA A	T. Reiche	A. Franz	66.0	0.80	0.20	1.1	Wet stored at location 442146.9mE, 5943269.2mN (1230, 1392, 1423)	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1231		442830.020	5942725.110	533748.7058	80807.7210	-13.0	-13.4	0.4	13.3	1.1	17.21	-0.67	2.95	17.87		D	x	31	13.06.23	10:10:00	HT08	. Scheffl	M. Mikuteit				1.0	Geology; dregded away by Airlift	y	n		y	y	geology
ITP-1232		443011.440	5942725.620	533748.7935	80817.5959	-16.4	-17.0	0.6	75.5	6.0	38.64	-30.56	3.06	69.20		B		5															n	
ITP-1233		442846.170	5942725.750	533748.7329	80808.5997	-13.4	-13.5	0.1	17.6	1.4	21.70	-6.49	1.79	28.19		C	x	31	25.06.23	11:50:00	HT08	. Scheffl	M. Mikuteit	25.0	0.60	0.30	0.7		y	y		y	y	scrap
ITP-1234		443022.040	5942726.400	533748.8229	80818.1724	-17.9	-17.9	0.0	1.7	0.1	3.36	-4.61	1.60	7.97		F		5															n	
ITP-1235		443002.080	5942726.980	533748.8339	80817.0855	-15.6	-16.1	0.5	276.1	22.1	47.26	-152.26	2.91	199.52		B		5															n	
ITP-1236		442590.120	5942727.230	533748.6799	80754.6612	-12.2	-13.5	1.3	24.2	1.9	8.05	-3.01	3.61	11.06		C	x	31	07.07.23	10:50:00	HT08	. Scheffl	M. Mikuteit				1.5		y	n		y	y	geology; dredged by airlift
ITP-1237		442702.700	5942727.510	533748.7334	80800.7891	-13.1	-13.9	0.8	15.8	1.3	11.66	-1.07	6.24	12.73		C	x	31	29.06.23	09:27:00	HT08	. Scheffl	M. Mikuteit				2.0		y	n		y	y	geology; dredged by airlift
ITP-1238		442806.130	5942728.570	533748.8084	80806.4183	-13.6	-14.8	1.2	31.9	2.6	11.68	-6.14	3.21	17.82		C	x	31	09.07.23	12:50:00	HT08	. Scheffl	M. Mikuteit				1.6		y	n		y	y	geology; dredged by airlift
ITP-1239		442992.020	5942729.360	533748.9069	80816.5363	-15.8	-15.8	0.0	2.7	0.2	20.43	0.06	3.43	20.37		F		5															n	
ITP-1240		442825.970	5942730.260	533748.8709	80807.4972	-13.1	-15.0	1.9	77.6	6.2	16.31	-6.51	5.23	22.82		B	x	31	25.06.23	12:50:00	HT08	. Scheffl	M. Mikuteit		0.60	0.50	1.5		y	n		y	y	boulder 3x; 0,6m x 0,3m x 0,5m; not recovered
ITP-1241		442664.210	5942730.780	533748.8240	80758.6918	-13.4	-13.4	0.0	17.9	1.4	23.52	-12.44	2.24	35.96		C	x	31	07.07.23	10:00:00	HT08	. Scheffl	M. Mikuteit	20.0	0.54	0.12	1.0		y	y	x	y	y	12 cm shell, not fired
ITP-1243		442733.690	5942732.070	533748.8931	80802.4729	-13.3	-13.8	0.5	49.3	3.9	41.61	-11.25	3.42	52.86		C	x	31	29.06.23	16:20:00	HT08	. Scheffl	M. Mikuteit	75.0	5.00	0.10	1.0		y	y		y	y	scrap (rope with scrap)
ITP-1244		442837.360	5942732.240	533748.9394	80808.1158	-13.2	-13.2	0.0	67.1	5.4	74.71	-67.11	1.70	141.82		C	x	31	13.06.23	09:50:00	HT08	. Scheffl	M. Mikuteit	70.0	1.00	0.20	0.1	26.07.2923, 06:14 recovered and handed over to KBD 26.07.2023 for detonation	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1245		442811.070	5942589.700	533744.3172	80806.7791	-13.0	-13.0	0.0	4.0	0.3	10.14	-1.07	2.42	11.20		F		33															n	
ITP-1246		442848.260	5942733.150	533748.9731	80808.7086	-13.6	-13.6	0.0	2.6	0.2	9.03	-4.44	1.90	13.47		F		31															n	
ITP-1247		442349.200	5942733.390	533748.7839	80741.5432	-13.5	-13.9	0.4	14.2	1.1	10.93	-3.36	3.00	14.29		D	x	2	19.05.23	19:57:00	MIRA A	C. Richte	G. Maric	48.0	1.05	0.38	2.2		y	y	x	y	y	munition box (3 x 7.62cm full rounds)
ITP-1248		442328.720	5942734.330	533748.8062	80740.4278	-12.7	-14.3	1.6	62.9	5.0	8.99	-9.31	3.49	18.31		C	x	2	28.05.23	00:54:00	MIRA A	C. Richte	G. Maric	35.0	2.44	0.05	1.8		y	y		y	y	metal pipe
ITP-1249		442632.050	5942736.230	533748.9877	80756.9376	-12.6	-13.4	0.8	18.9	1.5	8.32	-5.24	3.21	13.56		C	x	31	07.07.23	11:25:00	HT08	. Scheffl	M. Mikuteit	10.0	0.30	0.20	1.5		y	y		y	y	scrap
ITP-1250		442700.540	5942736.510	533749.0237	80800.6655	-12.7	-14.9	2.2	134.5	10.8	27.42	-6.39	5.81	33.82		B	x	31	29.06.23	16:00:00	HT08	. Scheffl	M. Mikuteit				2.5		y	n		y	y	geology; dredged by airlift

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

total		finsihed	open	
45	Prio1:	45	0	targets piling area
56	Prio 2:	56	0	bearthing zone
393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
47	Prio 3.2:	47	0	barge area
59	Prio 3.3:	59	0	dredge area safety zone
229	Prio 4:	229	0	pipe routes
31	Prio 5:	31	0	outside
>50 kg 43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg 74	Prio 7:	74	0	not dredged survey
>50 kg 72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP No.	SSS Contact No.	UTM zone 32N/ETRS 89 East (mE)	UTM zone 32N/ETRS 89 North (mN)	WGS84 Latitude (deg, min,sec)	WGS84 Longitude (deg, min,sec)	SKN water depth (m)	target depth SKN (m)	model depth b. g. (m)	model weigt (kg)	magn. moment (Am²)	max (nT)	min (nT)	dist max-min (m)	p-p max-min (nT)	ITP notes ST-Project No.	munition category	in/out scope (in=x)	Priotity area	date inspection	time of clearance	vessel	EOD	GEO	weigHT0 (kg)	length (m)	width/ diameter (m)	depth b. ground (m)	TR comment	found (y/n)	salvage (y/n)	UXO (X)	clear (y,n, w)	clear QA (y/n)	inspection results
ITP-1251		442932.230	5942736.750	533749.1226	80813.2769	-14.6	-14.7	0.1	3.9	0.3	3.98	-2.73	3.55	6.71		F		5															n	
ITP-1262		442819.940	5942738.900	533749.1484	80807.1305	-12.9	-13.3	0.4	22.2	1.8	17.83	-6.03	2.00	23.86		C	x	31	13.06.23	10:25:00	HT08	. Scheffl		10.0	0.40	0.20	0.4		y	y		y	y	scrap
ITP-1263		442909.240	5942739.780	533749.2116	80812.0235	-14.3	-14.5	0.2	9.3	0.7	11.79	-3.28	3.06	15.08		E		5															n	
ITP-1254		442846.770	5942740.270	533749.2029	80808.6228	-13.6	-13.6	0.0	24.8	2.0	23.77	-20.94	2.24	44.71		C	x	31	25.06.23	12:25:00	HT08	. Scheffl	V. Mikutei				1.0		y	n		y	y	geology; dredged by airlift
ITP-1255		442706.080	5942741.190	533749.1773	80800.9640	-13.3	-14.3	1.0	83.4	6.7	36.06	-10.55	3.68	46.60		B	x	31	29.06.23	15:00:00	HT08	. Scheffl	V. Mikutei	40.0	0.55	0.30	1.5		y	y		y	y	scrap (2 x tyre)
ITP-1256		442725.660	5942741.490	533749.1947	80802.0696	-13.4	-14.4	1.0	24.0	1.9	4.36	-6.60	3.54	10.96		C	x	31	06.07.23	09:35:00	HT08	. Scheffl	V. Mikutei	25.0	0.20	0.20	1.0		y	y		y	y	scrap
ITP-1257		442757.830	5942741.700	533749.2142	80803.7805	-12.8	-13.8	1.0	43.5	3.5	11.99	-9.72	3.49	21.71		C	x	31	11.07.23	14:40:00	HT08	. Scheffl	V. Mikutei	15.0	0.55	0.45	1.1		y	y		y	y	scrap
ITP-1258		442493.910	5942742.080	533749.1224	80749.4144	-12.8	-18.9	6.1	3305.9	264.5	98.10	-3.14	14.78	101.24		A	x	31	10.07.23	08:07:00	HT08	. Scheffl	V. Mikutei				3.9	see 2180	n	n		y	y	target is still present and deeper 15.7 m
ITP-1259		442826.510	5942742.950	533749.2817	80807.5182	-13.5	-13.5	0.0	2.6	0.2	7.79	-3.68	1.79	11.47		F		31															n	
ITP-1260		442594.660	5942746.320	533749.2994	80754.8957	-13.3	-15.5	2.2	37.6	3.0	6.47	-1.57	6.18	8.03		C	x	31	28.06.23	13:50:00	HT08	. Scheffl	V. Mikutei	60.0	0.50	0.17	3.0		y	y	x	y	y	17 cm shell, not fired
ITP-1261		442370.820	5942748.500	533749.2814	80742.7100	-13.3	-18.6	5.3	1482.1	118.6	163.97	-26.38	19.97	190.35		A	x	2	20.07.23	03:42:00	MIRA A	D. Mirjani	G. Maric				0.0		n	n		y	y	suspected part of SWR already removed from 1286
ITP-1262		442647.120	5942748.970	533749.4058	80757.7495	-13.1	-13.4	0.3	7.4	0.6	7.35	-2.66	2.41	10.01		E		31															n	
ITP-1263		442743.740	5942749.490	533749.4607	80803.0084	-13.7	-13.8	0.1	9.0	0.7	7.87	-4.15	2.41	12.03		E		31															n	
ITP-1264		442644.200	5942751.640	533749.4910	80757.5887	-13.0	-13.1	0.1	11.4	0.9	15.60	-3.51	2.60	19.11		D	x	31	28.06.23	15:10:00	HT08	. Scheffl	V. Mikutei	15.0	0.50	0.25	0.5		y	y		y	y	scrap
ITP-1265		442631.650	5942752.730	533749.5213	80756.9049	-12.8	-14.6	1.8	2731.5	218.5	319.70	-369.55	3.83	689.24		A	x	31	28.06.23	14:40:00	HT08	. Scheffl	V. Mikutei	200.0	20.00	0.04	1.5		y	y		y	y	scrap, steel wire roop, coil over Target 1265 and 1277
ITP-1266		442599.560	5942753.300	533749.5271	80755.1577	-12.4	-12.9	0.5	25.2	2.0	13.42	-7.88	2.36	21.30		C	x	31	28.06.23	08:40:00	HT08	. Scheffl	V. Mikutei	25.0	1.00	0.20	1.2		y	y		y	y	scrap
ITP-1267		442682.030	5942753.360	533749.5616	80759.6468	-13.4	-14.0	0.6	339.0	27.1	113.89	-128.30	3.03	242.18		A	x	31	08.07.23	17:50:00	HT08	. Scheffl	V. Mikutei	40.0	0.62	0.15	1.0		y	y	x	y	y	15 cm HE projectile; not fired
ITP-1268		442805.770	5942597.030	533744.5523	80806.4858	-12.6	-12.6	0.0	7.1	0.6	8.99	-4.94	1.70	13.92		E		31															n	
ITP-1269		442935.780	5942754.000	533749.6821	80813.4588	-15.3	-15.3	0.0	4.4	0.4	9.02	-3.79	2.09	12.81		F		5															n	
ITP-1270		442879.320	5942754.030	533749.6609	80810.3855	-14.4	-15.3	0.9	68.7	5.5	19.81	-20.46	2.97	40.26		C	x	33	27.07.23	07:50:00	HT08	. Scheffl	V. Mikutei	25.0	2.00	0.15	0.9		y	y		y	y	scrap
ITP-1271		442365.240	5942754.490	533749.4809	80743.4909	-14.2	-14.6	0.4	13.9	1.1	11.75	-4.87	2.28	16.62		D	x	2	20.05.23	08:00:00	MIRA A	T. Reiche	G. Maric				0.4		y	n		y	y	geology
ITP-1272		442895.110	5942755.250	533749.7066	80811.2441	-14.3	-15.4	1.1	102.1	8.2	19.72	-20.96	3.62	40.68		B	x	5	05.08.23	23:04:00	MIRA A	D. Mirjani	G. Maric	2.0	1.00	0.06	0.0		y	y		y	y	scrap
ITP-1273		442813.320	5942755.780	533749.6916	80806.7917	-13.0	-13.0	0.0	47.1	3.8	165.55	-36.07	2.06	201.62		C	x	31	09.07.23	13:05:00	HT08	. Scheffl	V. Mikutei	60.0	0.35	0.60	1.1		y	y		y	y	scrap
ITP-1274		442371.710	5942757.260	533749.5651	80742.7526	-13.1	-13.1	0.0	13.2	1.1	28.01	-24.60	4.36	52.62		D	x	2	20.05.23	08:34:00	MIRA A	T. Reiche	G. Maric				0.2		y	n		y	y	geology
ITP-1275		442855.610	5942757.740	533749.7716	80809.0924	-13.3	-13.3	0.0	2.6	0.2	9.65	-6.72	2.61	16.37		F		31															n	
ITP-1276		442861.270	5942758.020	533749.7829	80809.4003	-13.6	-14.4	0.8	540.6	43.2	191.07	-202.36	3.16	393.43		A	x	33	27.07.23	07:10:00	HT08	. Scheffl	V. Mikutei	80.0	0.85	0.21	0.8		y	y	x	y	y	21 cm shell HE, not fired
ITP-1277		442627.730	5942758.050	533749.6919	80756.6880	-12.7	-14.8	2.1	2529.3	202.3	346.43	-169.85	4.53	516.27		A	x	31	28.06.23	14:40:00	HT08	. Scheffl	V. Mikutei	200.0	20.00	0.04	2.5		y	y		y	y	scrap, steel wire roop, coil over Target 1277 and 1265
ITP-1278		442717.770	5942758.140	533749.7303	80801.5891	-13.4	-14.6	1.2	28.0	2.2	12.48	-0.44	3.50	12.92		C	x	31	06.07.23	10:15:00	HT08	. Scheffl	V. Mikutei	40.0	0.30	0.30	1.5		y	y		y	y	scrap
ITP-1279a		442343.340	5942758.820	533749.6044	80741.2073	-14.1	-15.2	1.1	53.2	4.3	13.19	-9.81	3.16	23.00		C	x	2	27.05.23	12:42:00	MIRA A	T. Reiche	G. Maric	52.0	0.63	0.19	0.3		y	y	x	y	y	munition box (4 x 5cm HE projectiles)
ITP-1279b		442343.340	5942758.820	533749.6044	80741.2073	-14.1	-15.2	1.1	53.2	4.3	13.19	-9.81	3.16	23.00		C	x	2	27.05.23	12:45:00	MIRA A	T. Reiche	G. Maric	25.0	1.05	0.12	0.8		y	y	x	y	y	7.62 cm full round
ITP-1279c		442343.340	5942758.820	533749.6044	80741.2073	-14.1	-15.2	1.1	53.2	4.3	13.19	-9.81	3.16	23.00		C	x	2	27.05.23	12:47:00	MIRA A	T. Reiche	G. Maric	6.0	0.38	0.70	1.2		y	y	x	y	y	7.62 cm HE projectile (not fired)
ITP-1279d		442343.340	5942758.820	533749.6044	80741.2073	-14.1	-15.2	1.1	53.2	4.3	13.19	-9.81	3.16	23.00		C	x	2	27.05.23	12:49:00	MIRA A	T. Reiche	G. Maric	6.0	0.28	0.08	1.2		y	y	x	y	y	7.62 cm HE projectile (not fused)
ITP-1279e		442343.340	5942758.820	533749.6044	80741.2073	-14.1	-15.2	1.1	53.2	4.3	13.19	-9.81	3.16	23.00		C	x	2	27.05.23	17:51:00	MIRA A	T. Reiche	G. Maric	6.0	0.28	0.07	1.2		y	y	x	y	y	7.62 cm HE projectile (not fused)
ITP-1279f		442343.340	5942758.820	533749.6044	80741.2073	-14.1	-15.2	1.1	53.2	4.3	13.19	-9.81	3.16	23.00		C	x	2	27.05.23	12:53:00	MIRA A	T. Reiche	G. Maric	35.0	1.05	0.12	1.2		y	y	x	y	y	cartridge parts
ITP-1280		442509.720	5942760.810	533749.7346	80750.2625	-12.3	-13.5	1.2	32.7	2.6	11.98	-6.15	4.02	18.13		C	x	31	11.07.23	07:28:00	HT08	. Scheffl	V. Mikutei	70.0	1.00	0.20	1.7	Recovered and cleared by MIRA A on 26.07.2023. Handed over to German EOD Authorities (KBD) on 27.07.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1281		442116.750	5942761.120	533749.5888	80728.8718	-10.2	-13.9	3.7	247.4	19.8	9.28	-9.99	5.22	19.27		B	x	32	20.07.23	09:06:00	MIRA A	M. Heinze	G. Maric				1.5		y	n		y	y	geology
ITP-1282		442977.540	5942761.630	533749.9453	80815.7269	-17.1	-18.0	0.9	15.0	1.2	4.91	-4.07	2.86	8.97		D		5															n	
ITP-1283		442616.690	5942761.750	533749.8073	80756.0846	-12.6	-12.8	0.2	6.5	0.5	9.51	-2.04	3.40	11.55		E		31															n	
ITP-1284		441972.730	5942763.390	533749.6048	80721.0308	-9.7	-12.3	2.6	234.4	18.8	22.95	-12.53	4.90	35.48		B	x	32	19.08.23	16:30:00	HT08	. Scheffl	V. Mikutei	50.0	1.20	0.50	2.6		y	y		y	y	scrap
ITP-1285		442136.130	5942599.050	533744.3527	80730.0352	-8.7	-9.7	1.0	61.3	4.9	7.55	-20.40	3.05	27.96		C	x	32	25.07.23	18:00:00	HT08	. Scheffl	V. Mikutei	30.0	0.47	0.29	1.1		y	y	x	y	y	part of an explosive charge without a detonator
ITP-1286		442359.650	5942765.670	533749.8325	80742.0905	-12.9	-17.5	4.6	3320.3	265.6	190.07	-9.81	21.12	199.88		A	x	2	24.06.23	11:57:00	MIRA A	T. Reiche	G. Maric	450.0	45.00	0.04	1.5		y	y		y	y	SWR (steel wire rope)
ITP-1287		442736.310	5942766.230	533749.9994	80802.5929	-13.0	-14.7	1.7	47.3	3.8	8.89	-4.69	4.04	13.58		C	x	31	18.07.23	08:35:00	HT08	. Scheffl	V. Mikutei	10.0	0.60	0.10	1.2		y	y		y	y	scrap
ITP-1288		442715.070	5942767.930	533750.0460	80801.4356	-13.4	-15.0	1.6	214.0	17.1	22.27	-34.65	3.77	56.91		B	x	31	18.07.23	08:40:00	HT08	. Scheffl	V. Mikutei	50.0	0.70	0.70	0.7		y	y		y	y	scrap (coil steel wire rope)
ITP-1289		442854.960	5942768.010	533750.1037	80809.0502	-13.9	-14.1	0.2	25.6	2.0	37.14	-8.67	3.94	45.81		C	x	33	27.07.23	06:48:00	HT08	. Scheffl	V. Mikutei	70.0	1.00	0.20	0.2	Cleared and recovered by MIRA A on 02.08.2023. Handed over to the German EOD Authorities (KBD) on 03.08.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1290		442337.270	5942768.220	533749.9061	80740.8706	-12.6	-14.3	1.7	34.0	2.7	4.30	-4.48	3.71	8.78		C	x	2	27.05.23	06:09:00	MIRA A	T. Reiche	G. Maric				0.6		y	n		y	y	geology
ITP-1291		442677.620	5942769.850	533750.0934	80759.3958	-13.5	-13.5	0.0	7.0	0.6	23.68	-1.95	2.61	25.63		E		31															n	
ITP-1292		442511.820	5942602.580	533744.6160	80750.4820	-13.7	-15.1	1.4	62.2	5.0	23.00	-2.49	4.89	25.49		C	x	31	08.06.23	10:35:00	HT08	. Scheffl	Guenzle	50.0	1.00	0.30	1.6		y	y		y	y	tyre
ITP-1293		442833.020	5942770.340	533750.1704	80807.8544	-13.8	-14.3	0.5	11.1	0.9	9.27	-2.43	5.10	11.70		D	x	31	11.07.23	14:50:00	HT08	. Scheffl	V. Mikutei	12.0	0.43	0.10	0.5		y	y	x	y	y	10.5 cm fog projectile (German origin)
ITP-1294		443123.440	5942602.380	533744.8500	80823.7735	-19.7	-19.7	0.0	17.4	1.4	21.63	-15.44	1.84	37.07		C		5															n	
ITP-1295		442073.350	5942771.690	533749.9135	80726.5023	-10.1	-14.4	4.3	951.7	76.1	21.61	-28.10	5.81	49.70		A	x	32	31.07.23	18:42:00	MIRA A	T. Reiche	G. Maric	27.0	0.80	0.70	3.5		y	y		y	y	scrap
ITP-1296		442020.150	5942771.760	533749.8945	80723.6064	-9.7	-10.6	0.9	11.8	0.9	2.98	-3.86	3.80	6.85		D	x	32	01.08.23	00:53:00	MIRA A	D. Mirjani	G. Maric				1.1		y	n		y	y	small object dredged away by air-lift
ITP-1297		442876.960	5942771.880	533750.2375	80810.2452	-14.1	-14.7	0.6	33.4	2.7	28.56	-5.88	2.95	34.44		C	x	33	27.07.23	07:15:00	HT08	. Scheffl	V. Mikutei	70.0	1.00	0.20	0.6	Cleared and recovered by MIRA A on 02.08.2023. Handed over to the German EOD Authorities (KBD) on 03.08.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1298		442555.810	5942772.220	533750.1220	80752.7637	-12.0	-15.6	3.6	113.7	9.1	4.80	-3.92	5.49	8.72		B	x	31	11.07.23	08:19:00	HT08	. Scheffl	V. Mikutei		0.50	0.50	3.6		y	n		y	y	boulder
ITP-1299		442665.810	5942775.380	533750.2677	80758.7493	-13.3	-15.0	1.7	95.3	7.6	4.47	-17.48	4.44	21.95		B	x	31	09.07.23	18:40:00	HT08	. Scheffl	V. Mikutei	10.0	0.20	0.60	2.0		y	y		y	y	car tyre
ITP-1300		442636.940	5942775.610	533750.2637	80757.1776	-13.1	-13.9	0.8	83.5	6.7	26.25	-27.74	2.53	53.98		B	x	31	11.06.23	19:34:00	HT08	D. Mikutei		7.0	0.57	0.57	1.0		y	y		y	y	tyre
ITP-1301		442605.500	5942776.260	533750.2723	80755.4658	-12.9	-13.9	1.1	42.0	3.4	8.81	-10.19	3.00	18.99		C	x	31	11.06.23	20:04:00	HT08	D. Mikutei		6.0	0.92	0.10	1.3		y	y		y	y	scrap
ITP-1302		442970.250	5942777.440	533750.4540	80815.3196	-16.3	-16.4	0.1	97.7	7.8	58.94	-98.61	2.41	157.55		B		5															n	
ITP-1303		442644.350	5942777.650	533750.3326	80757.5796	-13.3	-14.3	1.0	18.6	1.5	6.86	-5.67	3.54	12.53		C	x	31	11.06.23	19:12:00	HT08	D. Mikutei	Gebhar	20.0	0.57	0.12	1.4		y	y	x	y	y	12 cm HE shell (fused, unfired)
ITP-1304		442537.910	5942777.990	533750.3016	80751.7855	-11.9	-12.4	0.5	14.2	1.1	5.55	-5.65	2.44	11.20		D	x	31	11.07.23	07:43:00	HT08	. Scheffl	V. Mikutei	10.0	0.50	0.40	0.5		y	y		y	y	scrap; tyre
ITP-1305		442912.800	5942779.370	533750.4939	80812.1911	-14.4	-14.8	0.4	52.1	4.2	5.65	-37.14	3.20	42.79		C	x	5	05.08.23	22:44:00	MIRA A	D. Mirjani	G. Maric	12.0	0.41	0.06	0.0		y	y	x	y	y	10.5 cm fog projectile (German origin)
ITP-1306		442698.160	5942605.100	533744.7710	80800.6231	-12.6	-12.6	0.0	45.1	3.6	121.66	-21.73	4.12	143.39		C	x	31	23.06.23	18:00:00	HT08	. Scheffl	V. Mikutei	20.0	0.50	0.25	0.2		y	y		y	y	scrap; tyre
ITP-1307		441986.550	5942779.850	533750.1429	80721.7720	-10.0	-10.3	0.3	26.7	2.1	16.49	-13.85	1.89	30.34		C	x	32	01.08.23	01:29:00	MIRA A	D. Mirjani	G. Maric	15.0	1.80	0.10	1.1		y	y		y	y	scrap
ITP-1308		442898.590	5942781.700	533750.5637	80811.4161	-15.1	-15.5	0.4	186.5	14.9	114.48	-101.35	2.83	215.83		B	x	5	05.08.23	16:56:00	MIRA A	T. Reiche	G. Maric	29.0	0.90	0.10	0.5		y	y		y	y	scrap

SeaTerra Geophysics & EOD Services GmbH
UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	veigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-1309		442794.650	5942782.040	533750.5339	80805.7581	-13.5	-13.7	0.2	48.3	3.9	45.98	-20.52	2.34	66.50		C	x	31	11.07.23	13:04:00	HT08	T. Scheffl	G. Mikute	70.0	1.00	0.20	0.2	Recovered by MIRA A on 02.08.2023. As-left survey pending. Handed over to the German EOD Authorities (KBD) on 02.08.2023. As-left survey at original position completed.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1310		442933.950	5942783.190	533750.6258	80813.3399	-14.6	-14.9	0.3	7.9	0.6	2.97	-6.01	2.27	8.98		E		5															n	
ITP-1311		442980.910	5942783.740	533750.6620	80815.8957	-18.1	-19.4	1.3	25.1	2.0	9.31	-2.31	4.08	11.62		C		5															n	
ITP-1312		442944.210	5942784.470	533750.6713	80813.8975	-15.6	-16.1	0.5	9.3	0.7	2.99	-4.67	2.53	7.67		E		5															n	
ITP-1313		442371.490	5942784.720	533750.4535	80742.7223	-11.8	-13.8	2.0	48.8	3.9	6.63	-5.34	6.58	11.97		C	x	2	24.06.23	12:52:00	MIRA A	T. Reiche	G. Maric	100.0	10.00	0.04	1.5		y	y		y	y	SWR (steel wire rope)
ITP-1314		442119.890	5942786.190	533750.4011	80729.0259	-10.7	-14.1	3.4	139.2	11.1	6.47	-6.05	5.41	12.52		B	x	32	22.07.23	22:10:00	MIRA A	D. Mirjanic	G. Maric				3.1		y	n		y	y	geology
ITP-1315		442588.310	5942786.790	533750.6062	80754.5231	-12.2	-12.4	0.2	4.9	0.4	3.89	-2.89	2.05	6.79		F		31															n	
ITP-1316		442287.050	5942786.870	533750.4896	80738.1245	-12.7	-12.7	0.0	5.8	0.5	21.82	0.62	2.24	21.20		E		2															n	
ITP-1317		442613.390	5942787.280	533750.6320	80755.8880	-12.7	-13.6	0.9	28.5	2.3	12.81	-5.60	3.16	18.41		C	x	31	08.07.23	17:50:00	HT08	T. Scheffl	M. Mikutei	t			2.0		y	n		y	y	geology; dredged by airlift
ITP-1318		442752.700	5942788.700	533750.7329	80803.4702	-13.2	-14.2	1.0	7.4	0.6	2.79	-1.27	3.47	4.06		E		31															n	
ITP-1319		442970.170	5942790.670	533750.8820	80815.3065	-18.0	-18.8	0.8	7.6	0.6	5.94	0.28	3.80	5.66		E		5															n	
ITP-1320		442530.070	5942792.280	533750.7609	80751.3493	-12.0	-13.4	1.4	706.2	56.5	122.29	-125.33	3.68	247.62		A	x	31	07.07.23	17:53:00	HT08	T. Scheffl	M. Mikute	87.0	0.57	0.20	3.5		y	y	x	y	y	21 cm shell, not fired
ITP-1321		442375.240	5942792.310	533750.7006	80742.9213	-12.2	-16.9	4.7	1186.1	94.9	9.82	-37.16	6.62	46.98		A	x	2	14.06.23	04:07:00	MIRA A	D. Mirjanic	A. Franz	450.0	50.00	0.04	1.5		y	y		y	y	SWR (steel wire rope)
ITP-1322		442822.820	5942605.280	533744.8259	80807.4084	-13.2	-14.0	0.8	783.1	62.6	166.21	-242.16	3.22	408.37		A	x	31	14.06.23	17:00:00	HT08	T. Scheffl	M. Mikute	1.0	0.15	0.05	0.8		y	y	x	y	y	2 inch mortar Granade, GB
ITP-1323		442287.390	5942793.690	533750.7104	80738.1384	-12.3	-12.3	0.0	7.8	0.6	19.53	-7.58	1.56	27.11		E		2															n	
ITP-1324		442671.800	5942605.600	533744.7768	80759.1879	-12.3	-12.7	0.4	7.7	0.6	6.73	-2.80	2.60	9.53		E		31															n	
ITP-1325		442630.880	5942794.220	533750.8634	80756.8354	-13.0	-14.3	1.3	87.8	7.0	17.75	-20.30	3.94	38.05		B	x	31	08.07.23	17:35:00	HT08	T. Scheffl	M. Mikute	25.0	0.94	0.10	2.0		y	y	x	y	y	10 cm HE full round
ITP-1326		442622.710	5942794.630	533750.8735	80756.3904	-12.8	-13.4	0.6	11.9	1.0	6.16	-2.76	2.38	8.92		D	x	31	08.07.23	17:50:00	HT08	T. Scheffl	M. Mikute	20.0	0.48	0.10	1.0		y	y	x	y	y	10 cm HE projectile (not fired)
ITP-1327a		442298.870	5942794.870	533750.7531	80738.7626	-12.7	-13.7	1.0	32.0	2.6	17.93	-2.76	4.41	20.69		C	x	2	25.05.23	23:30:00	MIRA A	C. Richte	G. Maric	15.0	0.33	0.12	1.2		y	y	x	y	y	12 cm HE projectile (not fused)
ITP-1327b		442298.870	5942794.870	533750.7531	80738.7626	-12.7	-13.7	1.0	32.0	2.6	17.93	-2.76	4.41	20.69		C	x	2	25.05.23	23:35:00	MIRA A	C. Richte	G. Maric	6.0	0.28	0.77	1.2		y	y	x	y	y	7.7 cm HE projectile (not fused)
ITP-1327c		442298.870	5942794.870	533750.7531	80738.7626	-12.7	-13.7	1.0	32.0	2.6	17.93	-2.76	4.41	20.69		C	x	2	25.05.23	23:41:00	MIRA A	C. Richte	G. Maric	6.0	0.23	0.07	1.2		y	y	x	y	y	7.62 cm HE projectile (not fused)
ITP-1328		443121.560	5942608.550	533745.0489	80823.6671	-20.3	-21.5	1.2	54.0	4.3	2.51	-13.85	4.84	16.36		C		5															n	
ITP-1329		442800.870	5942796.690	533751.0103	80806.0869	-13.2	-13.8	0.6	27.3	2.2	24.22	-12.95	4.39	37.17		C	x	31	11.07.23	13:04:00	HT08	T. Scheffl	M. Mikute	70.0	1.00	0.20	0.1	Recovered by MIRA A on 02.08.2023. As-left survey pending. Handed over to the German EOD Authorities (KBD) on 02.08.2023. As-left survey at original position completed on 03.08.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1330a		442289.000	5942797.050	533750.8197	80738.2238	-12.8	-13.0	0.2	15.1	1.2	31.38	-7.59	5.22	38.97		C	x	2	22.05.23	08:40:00	MIRA A	T. Reiche	G. Maric	15.0	0.33	0.12	0.5		y	y	x	y	y	12 cm HE projectile (not fuzed)
ITP-1330b		442289.000	5942797.050	533750.8197	80738.2238	-12.8	-13.0	0.2	15.1	1.2	31.38	-7.59	5.22	38.97		C	x	2	22.05.23	08:50:00	MIRA A	T. Reiche	G. Maric	6.0	0.28	0.07	0.5		y	y	x	y	y	7.5 cm HE projectile (not fuzed)
ITP-1331		442379.770	5942798.950	533750.9172	80743.1635	-12.5	-14.5	2.0	213.6	17.1	31.37	-34.59	3.82	65.95		B	x	2	14.06.23	04:07:00	MIRA A	D. Mirjanic	A. Franz	450.0	50.00	0.04	1.5		y	y		y	y	SWR (steel wire rope)
ITP-1332		442346.920	5942798.980	533750.9052	80741.3753	-13.4	-14.6	1.2	9.8	0.8	5.61	0.35	4.04	5.26		E		2															n	
ITP-1333a		442795.000	5942797.000	533751.0180	80805.7672	-13.1	-13.6	0.5	52.3	4.2	52.25	-5.58	4.00	57.83		C	x	31	18.07.23	09:22:00	HT08	T. Scheffl	M. Mikute	15.0	0.20	0.60	0.2		y	y		y	y	scrap (tyre); found by as left
ITP-1333b		442796.150	5942799.050	533751.0848	80805.8285	-13.1	-13.6	0.5	52.3	4.2	52.25	-5.58	4.00	57.83		C	x	31	18.07.23	09:11:00	HT08	T. Scheffl	M. Mikute	70.0	1.00	0.20	0.8	Recovered by MIRA A on 02.08.2023. As-left	y	n	x	y	y	SD 70 HE German HE aerial bomb
ITP-1334		441959.930	5942799.220	533750.7590	80720.3100	-8.4	-11.2	2.8	78.2	6.3	5.08	-5.36	4.32	10.44		B	x	32	19.08.23	16:30:00	HT08	T. Scheffl	M. Mikutei	t			3.0		n	n		y	y	no signal, nothing found
ITP-1335		442826.260	5942799.660	533751.1164	80807.4670	-14.0	-14.0	0.0	652.8	52.2	1289.12	-206.66	2.55	1495.78		A	x	31	27.07.23	08:32:00	HT08	T. Scheffl	M. Mikute	2000.0	2.50	2.00	1.3		y	y		y	y	scrap, ship anchor
ITP-1336		442287.280	5942800.220	533750.9346	80738.1278	-13.1	-13.1	0.0	16.1	1.3	46.08	-22.86	1.89	68.94		C	x	2	22.05.23	02:40:00	MIRA A	C. Richte	G. Maric	26.0	1.10	0.05	0.8		y	y		y	y	scrap
ITP-1337		442604.960	5942801.160	533751.0778	80755.4199	-12.6	-12.8	0.2	2.8	0.2	3.37	-1.02	2.50	4.40		F		31															n	
ITP-1338		442922.720	5942801.920	533751.2274	80812.7162	-15.1	-16.0	0.9	16.9	1.4	4.33	-4.27	2.61	8.60		C		5															n	
ITP-1339		442642.200	5942802.820	533751.1462	80757.4459	-13.1	-13.1	0.0	3.9	0.3	27.96	0.16	0.80	27.79		F		31															n	
ITP-1340		442315.190	5942802.940	533751.0207	80739.6450	-13.2	-13.9	0.7	60.9	4.9	38.83	-7.24	2.84	46.07		C	x	2	20.05.23	20:35:00	MIRA A	C. Richte	G. Maric	104.0	127.00	0.02	1.2		y	y		y	y	SWR (steel wire rope)
ITP-1341		442383.210	5942803.760	533751.0742	80743.3475	-12.6	-14.9	2.3	121.9	9.7	5.86	-35.56	8.69	41.42		B	x	2	14.06.23	04:07:00	MIRA A	D. Mirjanic	A. Franz	450.0	50.00	0.04	1.5		y	y		y	y	SWR (steel wire rope)
ITP-1342		442285.800	5942805.700	533751.0757	80738.0443	-13.6	-13.8	0.2	12.1	1.0	15.43	-3.49	2.60	18.92		D	x	2	21.05.23	21:32:00	MIRA A	T. Reiche	G. Maric	15.0	0.33	0.12	0.5		y	y	x	y	y	12 cm HE projectile
ITP-1343		442889.380	5942805.560	533751.3321	80810.8990	-15.0	-15.0	0.0	1.4	0.1	46.74	-8.76	1.00	55.50		F		5															n	
ITP-1344		442657.960	5942805.650	533751.2439	80758.3019	-13.0	-13.7	0.7	19.6	1.6	13.62	-2.64	3.60	16.26		C	x	31	10.07.23	13:10:00	HT08	T. Scheffl	M. Mikutei	t		1.20	1.00	0.5		y	n		y	y	boulder
ITP-1345		442342.730	5942806.590	533751.1497	80741.1422	-13.7	-14.6	0.9	26.2	2.1	8.26	-7.23	3.28	15.48		C	x	2	26.05.23	06:13:00	MIRA A	C. Richte	G. Maric	46.0	1.14	0.37	1.6		y	y	x	y	y	munition box (3 x 7.62cm full rounds)
ITP-1346		442384.010	5942807.360	533751.1910	80743.3987	-12.4	-13.8	1.4	61.9	5.0	4.13	-29.54	4.39	33.67		C	x	2	14.06.23	04:07:00	MIRA A	D. Mirjanic	A. Franz	450.0	50.00	0.04	1.5		y	y		y	y	SWR (steel wire rope)
ITP-1347		442284.540	5942807.620	533751.1600	80737.9740	-13.4	-14.8	1.4	52.8	4.2	13.82	-8.78	4.02	22.61		C	x	2	21.05.23	20:28:00	MIRA A	T. Reiche	G. Maric				0.0		y	n		y	y	geology
ITP-1348		442910.880	5942808.410	533751.4328	80812.0674	-14.6	-14.6	0.0	9.5	0.8	11.40	-6.20	1.84	17.59		E		5															n	
ITP-1349		442824.490	5942808.520	533751.4024	80807.3648	-13.8	-16.7	2.9	2971.7	237.7	-1.05	-253.23	8.66	252.18		A	x	31	14.06.23	10:15:00	HT08	T. Scheffler			160.0	30.00	0.04	2.5		y	y		y	y	SWR (steel wire rope)
ITP-1350		442406.530	5942808.530	533751.2378	80744.6138	-11.6	-11.6	0.0	3.0	0.2	6.45	-4.50	3.07	10.94		F		31															n	
ITP-1351		442884.800	5942810.190	533751.4801	80810.6466	-15.1	-15.1	0.0	8.6	0.7	65.49	-4.00	5.37	69.49		E		5															n	
ITP-1352		442874.880	5942810.990	533751.5021	80810.1061	-15.2	-15.7	0.5	92.8	7.4	19.53	-70.59	2.88	90.12		B		5															n	
ITP-1353		442708.400	5942811.380	533751.4492	80801.0437	-13.1	-13.6	0.5	8.7	0.7	3.74	-3.90	3.60	7.65		E		31															n	
ITP-1354		442367.290	5942811.440	533751.3243	80743.5645	-12.4	-12.4	0.0	36.3	2.9	134.71	-45.78	1.84	180.49		C	x	2	26.05.23	22:20:00	MIRA A	D. Mirjanic	A. Franz	450.0	50.00	0.04	1.5		y	y		y	y	SWR (Steel wire rope)
ITP-1355		442691.900	5942811.720	533751.4537	80800.1454	-12.8	-12.8	0.0	88.9	7.1	209.16	-139.36	2.21	346.52		B	x	31	10.07.23	13:57:00	HT08	T. Scheffl	M. Mikute	40.0	1.40	1.10	0.5		y	y		y	y	scrap
ITP-1356		442888.620	5942812.580	533751.5589	80810.8530	-14.9	-16.2	1.3	109.6	8.8	32.07	-18.31	5.50	50.38		B		5															n	
ITP-1357		442624.050	5942812.650	533751.4570	80756.4514	-12.8	-13.4	0.6	24.7	2.0	11.02	-8.69	2.78	19.71		C	x	31	10.07.23	13:31:00	HT08	T. Scheffl	M. Mikute	70.0	1.00	0.20	1.1	Recovered and cleared by MIRA A on 26.07.2023. Handed over to German EOD Authorities (KBD) on 27.07.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1358		442955.290	5942813.560	533751.6168	80814.4814	-18.1	-18.8	0.7	170.4	13.6	99.29	-70.32	3.58	169.61		B		5															n	
ITP-1359		442826.290	5942814.490	533751.5962	80807.4589	-14.4	-14.4	0.0	286.9	23.0	681.16	-178.93	1.70	860.09		B	x	31	13.06.23	15:45:00	HT08	T. Scheffler			100.0	1.00	1.00	0.1		y	y		y	y	scrap
ITP-1360		442388.530	5942815.270	533751.4487	80743.6295	-12.4	-12.4	0.0	6.8	0.5	17.90	-3.95	3.92	21.85		E		2															n	
ITP-1361		442952.040	5942816.340	533751.7055	80814.3027	-18.0	-18.0	0.0	122.0	9.8	109.32	-126.00	2.01	235.32		B		5															n	
ITP-1362		442880.970	5942816.400	533751.6795	80810.4341	-14.9	-14.9	0.0	15.0	1.2	32.93	-4.69	4.20	37.62		D	x	5	05.08.23	11:17:00	MIRA A	T. Reiche	G. Maric	102.0	1.10	1.10	0.5		y	y		y	y	car tyre
ITP-1363		442345.670	5942817.120	533751.4916	80741.2952	-13.5	-15.0	1.5	35.3	2.8	7.16	-5.11	3.12	12.27		C	x	2	26.05.23	11:58:00	MIRA A	T. Reiche	G. Maric	46.0	1.14	0.37	1.5		y	y	x	y	y	munition box (3 x 7.62cm full rounds)
ITP-1364		442808.500	5942818.590	533751.7219	80806.4878	-13.1	-13.8	0.7	21.8	1.7	7.27	-7.73	2.97	14.99		C	x	31	14.06.23	11:17:00	HT08	T. Scheffl	M. Mikute	15.0	0.50	0.12	0.8		y	y	x	y	y	30 lbs INC GB Brandbombe/ incendiary bomb
ITP-1365		442390.850	5942818.910	533751.5674	80743.7533	-12.3	-12.3	0.0	13.9	1.1	12.02	-22.98	1.57	35.00		D	x	2	13.06.23	22:15:00	MIRA A	M. Kano	A. Franz	450.0	50.00	0.04	1.5		y	y		y	y	SWR (steel wire rope)
ITP-1366		442789.840	5942819.780	533751.7531	80805.4713	-13.0	-13.2	0.2	21.3	1.7	31.26	-0.32	3.94	31.58		C	x	31	11.07.23	13:34:00	HT08	T. Scheffl	M. Mikutei	t		1.80	1.00	1.0		y	n		y	y	boulder
ITP-1367		442823.920	5942820.410	533751.7868	80807.3259	-14.3	-16.0	1.7	148.1	11.8	52.10	-2.91	6.00	55.01		B	x	31	13.06.23	15:40:00	HT08	T. Scheffler			75.0	15.00	0.04	1.4		y	y		y	y	SWR (steel wire rope)
ITP-1368		442635.480	5942821.050	533751.7333	80757.0680	-12.9	-13.0	0.1	5.5	0.4	7.47	-3.36	2.56	10.82		E		31															n	
ITP-1369		442673.610	5942822.970	533751.8105	80759.1423	-13.1	-13.1	0.0	2.3	0.2	19.45	0.12	1.10	19.33		F		31															n	

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	veigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-1370		442697.960	5942823.010	533751.8214	80800.4677	-13.0	-13.8	0.8	21.0	1.7	11.80	-2.83	3.06	14.63		C	x	31	17.07.23	14:15:00	HT08	. Scheffl	M. Mikute	70.0	1.00	0.20	0.0	Cleared and recovered by MIRA A on 02.08.2023. Handed over to the German EOD Authorities (KBD) on 03.08.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1371		442945.070	5942824.680	533751.9726	80813.9178	-18.4	-18.6	0.2	5.2	0.4	5.71	-1.95	2.81	7.66		E		5															n	
ITP-1372		442494.560	5942825.010	533751.8058	80749.3946	-11.8	-11.8	0.0	7.8	0.6	2.95	-7.01	2.10	9.95		E		31															n	
ITP-1373		442616.890	5942826.250	533751.8942	80756.0526	-13.1	-13.1	0.0	5.9	0.5	19.13	-4.83	2.04	23.96		E		31															n	
ITP-1374		442396.870	5942827.630	533751.8519	80744.0752	-12.0	-18.3	6.3	13905.2	1112.4	0.40	-243.78	22.40	244.17		A	x	31	13.06.23	22:10:00	MIRA A	D. Mirjani	A. Franz	450.0	50.00	0.04	1.5		y	y		y	y	SWR (steel wire rope)
ITP-1375		442485.480	5942827.770	533751.8915	80748.8985	-12.1	-13.7	1.6	111.6	8.9	22.35	-15.39	5.02	37.74		B	x	31	09.07.23	19:00:00	HT08	. Scheffl	M. Mikute	10.0	3.00	0.03	2.0		y	y		y	y	scrap
ITP-1376		442656.570	5942828.310	533751.9766	80758.2112	-13.1	-13.3	0.2	23.5	1.9	20.31	-5.44	2.28	25.75		C	x	31	10.07.23	12:54:00	HT08	. Scheffl	M. Mikute	70.0	1.00	0.20	0.3	Recovered and cleared by MIRA A on 26.07.2023. Handed over to German EOD Authorities (KBD) on 27.07.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1377		442320.950	5942830.050	533751.9001	80739.9410	-13.2	-13.9	0.7	118.2	9.5	83.34	-34.04	3.68	117.38		B	x	2	21.05.23	02:46:00	MIRA A	C. Richte	G. Maric	25.0	5.00	0.03	0.5		y	y		y	y	SWR (steel wire rope)
ITP-1378		441926.560	5942832.060	533751.8082	80718.4715	-8.6	-11.6	3.0	86.9	7.0	7.26	-2.65	5.81	9.91		B	x	4	14.08.23	18:30:00	HT08	. Scheffl	M. Mikute	25.0	0.25	0.60	3.3		y	y		y	y	scrap (car tyre)
ITP-1379		442659.550	5942832.550	533752.1149	80758.3706	-13.1	-13.1	0.0	39.1	3.1	138.13	-47.10	1.98	185.23		C	x	31	10.07.23	12:32:00	HT08	. Scheffl	M. Mikute	70.0	1.00	0.20	0.2	Recovered and cleared by MIRA A on 26.07.2023. Handed over to German EOD Authorities on 27.07.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb;
ITP-1380		442295.930	5942834.130	533752.0222	80738.5763	-13.5	-13.5	0.0	1.2	0.1	14.71	-1.83	1.79	16.54		F		2															n	
ITP-1381		442482.530	5942835.330	533752.1349	80748.7329	-11.7	-11.7	0.0	10.0	0.8	5.10	-9.48	2.55	14.58		D	x	31	09.07.23	18:45:00	HT08	. Scheffl	M. Mikute	20.0	6.00	0.03	1.2		y	y		y	y	scrap
ITP-1382		442551.430	5942835.410	533752.1648	80752.4833	-12.2	-12.3	0.1	21.7	1.7	18.07	-16.42	2.04	34.49		C	x	31	11.07.23	08:50:00	HT08	. Scheffl	M. Mikute	10.0	0.40	0.08	0.2		y	y	x	y	y	8 cm german HE mortar
ITP-1383		442680.240	5942836.250	533752.2428	80759.4944	-13.1	-13.8	0.7	38.9	3.1	17.26	-9.72	2.69	26.99		C	x	31	22.07.23	11:20:00	HT08	. Scheffl	M. Mikute	20.0	3.00	0.05	0.5		y	y		y	y	scrap
ITP-1384		442294.870	5942837.410	533752.1279	80738.5164	-13.5	-13.5	0.0	3.9	0.3	8.93	-1.83	1.83	10.76		F		2															n	
ITP-1385		442588.620	5942837.860	533752.2587	80754.5061	-12.6	-12.8	0.2	5.8	0.5	3.85	-3.93	2.28	7.79		E		31															n	
ITP-1386		442899.970	5942838.550	533752.4036	80811.4537	-14.5	-14.5	0.0	7.9	0.6	17.20	-15.04	1.72	32.24		E		5															n	
ITP-1387		442483.830	5942839.290	533752.2636	80748.8010	-11.4	-11.6	0.2	14.7	1.2	20.31	-4.25	4.18	24.55		D	x	31	09.07.23	18:20:00	HT08	. Scheffl	M. Mikute				1.0		y	n		y	y	geology; dredged by airlift
ITP-1388		442756.470	5942840.010	533752.3945	80803.6414	-13.2	-13.6	0.4	7.9	0.6	10.12	-3.01	4.62	13.14		E		31															n	
ITP-1389		442851.690	5942840.220	533752.4387	80808.8245	-14.0	-14.2	0.2	5.8	0.5	3.58	-4.05	2.24	7.64		E		33															n	
ITP-1390		441928.400	5942841.950	533752.1289	80718.5650	-8.7	-12.1	3.4	80.1	6.4	5.16	-1.72	6.00	6.88		B	x	4	14.08.23	19:30:00	HT08	. Scheffl	M. Mikute	it			3.5		n	n		y	y	signal deeper 4m below ground
ITP-1391		442810.930	5942842.160	533752.4855	80806.6045	-13.6	-13.9	0.3	155.7	12.5	108.53	-87.21	2.20	195.74		B	x	31	19.07.23	09:40:00	HT08	. Scheffl	M. Mikute	12.0	0.25	0.08	0.5		y	y		y	y	scrap
ITP-1392		442888.730	5942843.450	533752.5578	80810.8386	-14.4	-14.7	0.3	35.9	2.9	35.17	-16.04	2.81	51.22		C	x	5	09.08.23	13:35:00	MIRA A	T. Reiche	A. Franz	66.0	0.80	0.20	0.5	Wet stored at location 442146,9mE, 5943269.2mN (1230, 1392, 1423)	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1393a		442300.530	5942843.720	533752.3343	80738.8203	-13.5	-13.5	0.0	12.6	1.0	22.45	-12.95	2.24	35.40		D	x	2	22.05.23	15:10:00	MIRA A	T. Reiche	G. Maric	15.0	0.33	0.12	1.3		y	y	x	y	y	12 cm HE projectile (not fused)
ITP-1393b		442300.530	5942843.720	533752.3343	80738.8203	-13.5	-13.5	0.0	12.6	1.0	22.45	-12.95	2.24	35.40		D	x	2	22.05.23	15:15:00	MIRA A	T. Reiche	G. Maric	6.0	0.28	0.07	1.3		y	y	x	y	y	7.5 cm HE projectile (not fused)
ITP-1393c		442300.530	5942843.720	533752.3343	80738.8203	-13.5	-13.5	0.0	12.6	1.0	22.45	-12.95	2.24	35.40		D	x	2	22.05.23	15:25:00	MIRA A	T. Reiche	G. Maric	6.0	0.23	0.07	1.3		y	y	x	y	y	7.62 cm HE projectile (not fused)
ITP-1394		442801.750	5942843.760	533752.5336	80806.1037	-13.5	-14.7	1.2	83.8	6.7	21.08	-15.95	3.62	37.02		B	x	31	19.07.23	09:45:00	HT08	. Scheffl	M. Mikute	15.0	0.48	0.10	1.2		y	y		y	y	scrap
ITP-1395		442872.600	5942844.540	533752.5867	80809.9598	-14.0	-14.0	0.0	185.9	14.9	542.25	-215.01	2.60	757.25		B	x	5	04.08.23	22:35:00	MIRA A	D. Mirjani	G. Maric	3.0	1.50	0.10	1.1		y	y		y	y	scrap
ITP-1396		442285.430	5942845.650	533752.3908	80737.9971	-13.5	-13.5	0.0	3.8	0.3	11.07	-5.63	1.61	16.69		F		2															n	
ITP-1397a		442725.940	5942845.770	533752.5688	80801.9757	-13.2	-13.3	0.1	64.1	5.1	72.15	-34.62	2.33	106.78		C	x	31	17.07.23	13:10:00	HT08	. Scheffl	M. Mikute	70.0	1.20	0.20	0.0	Recovered and cleared by MIRA A on 27.07.2023. Handed over to the German EOD Authorities on 28.07.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1397b		442727.000	5942847.000	533752.6090	80802.0326	-13.2	-13.3	0.1	64.1	5.1	72.15	-34.62	2.33	106.78		C	x	31	17.07.23	13:20:00	HT08	. Scheffl	M. Mikute	0.2	0.15	0.02	0.0		y	y	x	y	y	2 cm cartridge HE, german (found by as left)
ITP-1398		441891.800	5942846.290	533752.2547	80716.5698	-8.6	-12.4	3.8	276.8	22.1	10.54	-7.84	5.77	18.38		B	x	4	15.08.23	06:45:00	HT08	. Scheffl	M. Mikute	it			3.8		n	n		y	y	no signal, nothing found
ITP-1399		442685.780	5942846.620	533752.5805	80759.7891	-12.9	-12.9	0.0	3.3	0.3	7.06	-1.64	2.83	8.70		F		31															n	
ITP-1400		441905.090	5942847.500	533752.2992	80717.2924	-8.7	-11.7	3.0	303.5	24.3	17.38	-16.47	5.80	33.85		A	x	4	15.08.23	14:25:00	HT08	. Scheffl	M. Mikute	it			3.2		n	n		y	y	target unfinished; strong signal by 3.2 m, possible depth over 4 m
ITP-1401		442829.470	5942847.520	533752.6662	80807.6101	-14.2	-14.2	0.0	7.9	0.6	7.40	-7.34	2.01	14.74		E		33															n	
ITP-1402a		442296.800	5942847.930	533752.4690	80738.6145	-13.1	-13.2	0.1	10.2	0.8	14.23	-4.26	3.02	18.49		D	x	2	22.05.23	21:05:00	MIRA A	C. Richte	G. Maric	15.0	0.33	0.12	0.5		y	y	x	y	y	12.0 cm HE projectile (not fused)
ITP-1402b		442296.800	5942847.930	533752.4690	80738.6145	-13.1	-13.2	0.1	10.2	0.8	14.23	-4.26	3.02	18.49		D	x	2	22.05.23	21:10:00	MIRA A	C. Richte	G. Maric	15.0	0.33	0.12	0.5		y	y	x	y	y	12 cm HE projectile (not fused)
ITP-1402c		442296.800	5942847.930	533752.4690	80738.6145	-13.1	-13.2	0.1	10.2	0.8	14.23	-4.26	3.02	18.49		D	x	2	22.05.23	21:15:00	MIRA A	C. Richte	G. Maric	6.0	0.23	0.07	0.5		y	y	x	y	y	7.62 cm HE projectile (not fused)
ITP-1402d		442296.800	5942847.930	533752.4690	80738.6145	-13.1	-13.2	0.1	10.2	0.8	14.23	-4.26	3.02	18.49		D	x	2	22.05.23	21:20:00	MIRA A	C. Richte	G. Maric	6.0	0.28	0.07	0.5		y	y	x	y	y	7.5 cm HE projectile (not fused)
ITP-1403a		442299.520	5942848.020	533752.4730	80738.7625	-13.2	-13.3	0.1	14.1	1.1	17.34	-5.57	1.84	22.91		D	x	2	22.05.23	21:55:00	MIRA A	C. Richte	G. Maric	6.0	0.23	0.07	0.5		y	y	x	y	y	7.62 cm HE projectile (not fused)
ITP-1403b		442299.520	5942848.020	533752.4730	80738.7625	-13.2	-13.3	0.1	14.1	1.1	17.34	-5.57	1.84	22.91		D	x	2	22.05.23	22:00:00	MIRA A	C. Richte	G. Maric	6.0	0.24	0.70	0.5		y	y	x	y	y	7.5 cm HE projectile (not fused)
ITP-1403c		442299.520	5942848.020	533752.4730	80738.7625	-13.2	-13.3	0.1	14.1	1.1	17.34	-5.57	1.84	22.91		D	x	2	22.05.23	22:08:00	MIRA A	C. Richte	G. Maric	6.0	0.27	0.07	0.5		y	y	x	y	y	7.5 cm HE projectile (not fused)
ITP-1404		442764.260	5942848.640	533752.6768	80804.0597	-13.6	-14.5	0.9	141.6	11.3	75.37	-37.79	4.42	113.16		B	x	31	16.07.23	19:32:00	MIRA A	K. Seiffer	O. Pfeil	7.0	1.30	0.03	1.3		y	y		y	y	steel pipe
ITP-1405		442517.460	5942849.330	533752.6017	80750.6249	-11.8	-13.4	1.6	32.3	2.6	7.27	-5.06	4.39	12.33		C	x	31	09.07.23	19:00:00	HT08	. Scheffl	M. Mikute	it			1.5		y	n		y	y	geology; dredged by airlift
ITP-1406		442717.590	5942850.570	533752.7208	80801.5180	-13.0	-13.2	0.2	28.0	2.2	30.70	-14.65	2.47	45.35		C	x	31	17.07.23	13:40:00	HT08	. Scheffl	M. Mikute	70.0	1.00	0.20	0.1	2023.Handed over to th	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1407		442824.750	5942852.750	533752.8335	80807.3497	-14.2	-14.7	0.5	15.8	1.3	7.37	-8.87	2.79	16.24		C	x	33	30.07.23	16:48:00	MIRA A	T. Reiche	G. Maric	4.0	0.49	0.14	0.6		y	y	x	y	y	30 lbs flame type jet MK 1
ITP-1408		442507.690	5942853.030	533752.7176	80750.0907	-11.7	-12.5	0.8	12.7	1.0	8.76	-1.09	3.44	9.85		D	x	31	09.07.23	18:50:00	HT08	. Scheffl	M. Mikute	it			1.0		y	n		y	y	geology; dredged by airlift
ITP-1409		442591.580	5942854.630	533752.8025	80754.6561	-13.0	-15.5	2.5	34.1	2.7	4.69	-1.01	5.29	5.70		C	x	31	17.07.23	08:19:00	MIRA A	M. Heinz	G. Maric				0.2		y	n		y	y	small object flushed away
ITP-1410		442227.660	5942856.070	533752.7050	80734.8455	-13.2	-13.7	0.5	13.5	1.1	7.57	-4.11	2.00	11.68		D	x	1	25.05.23	10:40:00	MIRA A	T. Reiche	G. Maric	4.0	0.17	0.13	0.3		y	y		y	y	slag
ITP-1411		442287.390	5942856.170	533752.7319	80738.0967	-13.0	-13.0	0.0	5.3	0.4	10.57	-4.20	1.79	14.77		E		2															n	
ITP-1412a		442298.270	5942857.500	533752.7793	80738.6881	-12.9	-13.2	0.3	23.8	1.9	23.75	-10.52	2.61	34.27		C	x	2	23.05.23	04:20:00	MIRA A	C. Richte	G. Maric	15.0	0.33	0.12	0.3		y	y	x	y	y	12 cm HE projectile (not fused)
ITP-1412b		442298.270	5942857.500	533752.7793	80738.6881	-12.9	-13.2	0.3	23.8	1.9	23.75	-10.52	2.61	34.27		C	x	2	23.05.23	04:27:00	MIRA A	C. Richte	G. Maric	6.0	0.23	0.07	0.3		y	y	x	y	y	7.62 cm HE projectile (not fused)
ITP-1412c		442298.270	5942857.500	533752.7793	80738.6881	-12.9	-13.2	0.3	23.8	1.9	23.75	-10.52	2.61	34.27		C	x	2	23.05.23	04:32:00	MIRA A	C. Richte	G. Maric	6.0	0.28	0.07	0.3		y	y	x	y	y	7.5 cm HE projectile (not fused)
ITP-1412d		442298.270	5942857.500	533752.7793	80738.6881	-12.9	-13.2	0.3	23.8	1.9	23.75	-10.52	2.61	34.27		C	x	2	24.05.23	16:40:00	MIRA A	T. Reiche	G. Maric	15.0	0.33	0.12	0.3		y	y	x	y	y	12 cm HE projectile (not fused)
ITP-1412e		442298.270	5942857.500	533752.7793	80738.6881	-12.9	-13.2	0.3	23.8	1.9	23.75	-10.52	2.61	34.27		C	x	2	24.05.23	16:45:00	MIRA A	T. Reiche	G. Maric	6.0	0.28	0.07	0.3		y	y	x	y	y	7.5 cm HE projectile (not fused)
ITP-1412f		442298.270	5942857.500	533752.7793	80738.6881	-12.9	-13.2	0.3	23.8	1.9	23.75	-10.52	2.61	34.28		C	x	2	24.05.23	16:50:00	MIRA A	T. Reiche	G. Maric	6.0	0.28	0.70	0.3		y	y	x	y	y	7.5 cm HE projectile (not fused)
ITP-1413		442690.640	5942857.750	533752.9425	80800.0463	-12.6	-12.6	0.0	13.2	1.1	23.99	-6.78	2.06	30.77		D	x	31	10.06.23	12:15:00	HT08	D. Mikute	it		12.0	0.56	0.56	0.4		y	y		y	y	tyre
ITP-1414		442832.950	5942859.210	533753.0458	80807.7918	-14.4	-14.4	0.0	46.5	3.7	104.13	-21.02	3.28	125.15		C	x	33	24.07.23	18:26:00	MIRA A	M. Heinz	G. Maric	8.0	0.33	0.10	0.3		y	y	x	y	y	10.5 cm phosphorus mortar grenate (British origin)
ITP-1415		442846.790	5942859.790	533753.0700	80808.5448	-14.5	-14.5	0.0	2.6	0.2	10.23	-1.26	2.61	11.48		F		33															n	
ITP-1416		442289.940	5942859.800	533752.8504	80738.2331	-12.8	-12.8	0.0	1.5	0.1	5.84	-0.58	2.16	6.41		F		2															n	
ITP-1417		442825.900	5942860.560	533753.0867	80807.4072	-14.2	-14.2	0.0	6.0	0.5	13.18	-14.33	1.44	27.52		E		33															n	
ITP-1418		442901.320	5942862.920	533753.1927	80811.5110	-15.5	-15.5	0.0	0.3	0.0	15.56	-2.60	0.57	18.16		F		5															n	
ITP-1419		442856.130	5942864.290	533753.2192	80809.0503	-14.3	-14.4	0.1	10.9	0.9	20.00	-0.60	2.72	20.60		D	x	5	04.08.23	22:10:00	MIRA A	D. Mirjani	G. Maric		1.50	1.50	0.0	2x Boulder 1m x 1m; 1.5m x 1.5m	y	n		y	y	boulder 2 x

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

total		finsihed	open	
45	Prio1:	45	0	targets piling area
56	Prio 2:	56	0	bearthing zone
393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
47	Prio 3.2:	47	0	barge area
59	Prio 3.3:	59	0	dredge area safety zone
229	Prio 4:	229	0	pipe routes
31	Prio 5:	31	0	outside
>50 kg 43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg 74	Prio 7:	74	0	not dredged survey
>50 kg 72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	weigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-1420		442636.690	5942864.460	533753.1383	80757.1051	-13.0	-13.4	0.4	7.3	0.6	4.11	-3.44	2.33	7.55		E		31																n	
ITP-1421		442749.710	5942627.410	533746.5132	80803.4142	-12.7	-12.7	0.0	11.7	0.9	18.51	-6.59	4.25	25.10		D	x	31	23.06.23	16:45:00	HT08	. Scheffl	. Mikuteit	10.0	0.20	0.20	0.2		y	y		y	y	scrap, bolts
ITP-1422		442596.870	5942865.840	533753.1673	80754.9366	-12.9	-13.1	0.2	8.7	0.7	13.16	-3.46	4.41	16.62		E		31																n	
ITP-1423		442893.790	5942866.270	533753.2981	80811.0989	-14.9	-14.9	0.0	48.0	3.8	75.53	-26.45	2.13	101.98		C	x	5	10.08.23	01:15:00	MIRA A	D. Mirjani	A. Franz	70.0	0.80	0.20	0.3	442146.9mE, 5943269.2	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1424		442407.160	5942867.560	533753.1479	80744.6087	-12.0	-13.7	1.7	63.6	5.1	6.65	-10.24	4.12	16.89		C	x	31	06.06.23	15:50:00	HT08	. Scheffler					0.4	small piece of steel wire rope sucked away by airlift	y	n		y	y	SWR (steel wire rope)
ITP-1425		442240.640	5942867.590	533753.0828	80735.5443	-13.1	-13.1	0.0	22.8	1.8	2.06	-32.27	2.02	34.33		C	x	2	25.05.23	05:07:00	MIRA A	C. Richte	G. Maric	0.0	0.30	0.03	0.3		y	y		y	y	scrap
ITP-1426		442873.210	5942867.650	533753.3347	80809.9778	-14.5	-14.5	0.0	3.0	0.2	4.22	-2.92	1.74	7.14		F		5																n	
ITP-1427		441867.950	5942868.260	533752.9560	80715.2568	-8.9	-11.7	2.8	183.8	14.7	20.43	-6.48	5.44	26.90		B	x	4	05.10.23	11:02:00	HT08	. Scheffl	. Mikuteit	30.0	0.30	0.80	2.8		y	y		y	y	scrap, (car tyre)
ITP-1428		441932.040	5942868.910	533753.0026	80718.7450	-9.1	-13.4	4.3	454.0	36.3	17.90	-8.67	7.01	26.57		A	x	32	18.08.23	16:05:00	HT08	. Scheffl	. Mikuteit				3.9		n	n		y	y	nothing found
ITP-1429		442839.730	5942868.970	533753.3642	80808.1544	-14.3	-14.3	0.0	5.0	0.4	10.76	-2.81	2.28	13.57		E		33																n	
ITP-1430		442683.780	5942869.030	533753.3048	80759.6654	-12.7	-12.7	0.0	12.5	1.0	47.79	1.40	5.80	46.39		D	x	31	10.06.23	12:25:00	HT08	. Mikuteit	Gebhar	40.0	0.49	0.16	0.3		y	y	x	y	y	17 cm HE shell
ITP-1431		442808.230	5942870.050	533753.3868	80806.4390	-13.9	-15.0	1.1	522.7	41.8	78.89	-143.10	3.81	221.99		A	x	31	19.07.23	09:46:00	HT08	. Scheffl	. Mikuteit	60.0	1.40	0.20	0.5		y	y		y	y	SWR (steel wire rope)
ITP-1432		442743.830	5942870.080	533753.3624	80802.9334	-14.7	-16.5	1.8	63.3	5.1	7.60	-9.93	3.82	17.53		C	x	31	16.07.23	07:19:00	MIRA A	K. Seiffer	O. Pfeil	7.0	1.30	0.02	1.5		y	y		y	y	scrap
ITP-1433		442580.850	5942870.170	533753.3010	80754.0617	-12.9	-13.3	0.4	56.4	4.5	21.40	-60.18	2.16	81.58		C	x	31	14.07.23	23:17:00	MIRA A	M. Heinz	G. Maric	60.0	0.50	0.60	0.5		y	y		y	y	SWR (steel wire rope)
ITP-1434		441876.900	5942870.400	533753.0288	80715.7426	-8.7	-11.7	3.0	454.6	36.4	25.64	-24.73	6.36	50.37		A	x	4	05.10.23	17:40:00	HT08	. Scheffl	. Mikuteit	90.0	0.60	0.21	3.3		y	y	x	y	y	21 cm shell HE, not fired
ITP-1435		442574.260	5942870.720	533753.3162	80753.7026	-12.5	-12.5	0.0	33.8	2.7	86.59	-1.69	4.47	88.28		C	x	31	15.07.23	00:04:00	MIRA A	K. Seiffer	O. Pfeil	15.0	1.50	0.08	1.0		y	y		y	y	SWR (steel wire rope)
ITP-1436		442565.660	5942871.960	533753.3530	80753.2336	-12.5	-13.6	1.1	17.1	1.4	7.60	-2.51	4.31	10.11		C	x	31	15.07.23	05:41:00	MIRA A	K. Seiffer	O. Pfeil	20.0	0.58	0.12	2.0		y	y	x	y	y	12 cm HE projectile (German origin)
ITP-1437		442718.300	5942873.100	533753.4501	80801.5417	-12.8	-12.8	0.0	10.0	0.8	32.29	-21.14	1.13	53.44		D	x	31	16.07.23	00:36:00	MIRA A	K. Seiffer	O. Pfeil	7.0	0.40	0.10	0.5		y	y		y	y	scrap
ITP-1438		442233.830	5942874.040	533753.2888	80735.1693	-12.3	-12.4	0.1	7.7	0.6	14.23	-1.71	3.63	15.93		E		2																n	
ITP-1439		442402.360	5942875.430	533753.4006	80744.3422	-12.0	-13.3	1.3	39.3	3.1	7.02	-7.41	3.49	14.42		C	x	31	12.07.23	14:26:00	MIRA A	M. Heinz	G. Maric	7.0	5.00	0.02	1.2		y	y		y	y	SWR (steel wire rope)
ITP-1440		442872.210	5942875.490	533753.5879	80809.9182	-14.9	-15.0	0.1	6.9	0.6	7.01	-5.21	2.21	12.22		E		5																n	
ITP-1441		442762.800	5942876.010	533753.5617	80803.9621	-14.7	-15.1	0.4	255.5	20.4	79.96	-140.97	1.90	220.93		B	x	31	13.07.23	09:15:00	HT08	. Scheffl	. Mikuteit	20.0	3.00	0.04	1.2		y	y		y	y	scrap (steel pipe with cabel)
ITP-1442		442204.270	5942876.090	533753.3434	80733.5589	-12.4	-13.5	1.1	18.3	1.5	3.67	-3.60	2.88	7.26		C	x	1	25.05.23	11:15:00	MIRA A	F. Reiche	G. Maric				1.5		y	n		y	y	boulder
ITP-1443		442369.200	5942876.390	533753.4186	80742.5365	-12.3	-12.8	0.5	118.1	9.4	59.17	-51.82	2.78	110.99		B	x	31	06.06.23	15:15:00	HT08	. Scheffl	. Scheffl	75.0	1.00	1.00	1.5		y	y		y	y	SWR (steel wire rope)
ITP-1444		442724.660	5942876.830	533753.5732	80801.8855	-14.4	-15.0	0.6	312.8	25.0	102.13	-147.23	2.84	249.37		A	x	31	16.07.23	00:36:00	MIRA A	K. Seiffer	O. Pfeil	15.0	2.00	0.06	1.0		y	y		y	y	steel pipe
ITP-1445		442796.900	5942876.900	533753.6039	80805.8178	-13.7	-14.2	0.5	76.9	6.2	18.69	-36.94	2.26	55.63		B	x	31	31.07.23	11:45:00	HT08	. Scheffl	. Mikuteit	13.0	0.49	0.10	0.5		y	y	x	y	y	10.5 cm shell,chemical agents, German; hand over to GEKA 01.08.2023
ITP-1446		442684.070	5942877.590	533753.5818	80759.6755	-12.5	-13.2	0.7	242.5	19.4	69.40	-100.51	2.95	169.92		B	x	31	10.06.23	12:06:00	HT08	. Mikuteit	G. Maric	10.0	0.90	0.30	1.1		y	y		y	y	scrap
ITP-1447		442416.140	5942878.250	533753.4973	80745.0904	-12.0	-13.4	1.4	107.5	8.6	20.30	-17.67	3.54	37.97		B	x	31	12.07.23	15:16:00	MIRA A	M. Heinz	G. Maric	34.0	0.85	0.15	1.5		y	y	x	y	y	15 cm HE rocket (German origin)
ITP-1448		442853.330	5942878.840	533753.6889	80808.8882	-14.7	-14.7	0.0	69.3	5.5	99.44	-50.37	2.13	149.81		C	x	5	04.08.23	21:48:00	MIRA A	D. Mirjani	G. Maric	4.0	1.00	0.12	0.0		y	y		y	y	scrap
ITP-1449		442807.320	5942632.360	533745.6960	80806.5468	-13.3	-19.1	5.8	2193.0	175.4	-0.39	-52.09	17.25	51.71		A	x	31	14.06.23	16:35:00	HT08	. Scheffl	. Scheffl	3500.0	1.00	1.00	4.0		y	y		y	y	scrap, concrete block with chain
ITP-1450		442546.190	5942880.580	533753.6242	80752.1681	-12.3	-13.9	1.6	28.2	2.3	3.69	-4.16	3.58	7.85		C	x	31	17.07.23	13:56:00	MIRA A	M. Heinz	G. Maric	15.0	0.58	0.12	1.5		y	y	x	y	y	12.2 cm HE projectile (German origin)
ITP-1451		442796.600	5942880.590	533753.7232	80805.7990	-13.8	-13.8	0.0	1.8	0.1	40.66	1.22	8.00	39.44		F		31																n	
ITP-1452		442802.000	5942882.700	533753.7936	80806.0915	-13.8	-14.0	0.2	267.8	21.4	153.44	-173.93	2.31	327.37		B	x	31	13.07.23	11:05:00	HT08	. Scheffl	. Mikuteit	15.0	1.25	0.05	1.0		y	y		y	y	scrap
ITP-1453		442864.210	5942883.950	533753.8585	80809.4771	-16.0	-17.3	1.3	167.3	13.4	43.23	-30.84	3.72	74.07		B		5																n	
ITP-1454		442814.600	5942884.080	533753.8432	80806.7765	-14.3	-14.3	0.0	5.7	0.5	6.69	-3.26	2.33	9.94		E		33																n	
ITP-1455		441919.990	5942884.840	533753.5132	80718.0784	-9.2	-14.1	4.9	232.7	18.6	9.16	-2.60	7.97	11.76		B	x	4	07.10.23	13:32:00	HT08	. Scheffl	. Mikuteit				3.5		y	n		y	y	clear to 3.5m below ground, processing by airlift up to 3.5 m depth, sediment runs after. Probe was flushed down to 4.5 m, full scale display at 30 nT, half scale at 100 nT; object is deeper than 5 m, not recovered.
ITP-1456		442612.200	5942885.590	533753.8123	80755.7579	-12.7	-13.0	0.3	107.7	8.6	67.06	-72.16	2.80	139.22		B	x	31	17.07.23	07:46:00	MIRA A	M. Heinz	G. Maric	13.0	1.00	0.30	0.5		y	y		y	y	scrap
ITP-1457		442734.060	5942885.700	533753.8639	80802.3913	-14.4	-14.7	0.3	72.7	5.8	43.56	-64.34	3.41	107.90		B	x	31	16.07.23	06:32:00	MIRA A	K. Seiffer	O. Pfeil				0.0		y	n		y	y	geology
ITP-1458		442521.250	5942885.740	533753.7813	80750.8070	-12.2	-13.2	1.0	9.4	0.8	5.38	-1.03	4.42	6.41		E		31																n	
ITP-1459		442656.640	5942886.300	533753.8528	80758.1765	-12.9	-13.9	1.0	1461.8	116.9	353.78	-378.46	3.16	732.23		A	x	31	10.06.23	11:26:00	HT08	. Mikuteit	Gebhar	40.0	0.72	0.20	1.1		y	y	x	y	y	22 cm HE shell
ITP-1460		442756.150	5942887.170	533753.9202	80803.5928	-14.5	-15.3	0.8	98.5	7.9	31.08	-34.12	2.81	65.19		B	x	31	13.07.23	09:35:00	HT08	. Scheffl	. Mikuteit	75.0	10.00	0.04	0.5		y	y		y	y	SWR (steel wire rope)
ITP-1461		442059.710	5942887.830	533753.6657	80725.6820	-10.4	-14.4	4.0	139.2	11.1	5.09	-3.79	6.71	8.88		B	x	32	09.08.23	19:18:00	MIRA A	D. Mirjani	A. Franz				2.0	Dredged up to two meter no reading on the DBL.	n	n		y	y	geology
ITP-1462		442799.380	5942888.300	533753.9738	80805.9452	-13.9	-13.9	0.0	7.8	0.6	68.08	0.38	3.33	67.71		E		31																n	
ITP-1463		442531.050	5942888.370	533753.8702	80751.3387	-12.2	-14.2	2.0	33.3	2.7	1.92	-4.57	4.37	6.49		C	x	31	18.07.23	07:55:00	MIRA A	M. Heinz	G. Maric	10.0	0.49	0.10	2.2		y	y	x	y	y	10.5 cm HE projectile (German origin)
ITP-1464		442315.680	5942888.730	533753.7966	80739.6149	-13.0	-13.0	0.0	6.4	0.5	11.48	-9.85	1.71	21.33		E		2																n	
ITP-1465		442789.100	5942889.100	533753.9956	80805.3851	-14.0	-14.4	0.4	62.8	5.0	40.58	-28.18	2.83	68.77		C	x	31	13.07.23	10:15:00	HT08	. Scheffl	. Mikuteit	50.0	1.40	0.10	0.5		y	y		y	y	scrap
ITP-1466		442428.920	5942891.200	533753.9214	80745.7775	-11.8	-13.4	1.6	19.6	1.6	5.16	-1.77	5.55	6.93		C	x	31	19.07.23	08:31:00	MIRA A	M. Heinz	G. Maric				1.5		y	n		y	y	geology
ITP-1467		442773.320	5942891.490	533754.0667	80804.5245	-14.0	-14.0	0.0	46.3	3.7	71.13	-46.16	2.41	117.29		C	x	31	13.07.23	10:05:00	HT08	. Scheffl	. Mikuteit	10.0	1.25	0.05	0.5		y	y		y	y	scrap
ITP-1468		442272.690	5942891.730	533753.8766	80737.2728	-12.4	-13.0	0.6	10.4	0.8	7.79	-1.68	3.06	9.47		D	x	2	24.05.23	22:26:00	MIRA A	C. Richte	G. Maric				1.2		y	n		y	y	boulder
ITP-1469		442705.190	5942892.580	533754.0752	80800.8152	-12.8	-13.9	1.1	17.3	1.4	7.42	-3.81	4.92	11.23		C	x	31	15.07.23	18:37:00	MIRA A	M. Heinz	G. Maric	67.0	0.65	0.60	0.3		y	y	x	y	y	munition box (18 x 3.7cm projectiles)
ITP-1470		442634.370	5942894.150	533754.0980	80756.9591	-12.8	-13.9	1.1	34.6	2.8	12.02	-5.17	2.72	17.19		C	x	31	17.07.23	01:17:00	MIRA A	K. Seiffer	O. Pfeil	1.0	0.30	0.40	1.2		y	y		y	y	scrap
ITP-1471		442508.800	5942894.510	533754.0601	80750.1235	-12.0	-12.2	0.2	13.6	1.1	13.48	-6.35	2.00	19.83		D	x	31	13.07.23	14:45:00	MIRA A	M. Heinz	G. Maric				1.2		y	n		y	y	geology
ITP-1472		442851.960	5942894.530	533754.1960	80808.8033	-16.5	-18.7	2.2	54.9	4.4	10.79	-2.31	5.69	13.10		C		5																n	
ITP-1473		442180.860	5942894.680	533753.9356	80732.2721	-12.4	-13.5	1.1	10.7	0.9	5.98	-1.26	4.56	7.24		D	x	1	25.05.23	16:52:00	MIRA A	F. Reiche	G. Maric				0.5		y	n		y	y	boulder
ITP-1474		442410.810	5942895.380	533754.0495	80744.7889	-11.9	-13.2	1.3	18.9	1.5	5.86	-2.13	3.79	7.99		C	x	31	19.07.23	09:12:00	MIRA A	M. Heinz	G. Maric				1.3		y	n		y	y	geology
ITP-1475		442807.770	5942895.850	533754.2213	80806.3969	-14.3	-14.5	0.2	28.0	2.2	18.79	-20.02	2.88	38.81		C	x	33	30.07.23	17:26:00	MIRA A	F. Reiche	G. Maric	7.0	0.60	0.17	0.0		y	y		y	y	scrap
ITP-1476		442285.820	5942896.410	533754.0332	80737.9844	-12.3	-12.3	0.0	0.7	0.1	11.26	0.02	1.84	11.24		F		2																n	
ITP-1477		442796.670	5942896.730	533754.2454	80805.7921	-14.1	-14.1	0.0	20.9	1.7	36.57	-29.32	1.88	65.89		C	x	31	18.07.23	15:25:00	HT08	. Scheffl	. Mikuteit	10.0	0.80	0.10	0.6		y	y		y	y	scrap
ITP-1478		442007.520	5942897.690	533753.9639	80722.8344	-10.1	-11.5	1.4	8.9	0.7	3.59	-4.18	3.26	7.77		E		32																n	
ITP-1479		442839.920	5942898.650	533754.3246	80808.1451	-16.2	-16.3	0.1	8.8	0.7	9.75	-5.46	2.28	15.21		E		5																n	
ITP-1480		442547.470	5942898.870	533754.2164	80752.2256	-12.5	-13.3	0.8	26.1	2.1	10.99	-4.80	2.55	15.79		C	x	31	17.07.23	20:05:00	MIRA A	K. Seiffer	O. Pfeil	20.0	0.48	0.12	1.2		y	y	x	y	y	12.2 cm HE Projectile (German origin)
ITP-1481		442826.380	5942900.370	533754.3749	80807.4070	-14.5	-14.5	0.0	18.0	1.4	36.29	-3.80	2.28	40.10		C	x	33	24.07.23		MIRA A	M. Heinz	G. Maric	70.0	1.00	0.20	0.0	Cleared and recovered by MIRA A on 02.08.2023. Handed over to the German EOD Authorities (KBD) on 03.08.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb;
ITP-1482		442225.200	5942901.650	533754.1787	80734.6811	-11.8	-12.4	0.6	9.0	0.7	3.70	-3.65	2.80	7.35		E		2																n	
ITP-1483		442709.020	5942902.540	533754.3989	80801.0171	-12.8	-13.4	0.6	88.6	7.1	31.60	-34.71	2.81	66.31		B	x	31	15.07.23	19:18:00	MIRA A	K. Seiffer	O. Pfeil	6.0	3.00	0.03	1.2		y	y		y	y	SWR (steel wire rope)
ITP-1484		442375.710	5942902.910	533754.2792	80742.8732	-12.1	-12.6	0.5	35.9	2.9	15.09	-15.63	2.56	30.72		C	x	31	12.07.23	08:56:00	MIRA A	M. Heinz	G. Maric	12.0	0.41	0.10	0.5	ordnance identified as a 10.5cm fog projectile (empty content)	y	y	x	y	y	10.5 cm fog projectile (German origin)
ITP-1485		442684.560	5942903.000	533754.4042	80759.6853	-12.8	-12.9	0.1	31.3	2.5	32.34	-22.30	2.40	54.64		C	x	31	15.07.23	12:08:00	MIRA A	M. Heinz	G. Maric	2.0	0.45	0.01	0.5		y	y		y	y	metal rod
ITP-1486		442558.720	5942903.420	533754.3681	80752.8349	-12.4	-13.4	1.0	10.1	0.8	5.45	-0.83	3.52	6.28		D	x	31	17.07.23	20:42:00	MIRA A	K. Seiffer	O. Pfeil	2.0	40.00	0.03	1.2		y	y		y	y	scrap
ITP-1487		442512.920	5942903.900	533754.3655	80750.3415	-12.0	-13.6	1.6	37.2	3.0	10.42	-2.51	4.07	12.93		C	x	31	13.07.23	15:41:00	MIRA A	M. Heinz	G. Maric	32.0	0.50	0.50	2.2		y	y		y	y	scrap
ITP-1488		441990.000	5942904.410	533754.1744	80721.8762	-10.2	-11.3	1.1	9.7	0.8	2.35	-3.79	3.79	6.14		E		32																n	
ITP-1489		442779.600	5942904.850	533754.5015	80804.8575	-13.8	-13.8	0.0	4.6	0.4	21.87	-5.39	2.20	27.26		F		31																n	
ITP-1490		442507.220	5942905.500	533754.4150	80750.0302	-11.9	-13.3	1.4	33.4	2.7	12.98	-2.37	5.20	15.35		C	x	31	13.07.23	10:35:00	MIRA A	M. Heinz	G. Maric	1500.0	0.80	0.80	2.5		y	y		y	y	DMA (dead man anchor) & chain remains
ITP-1491		442859.980	5942906.850	533754.5978	80809.2317	-15.3	-15.3	0.0	8.5	0.7	16.41	-15.98	1.97	32.38		E		5																n	
ITP-1492		442665.980	5942908.620	533754.5787	80758.6702	-13.2	-13.6	0.4	51.4	4.1	20.87	-16.51	3.11	37.37		C	x	31	09.06.23	17:49:00	HT08	. Scheffl	. Scheffler				0.5		y	n		y	y	geology
ITP-1493		442630.690	5942908.940	533754.5751	80756.7489	-12.7	-13.9	1.2	152.7	12.2	37.94	-25.74	4.03	63.68		B	x	31	17.07.23		MIRA A	M. Heinz	G. Maric	70.0	1.00	0.20	1.2	23.Handed over to the G	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1494		442845.950	5942909.480	533754.6773	80808.4662	-16.6	-16.8	0.2	108.8	8.7	71.22	-60.39	2.39	131.61		B		5																n	
ITP-1495		442664.430	5942912.130	533754.6916	80758.5835	-13.1	-13.8	0.7	38.2	3.1	21.64	-9.62	3.42	31.26		C	x	31	09.06.23	17:21:00	HT08	. Mikuteit	Gebhar	70.0	1.00	0.20	0.5	23.Handed over to the G	y	y	x	y	y	SD 70 HE German HE aerial bomb

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

total		finsihed	open	
45	Prio1:	45	0	targets piling area
56	Prio 2:	56	0	bearthing zone
393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
47	Prio 3.2:	47	0	barge area
59	Prio 3.3:	59	0	dredge area safety zone
229	Prio 4:	229	0	pipe routes
31	Prio 5:	31	0	outside
>50 kg 43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg 74	Prio 7:	74	0	not dredged survey
>50 kg 72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP No.	SSS Contact No.	UTM zone 32N/ETRS 89 East (mE)	UTM zone 32N/ETRS 89 North (mN)	WGS84 Latitude (deg, min,sec)	WGS84 Longitude (deg, min,sec)	SKN water depth (m)	target depth SKN (m)	model depth b. g. (m)	model weigt (kg)	magn. moment (Am²)	max (nT)	min (nT)	dist max-min (m)	p-p max-min (nT)	ITP notes ST-Project No.	munition category	in/out scope (in=x)	Priotity area	date inspection	time of clearance	vessel	EOD	GEO	weigHT0 (kg)	length (m)	width/ diameter (m)	depth b. ground (m)	TR comment	found (y/n)	salvage (y/n)	UXO (X)	clear (y,n, w)	clear QA (y/n)	inspection results
ITP-1496		442285.660	5942912.660	533754.5589	80737.9648	-12.2	-12.3	0.1	6.0	0.5	9.15	-1.67	4.57	10.81		E		2															n	
ITP-1497		442293.330	5942913.540	533754.5905	80738.3818	-12.7	-12.7	0.0	5.0	0.4	4.85	-5.87	1.89	10.72		E		2															n	
ITP-1498		442768.050	5942913.570	533754.7790	80804.2230	-14.1	-14.1	0.0	9.2	0.7	18.18	-3.86	1.23	22.04		E		31															n	
ITP-1499		442779.020	5942914.020	533754.7979	80804.8199	-13.7	-13.7	0.0	118.7	9.5	101.01	-135.50	1.98	236.51		B	x	31	18.07.23	15:25:00	HT08	. Scheffl	M. Mikute	15.0	0.25	0.60	0.5		y	y		y	y	scrap (tyre)
ITP-1500		442809.770	5942916.290	533754.8835	80806.4923	-14.5	-14.6	0.1	12.7	1.0	10.64	-9.85	2.21	20.49		D	x	33	24.07.23	17:34:00	MIRA A	M. Heinz	G. Maric	27.0	0.45	0.40	0.3		y	y		y	y	scrap
ITP-1501		442199.190	5942916.300	533754.6424	80733.2554	-12.4	-12.7	0.3	6.2	0.5	8.30	-1.47	4.83	9.78		E		31															n	
ITP-1502		442339.870	5942916.550	533754.7063	80740.9132	-12.3	-12.3	0.0	3.7	0.3	13.33	-1.23	2.13	14.56		F		31															n	
ITP-1503		442672.210	5942917.110	533754.8558	80759.0037	-12.9	-12.9	0.0	19.2	1.5	26.38	-13.10	2.09	39.48		C	x	31	15.07.23	12:28:00	MIRA A	M. Heinz	G. Maric	32.0	0.45	0.42	0.2		y	y		y	y	chain links
ITP-1504		442727.680	5942917.750	533754.8984	80802.0227	-13.0	-14.5	1.5	40.8	3.3	8.79	-3.53	4.05	12.32		C	x	31	30.07.23	11:05:00	MIRA A	F. Reiche	G. Maric	3.0	0.56	0.05	1.3		y	y		y	y	scrap
ITP-1505		442660.910	5942920.010	533754.9530	80759.4699	-13.1	-13.8	0.7	85.5	6.8	47.06	-21.14	2.33	68.19		B	x	31	15.07.23	12:49:00	MIRA A	M. Heinz	G. Maric	34.0	0.65	0.50	0.5		y	y		y	y	chain links
ITP-1506		442314.060	5942921.660	533754.8614	80739.5048	-12.5	-12.5	0.0	5.5	0.4	3.74	-11.85	3.11	15.58		E		31															n	
ITP-1507		442193.250	5942921.880	533754.8205	80733.9284	-12.1	-12.6	0.5	63.9	5.1	31.87	-34.59	4.84	66.46		C	x	31	20.07.23	09:51:00	MIRA A	M. Heinz	G. Maric	4.0	0.43	0.12	0.5		y	y		y	y	scrap
ITP-1508		442309.460	5942921.890	533754.8670	80739.2542	-12.2	-12.2	0.0	0.4	0.0	26.08	-7.20	0.82	33.28		F		2															n	
ITP-1509		442512.770	5942922.910	533754.9805	80750.3207	-12.2	-13.2	1.0	12.1	1.0	4.65	-1.77	4.69	6.42		D	x	31	14.07.23	11:29:00	MIRA A	M. Heinz	G. Maric	15.0	0.58	0.12	1.5		y	y	x	y	y	12.2 cm HE projectile (German origin)
ITP-1510		442298.380	5942923.820	533754.9251	80738.6498	-12.7	-12.7	0.0	1.6	0.1	17.25	0.32	2.97	16.93		F		2															n	
ITP-1511		442434.110	5942923.890	533754.9811	80746.0382	-11.6	-11.8	0.2	37.4	3.0	58.16	-3.39	3.39	61.54		C	x	31	13.07.23	10:40:00	MIRA A	M. Heinz	G. Maric	70.0	0.42	0.35	0.5		y	y	x	y	y	munition box (100 x 2 cm FLAK projectiles)
ITP-1512		442785.090	5942925.500	533755.1717	80805.1427	-14.1	-14.1	0.0	6.1	0.5	23.53	-14.34	1.97	37.87		E		31															n	
ITP-1513		442760.950	5942925.570	533755.1645	80803.8286	-13.7	-14.5	0.8	31.0	2.5	9.17	-9.79	3.12	18.96		C	x	31	18.07.23	15:20:00	HT08	. Scheffl	M. Mikute		0.50	0.30	0.2		y	n		y	y	boulder
ITP-1514		442477.290	5942925.830	533755.0610	80748.3874	-11.6	-12.9	1.3	1476.2	118.1	376.45	-235.32	3.16	611.77		A	x	31	19.07.23	02:47:00	MIRA A	D. Mirjani	G. Maric	200.0	20.00	0.06	0.8		y	y		y	y	SWR (steel wire rope)
ITP-1515		442624.780	5942926.050	533755.1264	80756.4159	-12.7	-14.6	1.9	268.4	21.5	35.79	-31.52	4.33	67.31		B	x	31	22.06.23	16:46:00	MIRA A	F. Reiche	G. Maric	180.0	0.57	0.45	1.5		y	y	x	y	y	depth charge - WBD II (German origin)
ITP-1516		442827.510	5942926.330	533755.2153	80807.4513	-16.7	-19.1	2.4	52.1	4.2	12.20	-3.35	8.65	15.56		C		5															n	
ITP-1517		442315.750	5942926.470	533755.0177	80739.5936	-12.8	-12.8	0.0	11.6	0.9	45.15	-79.49	1.49	124.64		D	x	31	31.05.23	10:30:00	MIRA A	M. Kano	G. Maric	6.0	0.38	0.08	0.2		y	y	x	y	y	7.62 cm HE projectile
ITP-1518		442141.390	5942926.780	533754.9585	80730.1021	-11.7	-13.3	1.6	38.4	3.1	14.45	-0.36	6.80	14.82		C	x	32	25.05.23	17:30:00	MIRA A	F. Reiche	G. Maric				1.5		y	n		y	y	boulder
ITP-1519		442796.070	5942927.020	533755.2252	80805.7394	-14.1	-14.3	0.2	91.0	7.3	58.90	-60.60	1.84	119.50		B	x	33	24.07.23	12:19:00	MIRA A	M. Heinz	G. Maric	8.0	0.40	0.10	0.5		y	y	x	y	y	10 cm HE mortar grenate
ITP-1520		442328.990	5942927.030	533755.0411	80740.3139	-12.1	-12.1	0.0	9.6	0.8	93.47	-40.72	1.28	134.19		E		31															n	
ITP-1521		442320.230	5942928.090	533755.0719	80739.8364	-12.9	-13.7	0.8	19.8	1.6	15.79	-3.32	5.74	19.12		C	x	31	31.05.23	10:55:00	MIRA A	M. Kano	G. Maric				0.5		y	n		y	y	boulder
ITP-1522		442270.300	5942929.230	533755.0890	80737.1177	-12.5	-12.5	0.0	5.9	0.5	6.42	-5.71	2.33	12.14		E		2															n	
ITP-1523		442356.890	5942930.410	533755.1615	80741.8304	-12.1	-12.4	0.3	64.7	5.2	28.09	-37.97	2.09	66.06		C	x	31	01.06.23	05:12:00	MIRA A	C. Richte	G. Maric	35.0	1.89	0.05	0.3		y	y		y	y	steel pipe
ITP-1524		442328.910	5942931.980	533755.2012	80740.3062	-12.0	-12.0	0.0	1.3	0.1	39.06	-11.37	0.89	50.43		F		31															n	
ITP-1525		442493.290	5942931.990	533755.2666	80749.2537	-11.8	-13.1	1.3	88.6	7.1	3.67	-25.48	3.42	29.15		B	x	31	05.06.23	08:10:00	MIRA A	M. Kano	G. Maric	11.0	0.55	0.55	0.2		y	y		y	y	tyre
ITP-1526		442747.620	5942933.560	533755.4178	80803.0977	-13.4	-13.8	0.4	54.8	4.4	28.77	-29.41	2.84	58.18		C	x	31	26.06.23	00:24:00	MIRA A	Baehr-A	M. Vulic	2.0	0.20	0.15	0.3		y	y		y	y	boulder
ITP-1527		442693.460	5942933.950	533755.4091	80800.1492	-13.0	-13.0	0.0	38.4	3.1	122.49	-22.66	2.00	145.15		C	x	31	08.06.23	05:30:00	MIRA A	D. Mirjani	A. Franz	60.0	3.00	0.16	0.6		y	y		y	y	steel bar
ITP-1528		442825.710	5942935.190	533755.5012	80807.3475	-16.7	-18.6	1.9	354.6	28.4	47.16	-34.81	3.16	81.97		A		5															n	
ITP-1529a		442353.330	5942935.670	533755.3303	80741.6331	-12.1	-12.1	0.0	30.0	2.4	41.11	-23.41	1.79	64.52		C	x	31	31.05.23	23:52:00	MIRA A	C. Richte	G. Maric	164.0	132.00	0.32	0.0		y	y		y	y	SWR (steel wire rope)
ITP-1529b		442353.330	5942935.620	533755.3286	80741.6331	-12.1	-12.1	0.0	30.0	2.4	41.11	-23.41	1.79	64.52		C	x	31	31.05.23	23:57:00	MIRA A	M. Kano	G. Maric	0.1	0.15	0.06	0.1		y	y	x	y	y	booster charge
ITP-1530		442296.700	5942936.070	533755.3207	80738.5502	-12.5	-12.5	0.0	8.7	0.7	12.29	-3.02	2.00	15.31		E		2															n	
ITP-1531		442819.070	5942936.730	533755.5484	80806.9850	-16.1	-16.6	0.5	40.0	3.2	11.75	-65.63	3.58	77.39		C		5															n	
ITP-1532		442375.640	5942939.620	533755.4669	80742.8449	-11.8	-11.8	0.0	2.9	0.2	10.66	-2.05	3.67	12.71		F		31															n	
ITP-1533		442534.870	5942939.710	533755.5328	80751.5125	-13.3	-15.3	2.0	187.3	15.0	58.29	-3.07	7.11	61.36		B	x	31	28.06.23	14:14:00	MIRA A	F. Reiche	G. Maric	1500.0	1.00	0.70	2.5		y	y		y	y	DMA (dead-man anchor)
ITP-1534		442379.110	5942941.150	533755.5178	80743.0328	-11.8	-12.5	0.7	9.9	0.8	3.81	-3.56	3.44	7.37		E		31															n	
ITP-1535		442405.540	5942942.720	533755.5791	80744.4704	-11.8	-12.0	0.2	27.5	2.2	32.58	-10.10	2.41	42.68		C	x	31	03.06.23	19:47:00	MIRA A	C. Richte	G. Maric	70.0	1.00	0.20	1.5	23.Handed over to the G	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1536		442286.890	5942942.890	533755.5375	80738.0116	-12.2	-12.2	0.0	6.0	0.5	13.76	-5.27	2.24	19.04		E		2															n	
ITP-1537		442734.040	5942943.080	533755.7204	80802.3522	-13.7	-14.1	0.4	24.1	1.9	21.23	-8.87	2.24	30.10		C	x	31	26.06.23	00:54:00	MIRA A	Baehr-A	M. Vulic	55.0	0.45	0.17	0.3		y	y	x	y	y	17 cm HE projectile (German origin)
ITP-1538		442818.670	5942943.450	533755.7657	80806.9588	-16.0	-16.0	0.0	56.5	4.5	116.87	-160.06	1.55	276.92		C	x	5	17.08.23	08:20:00	HT08	. Scheffl	M. Mikute	25.0	4.00	0.05	1.2		y	y		y	y	SWR (steel wire rope)
ITP-1539		442383.970	5942944.230	533755.6194	80743.2953	-11.9	-12.4	0.5	13.5	1.1	2.97	-7.06	2.41	10.03		D	x	31	03.06.23	13:49:00	MIRA A	M. Kano	G. Maric	17.0	3.00	0.03	0.2		y	y		y	y	SWR (steel wire rope)
ITP-1540		442557.810	5942944.540	533755.6982	80752.7581	-12.7	-12.7	0.0	2.1	0.2	5.37	-0.37	4.12	5.73		F		31															n	
ITP-1541		442807.820	5942946.530	533755.8611	80806.3661	-14.7	-15.3	0.6	22.1	1.8	10.49	-7.01	2.28	17.50		C	x	33	30.07.23	11:47:00	MIRA A	F. Reiche	G. Maric	4.0	0.70	0.04	0.5		y	y		y	y	scrap
ITP-1542		442483.510	5942947.380	533755.7607	80748.7117	-11.9	-13.0	1.1	31.4	2.5	9.96	-5.60	3.30	15.56		C	x	31	05.06.23	02:21:00	MIRA A	C. Richte	G. Maric				1.5		y	n		y	y	boulder
ITP-1543		442627.340	5942948.110	533755.8411	80756.5406	-12.1	-12.5	0.4	83.5	6.7	26.30	-51.45	2.41	77.74		B	x	31	07.06.23	23:04:00	MIRA A	D. Mirjani	A. Franz	5.0	1.20	0.05	1.2		y	y		y	y	steel pipe
ITP-1544		442814.000	5942948.760	533755.9357	80806.7010	-15.3	-15.3	0.0	1.9	0.2	27.84	1.92	15.39	25.92		F		5															n	
ITP-1545		442390.390	5942949.500	533755.7924	80743.6412	-11.9	-12.1	0.2	3.7	0.3	3.57	-1.48	2.13	5.05		F		31															n	
ITP-1546		442580.030	5942949.660	533755.8726	80753.9642	-13.2	-15.0	1.8	111.5	8.9	30.44	-4.08	5.00	34.52		B	x	31	25.06.23	06:35:00	MIRA A	Baehr-A	M. Vulic	1500.0	0.90	0.70	1.2		y	y		y	y	concrete block
ITP-1547		442331.860	5942950.040	533755.7867	80740.4548	-12.1	-12.7	0.6	40.9	3.3	44.43	-1.95	3.53	46.38		C	x	31	01.06.23	17:29:00	MIRA A	M. Kano	G. Maric	55.0	1.40	0.12	0.1		y	y	x	y	y	12.8 cm HE projectile (not fired)
ITP-1548		442537.750	5942950.060	533755.8688	80751.6624	-12.5	-12.5	0.0	6.4	0.5	33.51	0.06	2.51	33.46		E		31															n	
ITP-1549		442308.700	5942950.880	533755.8047	80739.1935	-12.6	-12.6	0.0	4.5	0.4	21.74	-5.21	1.89	26.95		F		31															n	
ITP-1550		442518.850	5942952.080	533755.9267	80750.6323	-12.4	-12.5	0.1	11.7	0.9	6.44	-8.21	2.01	14.64		D	x	31	05.06.23	20:10:00	MIRA A	C. Richte	G. Maric				0.1		y	n		y	y	geology
ITP-1551		442813.380	5942952.510	533756.0568	80806.6648	-15.7	-16.1	0.4	29.4	2.4	19.77	-8.61	2.13	28.37		C	x	5	17.08.23	08:47:00	HT08	. Scheffl	M. Mikute	20.0	2.00	0.05	0.8		y	y		y	y	SWR (steel wire rope)
ITP-1552		442688.200	5942953.000	533756.0233	80759.8503	-11.9	-12.1	0.2	49.7	4.0	35.48	-34.02	2.24	69.50		C	x	31	25.06.23	18:34:00	MIRA A	F. Reiche	G. Maric	20.0	0.90	0.15	0.2		y	y		y	y	scrap
ITP-1553		442821.880	5942954.530	533756.1255	80807.1262	-16.4	-17.1	0.7	145.5	11.6	38.74	-56.95	2.43	95.69		B		5															n	
ITP-1554		442536.040	5942955.120	533756.0319	80751.5660	-12.6	-12.9	0.3	13.8	1.1	24.62	1.72	9.58	22.90		D	x	31	06.06.23	09:44:00	MIRA A	M. Kano	G. Maric	207.0	1.05	1.00	0.5		y	y		y	y	scrap
ITP-1555		442295.240	5942956.050	533755.9666	80738.4574	-12.9	-12.9	0.0	2.4	0.2	6.80	-1.23	2.34	8.03		F		31															n	
ITP-1556		442745.580	5942956.260	533756.1514	80802.9716	-14.2	-14.5	0.3	94.4	7.6	63.88	-54.47	2.83	118.35		B	x	31	26.06.23	07:52:00	MIRA A	F. Reiche	G. Maric	51.0	0.45	0.17	0.5		y	y	x	y	y	17 cm HE projectile (German origin)
ITP-1557a		442329.800	5942956.820	533756.0052	80740.3381	-12.0	-12.2	0.2	25.3	2.0	38.28	-5.17	2.80	43.44		C	x	31	01.06.23	12:00:00	MIRA A	M. Kano	G. Maric	54.0	1.05	0.38	1.1		y	y	x	y	y	munition box (3 x 7.62cm full rounds)
ITP-1557b		442331.200	5942956.600	533755.9987	80740.4145	-12.0	-12.2	0.2	25.3	2.0	38.28	-5.17	2.80	43.44		C	x	31	01.06.23	12:08:00	MIRA A	M. Kano	G. Maric	6.0	0.30	0.08	1.1		y	y	x	y	y	7.62 cm HE projectile
ITP-1557c		442331.200	5942956.600	533755.9987	80740.4145	-12.0	-12.2	0.2	25.3	2.0	38.28	-5.17	2.80	43.44		C	x	31	01.06.23	12:08:00	MIRA A	M. Kano	G. Maric	0.4	0.12	0.04	1.1		y	y	x	y	y	3.7 cm SAP projectile
ITP-1558		442529.320	5942958.770	533756.1473	80751.1978	-12.6	-14.8	2.2	391.0	31.3	31.27	-41.33	3.77	72.59		A	x	31	25.06.23	12:05:00	MIRA A	F. Reiche	G. Maric				1.2		y	n		y	y	geology
ITP-1559		442474.670	5942961.110	533756.2014	80748.2213	-12.0	-13.4	1.4	21.0	1.7	4.50	-3.11	4.47	7.61		C	x	31	04.06.23	19:35:00	MIRA A	C. Richte	G. Maric				1.5		y	n		y	y	boulder
ITP-1560		442575.660	5942962.090	533756.2730	80753.7181	-12.8	-14.6	1.8	53.9	4.3	5.03	-6.89	3.77	11.92		C	x	31	24.06.23	23:55:00	MIRA A	Baehr-A	M. Vulic	4.0	1.10	0.45	1.5		y	y		y	y	SWR (steel wire rope)
ITP-1561a		442327.480	5942962.240	533756.1797	80740.2082	-12.3	-12.8	0.5	23.1	1.8	11.54	-12.51	2.61	24.05		C	x	31	01.06.23	18:20:00	MIRA A	M. Kano	G. Maric	6.0	0.30	0.07	0.2		y	y	x	y	y	7.62 cm HE projectile
ITP-1561b		442326.400	5942964.400	533756.2491	80740.1480	-12.2	-12.7	0.5	23.1	1.8	11.54	-12.51	2.61	24.05		C	x	31	01.06.23	18:20:00	MIRA A	M. Kano	G. Maric	0.5	0.12	0.04	0.2		y	y	x	y	y	3.7 cm SAP projectile
ITP-1561c		442326.400	5942964.400	533756.2491	80740.1480	-12.2	-12.7	0.5	23.1	1.8	11.54	-12.51	2.61	24.05		C	x	31	01.06.23	18:20:00	MIRA A	M. Kano	G. Maric	0.5	0.12	0.04	0.2		y	y	x	y	y	3.7 cm SAP projectile
ITP-1561d		442327.480	5942962.240	533756.1797	80740.2082	-12.3	-12.8	0.5	23.1	1.8	11.54	-12.51	2.61	24.05		C	x	31	01.06.23	18:20:00	MIRA A	M. Kano	G. Maric	12.0	0.80	0.14	0.2		y	y	x	y	y	cartridge
ITP-1562		442534.990	5942963.260	533756.2948	80751.5034	-12.9	-13.9	1.0	124.9	10.0	24.97	-42.05	3.82	67.03		B	x	31	25.06.23	12:46:00	MIRA A	F. Reiche	G. Maric	15.0	0.80	0.15	0.5		y	y	x	y	y	3.7 cm Stielgranate 41 (German origin)
ITP-1563a		442287.310	5942964.030	533756.2217	80738.0204	-12.7	-12.7	0.0	10.4	0.8	20.25	-6.23	2.33	26.48		D	x	31	02.06.23	12:57:00	MIRA A	M. Kano	G. Maric	55.0	0.45	0.17	0.6		y	y	x	y	y	17 cm HE projectile (not fused)
ITP-1563b		442289.900	5942962.800	533756.1829	80738.1622	-12.7	-12.7	0.0	10.4	0.8	20.25	-6.23	2.33	26.48		D	x	31	02.06.23	13:02:00	MIRA A	M. Kano	G. Maric	15.0	0.33	0.12	0.0		y	y	x	y	y	12 cm HE projectile (not fused)
ITP-1564		442338.850	5942965.930	533756.3036	80740.8247	-11.9	-13.0	1.1	6375.1	510.0	1677.98	-1140.84	3.42	2818.82		A	x	31	06.06.23	09:30:00	IRA A-HT0	. Scheffler		250.0	2.50	1.30	0.5	Oversized object wet-stored at 442330.6E 5942943.4N; recovered at 06.06.2023 from vessel HT8	y	y		y	y	ground weight
ITP-1565a		442317.920	5942966.040	533756.2988	80739.6853	-12.8	-14.1	1.3	63.6	5.1	17.74	-8.70	3.67	26.44		C	x	31	02.06.23	00:30:00	MIRA A	C. Richte	G. Maric	55.0	1.40	0.12	0.0		y	y	x	y	y	12.8 cm HE projectile (not fired)
ITP-1565b		442319.500	5942967.200	533756.3370	80739.7705	-12.7	-14.0	1.3	63.6	5.1	17.74	-8.70	3.67	26.44		C	x	31	02.06.23	00:35:00	MIRA A	C. Richte	G. Maric	6.0	0.35	0.08	0.2		y	y	x	y	y	7.62 cm HE projectile
ITP-1565c		442315.900	5942965.300	533756.2741	80739.5758	-12.6	-13.9	1.3	63.6	5.1	17.74	-8.70	3.67	26.44		C	x	31	02.06.23	00:40:00	MIRA A	C. Richte	G. Maric	6.0	0.35	0.08	0.2		y	y	x	y	y	7.62 cm HE projectile
ITP-1566		442366.890	5942966.050	533756.3186	80742.3510	-11.9	-12.7	0.8	24.4	2.0	10.97	-4.90	2.23	15.87		C	x	31	03.06.23	07:15:00	MIRA A	M. Kano	G. Maric	55.0	0.48	0.17	0.8		y	y	x	y	y	17 cm HE projectile (not fired)
ITP-1567		442708.140	5942966.380	533756.4641	80800.9268	-12.3	-14.2	1.9	49.7	4.0	10.82	-3.16	4.10	13.98		C	x	31	26.06.23	13:14:00	MIRA A	F. Reiche	G. Maric	43.0	0.35	0.35	0.5		y	y		y	y	boulder
ITP-1568		442283.700	5942969.310	533756.3911	80737.8203	-12.5	-12.5	0.0	9.1	0.7	14.15	-3.44	2.44	17.60		E		31															n	
ITP-1569a		442293.120	5942969.550	533756.4026	80738.3329	-12.5	-13.2	0.7	36.5	2.9	17.01	-13.76	3.41	30.77		C	x	31	02.06.23	05:45:00	MIRA A	C. Richte	G. Maric	15.0	0.33	0.12	0.3		y	y	x	y	y	12 cm HE projectile (not fused)
ITP-1569b		442293.120	5942969.550	533756.4026	80738.3329	-12.5	-13.2	0.7	36.5	2.9	17.01	-13.76	3.41	30.77		C	x	31	02.06.23	05:55:00	MIRA A	C. Richte	G. Maric	15.0	0.33	0.12	0.3		y	y	x	y	y	12 cm HE projectile (not fused)
ITP-1569c		442293.120	5942969.550	533756.4026	80738.3329	-12.5	-13.2	0.7	36.5	2.9	17.01	-13.76	3.41	30.77		C	x	31	02.06.23	06:00:00	MIRA A	C. Richte	G. Maric	6.0	0.28	7.70	0.2		y	y	x	y	y	7 cm HE projectile (not fused)
ITP-1570		442726.400	5942969.610	533756.5758	80801.9187	-14.0	-15.0	1.0	67.4	5.4	31.16	-8.13	3.20	39.29		C	x	31	26.06.23	18:48:00	MIRA A	F. Reiche	G. Maric	25.0	0.45	0.45	1.2		y	y		y	y	scrap
ITP-1571		442658.700	5942970.520	533756.5786	80758.2328	-11.7	-12.9	1.2	36.2	2.9	12.81	-4.36	3.76	17.17		C	x	31	27.06.23	01:55:00	MIRA A	Baehr-A	M. Vulic		1.00	0.75	1.1		y	n		y	y	boulder
ITP-1572		442824.880	5942973.110	533756.7278	80807.2772	-16.7	-17.3	0.6	26.2	2.1	19.15	-5.99	3.35	25.13		C		5															n	

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	weigHT01	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-1573		442768.210	5942973.680	533756.7239	80804.1919	-14.3	-14.4	0.1	5.5	0.4	7.34	-1.95	2.16	9.29		E		33															n	
ITP-1574		442607.570	5942974.740	533756.6949	80755.4467	-12.8	-13.0	0.2	252.7	20.2	151.50	-168.51	2.41	320.00		B	x	31	08.06.23	11:10:00	MIRA A	M. Kano	A. Franz	18.0	1.30	0.10	0.3		y	y		y	y	steel pipes
ITP-1575		442466.610	5942975.130	533756.6518	80747.7732	-11.8	-11.8	0.0	2.8	0.2	12.91	-2.08	3.33	14.99		F		31															n	
ITP-1576		442387.460	5942975.460	533756.6312	80743.4644	-11.8	-13.0	1.2	52.4	4.2	19.87	-8.43	3.68	28.30		C	x	31	04.06.23	07:37:00	MIRA A	M. Kano	G. Maric	70.0	1.09	0.20	1.5	Recovered and cleared by MIRA A on 28.07.2023. Handed over to the German EOD Authorities (KBD) on 28.07.2023.	y	y	x	y	y	SD 70 German aerial bomb
ITP-1577		442675.920	5942975.590	533756.7494	80759.1668	-13.1	-14.8	1.7	22.7	1.8	4.16	-4.10	7.74	8.26		C	x	31	26.06.23	19:43:00	MIRA A	Baehr-A	M. Vulic	55.0	0.55	0.17	0.5		y	y	x	y	y	17 cm HE projectile (German origin)
ITP-1578		442319.560	5942976.020	533756.6224	80739.7679	-12.7	-12.7	0.0	7.2	0.6	12.40	-4.22	2.44	16.61		E		31															n	
ITP-1579		442283.850	5942976.200	533756.6140	80737.8239	-12.8	-12.8	0.0	3.7	0.3	10.28	-3.65	2.34	13.93		F		31															n	
ITP-1580		442415.590	5942977.820	533756.7187	80744.9941	-11.7	-13.3	1.6	41.7	3.3	1.64	-8.15	5.01	9.79		C	x	31	04.06.23	02:14:00	MIRA A	C. Richte	G. Maric				1.5		y	n		y	y	geology
ITP-1581		442345.760	5942978.190	533756.7030	80741.1927	-11.9	-11.9	0.0	9.2	0.7	12.92	-11.21	1.90	24.13		E		31															n	
ITP-1582		442313.110	5942979.390	533756.7289	80739.4145	-12.8	-13.2	0.4	5.7	0.5	5.51	-1.55	4.04	7.06		E		31															n	
ITP-1583		442155.280	5942980.960	533756.7170	80730.8219	-12.5	-13.9	1.4	57.7	4.6	10.54	-8.23	2.97	18.78		C	x	33	20.07.23	15:24:00	MIRA A	M. Heinz	G. Maric	15.0	0.34	0.10	1.2		y	y	x	y	y	10.5 cm HE projectile
ITP-1584		442587.810	5942981.450	533756.9042	80754.3666	-12.8	-13.5	0.7	8.2	0.7	3.75	-3.59	4.29	7.33		E		31															n	
ITP-1585		442244.060	5942985.700	533756.9056	80735.6515	-12.3	-15.0	2.7	135.5	10.8	20.42	-0.95	8.17	21.37		B	x	31	14.06.23	04:52:00	MIRA A	D. Mirjani	A. Franz				0.3		y	n		y	y	geology
ITP-1586		442081.610	5942985.920	533756.8481	80726.8083	-12.9	-14.6	1.7	37.5	3.0	7.71	-3.16	4.81	10.87		C	x	32	20.07.23	16:12:00	MIRA A	M. Heinz	G. Maric				1.5		y	n		y	y	geology
ITP-1587		442650.360	5942986.960	533757.1072	80757.7679	-12.5	-12.6	0.1	18.0	1.4	26.10	-6.96	2.91	33.06		C	x	31	27.06.23	07:52:00	MIRA A	T. Reiche	G. Maric	12.0	0.80	0.50	1.5		y	y		y	y	scrap
ITP-1588		442710.000	5942987.340	533757.1430	80801.0142	-13.7	-13.7	0.0	4.6	0.4	25.01	1.25	2.62	23.75		F		31															n	
ITP-1589		442740.840	5942987.880	533757.1726	80802.6926	-14.2	-16.0	1.8	51.5	4.1	12.72	-4.01	4.07	16.74		C	x	31	24.07.23	23:59:00	MIRA A	D. Mirjani	G. Maric				0.3		y	n		y	y	geology
ITP-1590a		442611.300	5942987.200	533757.0995	80755.6415	-13.0	-13.0	0.0	24.2	1.9	28.96	-53.42	1.84	82.39		C	x	31	08.06.23	11:40:00	MIRA A	M. Kano	A. Franz	3.0	0.30	0.08	0.4		y	y	x	y	y	8 cm mortar
ITP-1590b		442609.600	5942989.500	533757.1733	80755.5474	-13.0	-13.0	0.0	24.2	1.9	28.96	-53.42	1.84	82.39		C	x	31	08.06.23	11:45:00	MIRA A	M. Kano	A. Franz	4.0	0.30	0.08	0.4		y	y	x	y	y	7.5 cm HE shell
ITP-1590c		442611.900	5942989.400	533757.1710	80755.6727	-13.0	-13.0	0.0	24.2	1.9	28.96	-53.42	1.84	82.39		C	x	31	08.06.23	11:50:00	MIRA A	M. Kano	A. Franz	3.5	0.30	0.08	0.4		y	y		y	y	scrap
ITP-1590d		442610.600	5942988.300	533757.1349	80755.6027	-13.1	-13.1	0.0	24.2	1.9	28.96	-53.42	1.84	82.39		C	x	31	08.06.23	17:40:00	MIRA A	M. Kano	A. Franz	4.5	0.25	0.08	0.4		y	y	x	y	y	7.5 cm AP shell
ITP-1591		442184.380	5942989.800	533757.0145	80732.4001	-12.0	-14.3	2.3	44.6	3.6	5.44	-2.08	3.32	7.52		C	x	31	19.06.23	02:15:00	MIRA A	T. Reiche	A. Franz				1.8	Geology; dredged away by airlift	y	n		y	y	geology
ITP-1592		442660.590	5942993.500	533757.3228	80758.3204	-12.4	-12.9	0.5	16.2	1.3	10.36	-6.10	2.97	16.46		C	x	31	27.06.23	20:39:00	MIRA A	Baehr-A	M. Vulic	15.0	0.36	0.10	1.5		y	y	x	y	y	10.5 cm HE shell
ITP-1593		442606.710	5942993.530	533757.3025	80755.3874	-13.1	-13.1	0.0	6.8	0.5	6.80	-9.80	1.86	16.60		E		31															n	
ITP-1594		442547.000	5942994.200	533757.3006	80752.1366	-12.9	-13.6	0.7	14.7	1.2	2.10	-5.68	2.80	7.78		D	x	31	08.06.23	23:17:00	MIRA A	D. Mirjani	A. Franz	5.0	2.00	0.02	0.6		y	y		y	y	SWR (steel wire rope)
ITP-1595		442282.400	5942994.720	533757.2127	80737.7326	-12.4	-13.3	0.9	121.4	9.7	48.88	-30.37	3.40	79.26		B	x	31	14.06.23	23:04:00	MIRA A	D. Mirjani	A. Franz	10.0	5.00	0.05	0.2		y	y		y	y	SWR (steel wire rope)
ITP-1596		442459.050	5942995.020	533757.2924	80747.3484	-11.9	-12.9	1.0	32.3	2.6	9.87	-7.03	3.67	16.90		C	x	31	04.06.23	14:10:00	MIRA A	M. Kano	G. Maric	32.0	0.38	0.30	1.5		y	y	x	y	y	munition box (3 x 8cm HE mortars) (German's origin)
ITP-1597		442320.800	5942995.040	533757.2383	80739.8227	-12.4	-13.6	1.2	14.4	1.2	6.90	-0.53	5.80	7.43		D	x	31	15.06.23	17:15:00	MIRA A	M. Kano	A. Franz	55.0	0.43	0.17	0.7		y	y	x	y	y	17 cm HE shell
ITP-1598		442670.640	5942995.760	533757.3999	80758.8660	-13.3	-14.2	0.9	28.5	2.3	13.17	-6.15	3.86	19.32		C	x	31	28.06.23	02:00:00	MIRA A	Baehr-A	M. Vulic	15.0	0.75	0.30	0.5		y	y		y	y	scrap
ITP-1599		442524.870	5942995.850	533757.3453	80750.9309	-13.0	-15.8	2.8	622.1	49.8	44.84	-38.55	5.97	83.39		A	x	31	11.07.23	20:27:00	MIRA A	K. Seiffer	O. Pfeil	80.0	8.00	0.06	2.5		y	y		y	y	SWR (steel wire rope)
ITP-1600		442309.170	5942997.800	533757.3229	80739.1878	-12.2	-13.0	0.8	51.7	4.1	20.63	-10.49	2.60	31.13		C	x	31	15.06.23	12:20:00	MIRA A	M. Kano	A. Franz	70.0	1.70	0.20	1.1		y	y	x	y	y	12.8 cm HE shell in transport case
ITP-1601		442607.200	5942998.080	533757.4499	80755.4111	-13.1	-13.1	0.0	4.4	0.4	33.92	0.28	12.01	33.65		F		31															n	
ITP-1602		442227.530	5943000.940	533757.3921	80734.7415	-13.2	-13.2	0.0	6.6	0.5	7.50	-6.97	1.79	14.46		E		31															n	
ITP-1603		442692.630	5943006.090	533757.7428	80800.0562	-13.1	-13.1	0.0	33.3	2.7	67.03	-67.50	1.56	134.53		C	x	31	28.06.23	02:45:00	MIRA A	Baehr-A	M. Vulic	15.0	0.36	0.10	0.2		y	y	x	y	y	4.8 inch mortar grenade
ITP-1604		442099.590	5943006.610	533757.5247	80727.7732	-13.4	-13.4	0.0	9.9	0.8	22.55	-6.05	1.87	28.60		E		32															n	
ITP-1605		442243.650	5943007.690	533757.6169	80735.6145	-12.6	-12.6	0.0	4.9	0.4	14.01	-6.11	2.21	20.12		F		31															n	
ITP-1606		442690.160	5943010.080	533757.8709	80759.9191	-13.1	-13.1	0.0	4.7	0.4	11.28	-7.60	2.00	18.88		F		31															n	
ITP-1607a		442294.130	5943010.180	533757.7175	80738.3608	-12.2	-13.2	1.0	33.9	2.7	16.48	-5.61	4.94	22.09		C	x	31	15.06.23	00:50:00	MIRA A	D. Mirjani	A. Franz	45.0	1.45	0.13	1.2		y	y	x	y	y	12.8 cm HE shell
ITP-1607b		442295.300	5943010.800	533757.7381	80738.4241	-12.3	-13.3	1.0	33.9	2.7	16.48	-5.61	4.94	22.09		C	x	31	15.06.23	00:55:00	Mira A	D. Mirjani	A. Franz	4.5	0.22	0.08	1.2		y	y	x	y	y	7.5 cm HE shell
ITP-1608		442053.600	5943016.240	533757.8179	80725.2633	-13.2	-15.2	2.0	23.1	1.8	3.22	-1.97	4.05	5.19		C	x	32	16.08.23	14:09:00	HT08	I. Scheffl	J. Mikuteit				3.3		n	n		y	y	signal deeper 4m below ground
ITP-1609		442663.550	5943018.090	533758.1196	80758.4653	-14.4	-14.9	0.5	13.7	1.1	16.06	-2.96	3.65	19.02		D	x	31	29.06.23	03:22:00	MIRA A	Baehr-A	M. Vulic	70.0	0.80	0.20	0.0	23.Handed over to the G	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1610		442136.620	5943018.490	533757.9238	80729.7810	-13.4	-14.6	1.2	15.5	1.2	3.16	-3.30	3.68	6.46		C	x	32	20.07.23	21:58:00	MIRA A	D. Mirjani	G. Maric	5.0	0.27	0.38	2.2		y	y		y	y	scrap
ITP-1611		442586.340	5943021.620	533758.2033	80754.2599	-13.5	-14.6	1.1	40.5	3.2	8.08	-9.41	3.16	17.49		C	x	31	09.06.23	12:00:00	MIRA A	M. Kano	A. Franz				0.5	small pieces of geology (iron slag) dredged away by airlift	y	n		y	y	iron slag
ITP-1612		442670.260	5943021.650	533758.2374	80758.8282	-14.2	-14.4	0.2	9.2	0.7	14.46	-11.36	3.41	25.82		E		31															n	
ITP-1613		442743.790	5943022.090	533758.2806	80802.8306	-14.8	-15.3	0.5	21.5	1.7	1.18	-16.42	5.64	17.60		C	x	33	24.07.23	05:18:00	MIRA A	D. Mirjani	G. Maric				0.0		y	n		y	y	nothing found
ITP-1614		442650.710	5943022.360	533758.2527	80757.7635	-14.1	-14.3	0.2	132.7	10.6	117.93	-87.11	2.61	205.04		B	x	31	29.06.23	02:55:00	MIRA A	Baehr-A	M. Vulic	60.0	1.00	1.00	0.0		y	y		y	y	tyre
ITP-1615		442591.950	5943022.670	533758.2395	80754.5646	-13.5	-14.5	1.0	43.5	3.5	13.89	-7.59	2.88	21.48		C	x	31	09.06.23	12:00:00	MIRA A	M. Kano	A. Franz				1.2	small pieces of geology (iron slag), dredged away by airlift	y	n		y	y	iron slag
ITP-1616		442084.430	5943023.160	533758.0541	80726.9369	-13.9	-14.6	0.7	36.4	2.9	32.61	-2.50	3.88	35.10		C	x	32	21.07.23	03:28:00	MIRA A	D. Mirjani	G. Maric	15.0	0.24	0.28	1.1		y	y		y	y	scrap
ITP-1617		442038.550	5943023.800	533758.0566	80724.4390	-13.0	-14.3	1.3	103.2	8.3	26.37	-17.44	3.63	43.81		B	x	32	16.08.23	13:37:00	HT08	I. Scheffl	J. Mikutei	10.0	0.25	0.08	3.1		y	y		y	y	scrap
ITP-1618		442323.520	5943024.000	533758.1763	80739.9514	-11.7	-11.9	0.2	11.6	0.9	6.61	-7.58	1.84	14.19		D	x	31	11.06.23	13:10:00	MIRA A	M. Kano	A. Franz	5.5	0.30	0.08	0.4		y	y	x	y	y	7.5 cm HE shell
ITP-1619a		442299.210	5943025.210	533758.2058	80738.6273	-11.3	-12.9	1.6	27.0	2.2	9.20	-0.75	6.01	9.95		C	x	31	15.06.23	18:05:00	MIRA A	M. Kano	A. Franz	3.5	0.22	0.08	1.3		y	y	x	y	y	7.5 cm HE shell
ITP-1619b		442298.200	5943025.900	533758.2278	80738.5718	-11.4	-13.0	1.6	27.0	2.2	9.20	-0.75	6.01	9.95		C	x	31	15.06.23	18:10:00	MIRA A	M. Kano	A. Franz	3.5	0.22	0.08	1.3		y	y	x	y	y	7.5 cm HE shell
ITP-1620		442633.500	5943026.790	533758.3892	80756.8237	-13.7	-14.5	0.8	11.3	0.9	7.08	-1.82	3.91	8.91		D	x	31	29.06.23	09:47:00	MIRA A	T. Reiche	G. Maric	6.0	0.23	0.08	0.8		y	y	x	y	y	7.5 cm HE projectile (Dutsch origin)
ITP-1621		442567.810	5943027.190	533758.3762	80753.2475	-12.8	-12.8	0.0	74.1	5.9	121.29	-194.06	1.70	315.35		B	x	31	09.06.23	00:03:00	MIRA A	D. Mirjani	A. Franz	30.0	6.00	0.02	0.2		y	y		y	y	SWR (steel wire rope)
ITP-1622		442371.820	5943028.020	533758.3256	80742.5780	-11.4	-11.4	0.0	19.0	1.5	26.81	-26.61	1.46	53.41		C	x	31	11.06.23	12:30:00	MIRA A	M. Kano	A. Franz	22.0	0.80	0.60	1.5		y	y		y	y	metal plate
ITP-1623		442744.450	5943028.680	533758.4941	80802.8621	-16.6	-17.7	1.1	26.6	2.1	11.79	-2.74	6.20	14.53		C	x	33	30.07.23	05:00:00	MIRA A	D. Mirjani	G. Maric	70.0	1.00	0.20	0.2	Cleared and recovered by MIRA A on 01.08.2023. Handed over to the German EOD Authorities on 02.08.2023!	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1624		442310.890	5943028.700	533758.3234	80739.2608	-11.4	-12.5	1.1	21.2	1.7	4.02	-4.79	3.42	8.81		C	x	31	16.06.23	00:44:00	MIRA A	D. Mirjani	A. Franz	0.3	0.45	0.01	0.5		y	y		y	y	welding rods
ITP-1625		442724.740	5943030.070	533758.5313	80801.7883	-13.7	-13.7	0.0	30.2	2.4	148.25	-26.05	2.04	174.30		C	x	31	28.06.23	09:27:00	MIRA A	T. Reiche	G. Maric	70.0	0.81	0.20	0.2		y	y	x	y	y	SD 70 German aerial bomb (not fused)
ITP-1626		442723.160	5943034.410	533758.6711	80801.6994	-13.8	-13.8	0.0	9.8	0.8	26.75	0.41	5.45	26.35		E		31															n	
ITP-1627		442671.880	5943034.780	533758.6629	80758.9076	-14.6	-14.6	0.0	5.6	0.5	27.16	-13.15	1.56	40.31		E		33															n	
ITP-1628		442736.670	5943034.860	533758.6910	80802.4345	-15.6	-16.2	0.6	72.3	5.8	15.00	-35.59	3.13	50.59		B	x	33	30.07.23	04:18:00	MIRA A	D. Mirjani	G. Maric	5.0	0.40	0.10	0.5		y	y	x	y	y	10 cm HE mortar grenade
ITP-1629		442447.100	5943034.870	533758.5770	80746.6714	-12.1	-13.9	1.8	1973.6	157.9	592.84	-9.38	11.78	602.23		A	x	31	30.06.23	17:29:00	MIRA A	T. Reiche	G. Maric	180.0	15.00	0.04	0.2		y	y		y	y	SWR (steel wire rope)
ITP-1630		442676.880	5943036.230	533758.7118	80759.1789	-14.5	-14.5	0.0	3.1	0.2	23.60	0.71	4.20	22.89		F		33															n	
ITP-1631		442646.870	5943036.650	533758.7135	80757.5449	-14.2	-15.6	1.4	60.7	4.9	9.13	-10.80	3.54	19.93		C	x	31	23.07.23	23:13:00	MIRA A	D. Mirjani	G. Maric	2.0	0.50	0.05	1.5		y	y		y	y	scrap
ITP-1632		442718.090	5943039.110	533758.8212	80801.4203	-14.1	-14.1	0.0	54.5	4.4	79.07	-51.34	1.70	130.41		C	x	33	24.07.23	11:28:00	MIRA A	M. Heinz	G. Maric	34.0	4.00	0.07	0.5		y	y		y	y	chain
ITP-1633		442035.230	5943039.730	533758.5706	80724.2475	-13.4	-15.4	2.0	449.3	35.9	61.77	-34.29	5.39	96.06		A	x	32	16.08.23	15:00:00	HT08	I. Scheffl	J. Mikutei	25.0	0.70	0.05	2.5		y	y		y	y	scrap
ITP-1634		442078.680	5943040.200	533758.6032	80726.6125	-14.0	-16.2	2.2	248.7	19.9	3.59	-35.58	5.44	39.17		B	x	32	16.08.23	08:20:00	HT08	I. Scheffl	J. Mikutei	75.0	15.00	0.03	2.2	object runs via ITP-1644	y	y		y	y	scrap, steel wire rope
ITP-1635		442700.250	5943040.390	533758.8556	80800.4483	-14.5	-15.1	0.6	32.2	2.6	16.86	-8.33	2.24	25.19		C	x	33	23.07.23	23:35:00	MIRA A	D. Mirjani	G. Maric	10.0	0.33	0.12	0.5		y	y	x	y	y	12 cm HE projectile (Dutch origin)
ITP-1636		442729.980	5943040.470	533758.8699	80802.0666	-14.8	-15.5	0.7	31.9	2.6	14.18	-10.33	3.23	24.51		C	x	33	24.07.23	00:02:00	MIRA A	D. Mirjani	G. Maric				0.0		y	n		y	y	nothing found
ITP-1637		442618.180	5943040.850	533758.8381	80755.9804	-14.0	-14.8	0.8	25.2	2.0	16.99	-2.37	5.42	19.36		C	x	31	29.06.23	16:31:00	MIRA A	T. Reiche	G. Maric	54.0	17.00	0.04	0.1		y	y		y	y	SWR (steel wire rope)
ITP-1638		442599.030	5943041.020	533758.8360	80754.9378	-13.2	-13.2	0.0	5.1	0.4	9.20	-8.38	1.52	17.57		E		31															n	
ITP-1639		442060.690	5943042.280	533758.6633	80725.6318	-14.0	-15.5	1.5	285.0	22.8	58.57	-31.97	4.60	90.54		B	x	32	16.08.23	07:50:00	HT08	I. Scheffl	J. Mikutei	15.0	0.20	0.60	1.5		y	y		y	y	scrap (tyre)
ITP-1640		442113.870	5943045.590	533758.7916	80728.5245	-13.9	-14.4	0.5	17.5	1.4	17.31	-0.40	5.47	17.71		C	x	32	21.07.23	03:58:00	MIRA A	D. Mirjani	G. Maric	3000.0	1.00	1.00	0.0	Magnetic boulder with dimensions 1m x 1m x 1m left in situ.	y	n		y	y	boulder
ITP-1641		442617.680	5943047.090	533759.0398	80755.9490	-13.4	-13.7	0.3	44.1	3.5	34.85	-18.45	2.43	53.30		C	x	31	29.06.23	16:19:00	MIRA A	T. Reiche	G. Maric	54.0	17.00	0.04	0.3		y	y		y	y	SWR (steel wire rope)

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

total		finsihed	open	
45	Prio1:	45	0	targets piling area
56	Prio 2:	56	0	bearthing zone
393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
47	Prio 3.2:	47	0	barge area
59	Prio 3.3:	59	0	dredge area safety zone
229	Prio 4:	229	0	pipe routes
31	Prio 5:	31	0	outside
>50 kg 43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg 74	Prio 7:	74	0	not dredged survey
>50 kg 72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	weigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-1642		442153.890	5943047.340	533758.8641	80730.7018	-13.1	-15.8	2.7	341.6	27.3	15.25	-24.64	4.99	39.89		A	x	32	28.07.23	08:45:00	MIRA A	T. Reiche	G. Maric	6.0	4.00	0.02	2.5		y	y		y	y	SWR (steel wire rope)
ITP-1643		442449.840	5943047.390	533758.9831	80746.8013	-12.2	-16.3	4.1	8311.8	664.9	2.29	-410.87	19.28	413.15		A	x	31	01.07.23	04:59:00	MIRA A	Baehr-A	M. Vulic	120.0	10.00	0.04	0.2		y	y		y	y	SWR (steel wire rope)
ITP-1644		442066.220	5943047.750	533758.8425	80725.9291	-14.1	-16.3	2.2	160.6	12.9	36.06	-6.86	4.80	42.93		B	x	32	16.08.23	08:20:00	HT08	. Scheffl	M. Mikute	75.0	15.00	0.03	2.4	object runs via ITP-1634	y	y		y	y	scrap, steel wire rope
ITP-1645		442612.430	5943049.460	533759.1144	80755.6617	-13.5	-14.0	0.5	25.2	2.0	5.80	-17.89	4.30	23.69		C	x	31	29.06.23	16:10:00	MIRA A	T. Reiche	G. Maric	12.0	0.25	0.16	0.5		y	y		y	y	scrap
ITP-1646		442306.690	5943049.850	533759.0060	80739.0180	-12.0	-12.7	0.7	30.1	2.4	10.22	-9.73	2.61	19.95		C	x	31	12.06.23	13:35:00	MIRA A	M. Kano	A. Franz	35.0	0.60	0.30	1.3		y	y		y	y	tyres 2 x
ITP-1647		442638.040	5943054.160	533759.2766	80757.0527	-13.9	-14.8	0.9	155.6	12.4	91.07	-9.89	3.97	100.95		B	x	31	30.06.23	04:38:00	MIRA A	Baehr-A	M. Vulic	1500.0	0.85	0.60	0.7		y	y		y	y	stone anchor block with chain
ITP-1648		442447.410	5943055.610	533759.2482	80746.6745	-12.4	-13.0	0.6	125.2	10.0	53.50	-59.97	2.55	113.47		B	x	31	01.07.23	05:10:00	MIRA A	Baehr-A	M. Vulic	145.0	12.00	0.04	0.2		y	y		y	y	SWR (steel wire rope)
ITP-1649		442601.420	5943056.870	533759.3498	80755.0574	-13.6	-14.2	0.6	85.0	6.8	36.21	-29.95	2.69	66.16		B	x	31	30.06.23	10:54:00	MIRA A	T. Reiche	G. Maric	12.0	0.80	0.30	0.6		y	y		y	y	scrap
ITP-1650		442352.500	5943057.310	533759.2656	80741.5068	-11.5	-12.5	1.0	39.2	3.1	11.66	-8.16	2.61	19.83		C	x	31	11.06.23	07:45:00	MIRA A	M. Kano	A. Franz	145.0	60.00	0.02	0.5		y	y		y	y	SWR (steel wire rope)
ITP-1651		442543.430	5943057.960	533759.3622	80751.8999	-12.9	-12.9	0.0	11.4	0.9	21.99	-7.78	2.09	29.77		D	x	31	09.06.23	18:30:00	MIRA A	M. Kano	A. Franz	12.0	0.50	0.13	0.5		y	y	x	y	y	12.2 cm HE shell
ITP-1652		442452.110	5943058.570	533759.3458	80746.9283	-12.2	-12.5	0.3	179.6	14.4	146.75	-83.86	2.61	230.61		B	x	31	30.06.23	23:23:00	MIRA A	Baehr-A	M. Vulic	156.0	13.00	0.04	0.2		y	y		y	y	SWR (steel wire rope)
ITP-1653		442268.340	5943058.580	533759.2733	80736.9246	-12.3	-13.8	1.5	30.0	2.4	6.23	-3.71	4.20	9.94		C	x	31	16.06.23	06:07:00	MIRA A	D. Mirjani	A. Franz	12.0	0.50	0.13	0.6		y	y	x	y	y	12.8 cm HE shell
ITP-1654		442283.720	5943060.620	533759.3454	80737.7604	-12.0	-12.4	0.4	15.1	1.2	14.70	-5.48	2.79	20.17		C	x	31	11.06.23	20:19:00	MIRA A	D. Mirjani	A. Franz	100.0	3.50	0.20	1.1		y	y		y	y	scrap
ITP-1655		442204.760	5943061.110	533759.3299	80733.4618	-12.3	-14.0	1.7	41.2	3.3	12.24	-0.77	3.98	13.02		C	x	31	16.06.23	12:17:00	MIRA A	M. Kano	A. Franz				1.5		y	n		y	y	geology
ITP-1656		442451.750	5943061.260	533759.4327	80746.9070	-12.1	-12.5	0.4	263.2	21.1	148.04	-89.44	2.74	237.48		B	x	31	01.07.23	05:34:00	MIRA A	Baehr-A	M. Vulic	156.0	13.00	0.04	0.2	Large boulder left in situ (0.5m x 0.6m x 0.7m)	y	y		y	y	SWR (steel wire rope)/Large boulder left in situ
ITP-1657		442300.180	5943062.590	533759.4156	80738.6551	-11.8	-13.3	1.5	119.3	9.5	33.11	-7.98	3.71	41.09		B	x	31	12.06.23	02:13:00	MIRA A	D. Mirjani	A. Franz	1000.0	1.00	1.00	0.3		y	n		y	y	boulder (left insitu)
ITP-1658		442490.410	5943062.830	533759.4988	80749.0104	-12.4	-12.7	0.3	5.5	0.4	5.41	-1.06	1.89	6.47		E		31															n	
ITP-1659		442452.220	5943067.890	533759.6474	80746.9281	-12.2	-12.8	0.6	710.1	56.8	588.54	-190.28	4.84	778.82		A	x	31	01.07.23	05:50:00	MIRA A	Baehr-A	M. Vulic	72.0	6.00	0.04	0.2		y	y		y	y	SWR (steel wire rope)
ITP-1660		442586.290	5943068.400	533759.7169	80754.2261	-13.3	-13.9	0.6	13.2	1.1	9.77	-1.41	2.28	11.18		D	x	31	04.07.23	21:14:00	MIRA A	Baehr-A	G. Maric	51.0	0.48	0.17	1.1		y	y	x	y	y	17 cm HE projectile (German origin)
ITP-1661		442539.200	5943069.400	533759.7306	80751.6620	-12.9	-12.9	0.0	14.1	1.1	16.31	-28.30	1.41	44.62		D	x	31	09.06.23	18:35:00	MIRA A	M. Kano	A. Franz	5.0	0.40	0.10	0.7		y	y		y	y	scrap
ITP-1662		442324.270	5943071.820	533759.7238	80739.9604	-11.4	-11.6	0.2	6.7	0.5	5.67	-3.53	2.42	9.20		E		31															n	
ITP-1663		442603.980	5943072.440	533759.8546	80755.1864	-13.5	-13.5	0.0	4.2	0.3	11.27	-0.91	2.15	12.19		F		31															n	
ITP-1664		442434.010	5943073.240	533759.8133	80745.9333	-12.0	-13.9	1.9	61.1	4.9	9.66	-5.80	5.83	15.45		C	x	31	01.07.23	12:06:00	MIRA A	T. Reiche	G. Maric	51.0	0.48	0.17	1.3		y	y	x	y	y	17 cm HE projectile (German origin)
ITP-1665		442452.970	5943073.530	533759.8302	80746.9652	-12.2	-12.4	0.2	253.5	20.3	332.34	-95.46	4.43	427.80		B	x	31	01.07.23	11:23:00	MIRA A	T. Reiche	G. Maric	87.0	9.00	0.40	0.2		y	y		y	y	SWR (steel wire rope)
ITP-1666		442568.240	5943076.760	533759.9802	80753.2380	-13.0	-13.3	0.3	131.4	10.5	103.74	-60.55	1.98	164.29		B	x	31	10.06.23	00:35:00	MIRA A	D. Mirjani	A. Franz	10.0	0.90	0.15	0.2		y	y		y	y	steel plate
ITP-1667		442384.730	5943081.670	533800.0665	80743.2450	-11.6	-14.1	2.5	86.5	6.9	7.63	-7.30	4.56	14.92		B	x	31	11.06.23	01:27:00	MIRA A	D. Mirjani	A. Franz	1.0	0.35	0.06	0.5		y	y		y	y	steel plate
ITP-1668a		442593.990	5943085.350	533800.2683	80754.6340	-13.3	-14.9	1.6	25.9	2.1	5.95	-2.19	3.03	8.14		C	x	31	04.07.23	21:46:00	MIRA A	Baehr-A	G. Maric	10.0	0.33	0.12	0.1		y	y	x	y	y	12 cm HE projectile (German origin)
ITP-1668b		442593.200	5943085.100	533800.2599	80754.5912	-13.3	-14.9	1.6	25.9	2.1	5.95	-2.19	3.03	8.14		C	x	31	04.07.23	21:46:00	MIRA A	Baehr-A	G. Maric	6.0	0.35	0.08	0.1		y	y	x	y	y	7.62 cm HE projectile (German origin)
ITP-1669		442436.030	5943086.070	533800.2292	80746.0347	-12.1	-13.6	1.5	407.7	32.6	70.63	-56.30	3.82	126.93		A	x	31	10.06.23	12:20:00	MIRA A	M. Kano	A. Franz	8.0	2.00	0.02	1.2		y	y		y	y	SWR (steel wire rope)
ITP-1670		442297.700	5943086.500	533800.1883	80738.5042	-11.6	-13.5	1.9	37.9	3.0	9.50	-1.79	3.68	11.29		C	x	31	12.06.23	14:35:00	MIRA A	M. Kano	A. Franz	10.0	0.33	0.12	1.5		y	y	x	y	y	12 cm HE shell
ITP-1671		442465.140	5943086.950	533800.2692	80747.6188	-12.6	-13.7	1.1	26.3	2.1	12.11	-2.91	4.65	15.02		C	x	31	02.07.23	00:49:00	MIRA A	Baehr-A	M. Vulic	1600.0	1.40	0.70	1.2		y	y		y	y	boulder
ITP-1672		442457.900	5943087.730	533800.2915	80747.2241	-12.5	-13.3	0.8	114.0	9.1	41.43	-27.42	2.56	68.84		B	x	31	01.07.23	17:59:00	MIRA A	T. Reiche	G. Maric	104.0	1.08	0.22	0.8		y	y	x	y	y	21 cm Aircraft rocket
ITP-1673		442241.390	5943088.240	533800.2222	80735.4377	-12.0	-13.9	1.9	648.4	51.9	108.00	-44.53	4.49	152.52		A	x	31	16.06.23	19:00:00	MIRA A	M. Kano	A. Franz	150.0	50.00	0.02	1.7		y	y		y	y	SWR (steel wire rope)
ITP-1674		442248.800	5943088.660	533800.2387	80735.8408	-12.0	-15.1	3.1	134.0	10.7	0.30	-27.55	15.66	27.85		B	x	31	17.06.23	06:20:00	MIRA A	D. Mirjani	A. Franz	150.0	50.00	0.02	1.7		y	y		y	y	SWR (steel wire rope)
ITP-1675		442697.330	5943088.810	533800.4210	80800.2572	-15.8	-18.3	2.5	132.3	10.6	15.29	-8.24	4.29	23.53		B		5															n	
ITP-1676		442252.360	5943088.870	533800.2469	80736.0344	-12.0	-13.8	1.8	107.5	8.6	15.69	-27.56	5.80	43.25		B	x	31	17.06.23	06:30:00	MIRA A	D. Mirjani	A. Franz	150.0	50.00	0.02	1.7		y	y		y	y	SWR (steel wire rope)
ITP-1677		442270.960	5943090.330	533800.3016	80737.0460	-11.8	-13.0	1.2	154.7	12.4	60.96	-16.27	3.86	77.23		B	x	31	17.06.23	19:30:00	MIRA A	T. Reiche	A. Franz	70.0	10.00	0.10	1.1		y	y		y	y	scrap
ITP-1678		442564.490	5943095.720	533800.5922	80753.0212	-13.5	-14.5	1.0	86.1	6.9	28.66	-16.79	3.42	45.45		B	x	31	05.07.23	03:36:00	MIRA A	Baehr-A	G. Maric	1.0	0.05	0.03	0.5		y	y		y	y	geology
ITP-1679		442219.180	5943095.890	533800.4609	80734.2235	-12.4	-12.9	0.5	14.2	1.1	9.52	-5.74	2.48	15.27		D	x	31	18.06.23	08:30:00	MIRA A	T. Reiche	A. Franz				0.5		y	n		y	y	geology
ITP-1680		442318.430	5943097.060	533800.5382	80739.6256	-11.2	-11.4	0.2	3.4	0.3	4.72	-0.94	6.11	5.66		F		31															n	
ITP-1681		442442.780	5943097.460	533800.6004	80746.3946	-12.3	-13.1	0.8	51.7	4.1	35.22	-4.75	4.00	39.97		C	x	31	02.07.23	06:38:00	MIRA A	T. Reiche	G. Maric	127.0	1.20	0.30	0.7		y	y	x	y	y	30 cm aircraft rocket
ITP-1682		442571.500	5943097.700	533800.6590	80753.4015	-13.6	-13.6	0.0	2.1	0.2	5.91	-8.67	1.17	14.57		F		31															n	
ITP-1683		442526.550	5943099.120	533800.6872	80750.9536	-13.0	-13.1	0.1	87.1	7.0	115.29	-39.23	2.13	154.52		B	x	31	10.06.23	07:05:00	MIRA A	D. Mirjani	A. Franz	70.0	1.00	0.20	0.2	Recovered by MIRA A on 01.02.2023. As-left survey pending. Handed over to the German EOD Authorities (KBD) on 02.08.2023. As-left survey completed on 03.08.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-1684		442225.090	5943100.450	533800.6108	80734.5422	-12.5	-12.9	0.4	17.7	1.4	10.70	-9.79	3.12	20.50		C	x	31	18.06.23	15:00:00	MIRA A	T. Reiche	A. Franz	1500.0	1.10	0.90	1.1		y	y		y	y	anchor stone
ITP-1685		442258.100	5943100.860	533800.6372	80736.3389	-12.0	-12.7	0.7	11.2	0.9	5.60	-4.21	2.78	9.81		D	x	31	18.06.23	07:27:00	MIRA A	T. Reiche	A. Franz	500.0	0.80	0.60	1.1	Geology (boulder); left in situ	y	n		y	y	boulder
ITP-1686		442228.080	5943105.690	533800.7815	80734.7015	-12.2	-14.7	2.5	118.0	9.4	20.77	-0.03	5.49	20.80		B	x	31	18.06.23	20:41:00	MIRA A	T. Reiche	A. Franz				1.5		y	n		y	y	geology
ITP-1687		442535.530	5943107.520	533800.9625	80751.4369	-13.1	-13.1	0.0	4.9	0.4	48.55	-22.47	1.84	71.02		F		31															n	
ITP-1688		442424.210	5943109.330	533800.9771	80745.3758	-12.2	-12.2	0.0	4.5	0.4	5.28	-3.76	1.97	9.03		F		31															n	
ITP-1689		442403.410	5943120.570	533801.3325	80744.2360	-12.0	-13.2	1.2	12.6	1.0	2.76	-2.57	3.73	5.32		D	x	31	10.06.23	18:49:00	MIRA A	M. Kano	A. Franz	2.0	0.50	0.05	1.1		y	y		y	y	scrap
ITP-1690		442516.520	5943122.520	533801.4404	80750.3921	-13.1	-13.6	0.5	31.6	2.5	9.39	-14.88	2.78	24.27		C	x	31	06.07.23	09:18:00	MIRA A	T. Reiche	G. Maric	1.0	0.39	0.04	0.5		y	y		y	y	pipe
ITP-1691		442583.840	5943123.650	533801.5035	80754.0560	-13.7	-13.7	0.0	1.3	0.1	4.85	-2.05	1.61	6.90		F		31															n	
ITP-1692		442305.880	5943124.440	533801.4190	80738.9241	-11.4	-13.4	2.0	149.2	11.9	27.16	-17.30	4.02	44.46		B	x	31	13.06.23	03:19:00	MIRA A	D. Mirjani	A. Franz	2.5	1.60	0.02	2.0		y	y		y	y	SWR (steel wire rope)
ITP-1693		442595.300	5943126.360	533801.5957	80754.6781	-14.1	-14.2	0.1	17.3	1.4	7.47	-14.19	1.86	21.66		C	x	33	25.07.23	05:47:00	MIRA A	D. Mirjani	G. Maric	5.0	0.40	0.40	0.5		y	y		y	y	scrap
ITP-1694		442692.770	5943127.980	533801.6866	80759.9830	-16.3	-16.5	0.2	41.1	3.3	25.75	-28.91	2.56	54.66		C		5															n	
ITP-1695		442422.200	5943128.630	533801.6007	80745.2535	-12.1	-12.3	0.2	191.1	15.3	321.15	-9.61	4.20	330.76		B	x	31	14.06.23	16:20:00	MIRA A	M. Kano	A. Franz	25.0	1.00	0.60	0.5		y	y		y	y	scrap
ITP-1696		442562.230	5943128.740	533801.6597	80752.8763	-13.2	-13.2	0.0	7.8	0.6	16.50	-4.33	1.84	20.83		E		31															n	
ITP-1697		442473.810	5943129.140	533801.6377	80748.0626	-12.2	-13.2	1.0	149.0	11.9	43.95	-35.80	3.68	79.76		B	x	31	03.07.23	01:34:00	MIRA A	Baehr-A	M. Vulic	15.0	1.10	0.06	1.2		y	y		y	y	steel pipe
ITP-1698		442220.210	5943130.150	533801.5698	80734.2567	-12.0	-13.9	1.9	25.2	2.0	6.22	-0.56	6.06	6.79		C	x	31	18.06.23	08:03:00	MIRA A	T. Reiche	A. Franz				1.1		y	n		y	y	iron slag
ITP-1699		442540.350	5943136.370	533801.8979	80751.6801	-13.4	-14.1	0.7	43.5	3.5	11.42	-17.40	3.10	28.82		C	x	31	06.07.23	09:54:00	MIRA A	T. Reiche	G. Maric	1.0	2.00	0.01	0.5		y	y		y	y	SWR (steel wire rope)
ITP-1700		442333.910	5943136.490	533801.8200	80740.4420	-11.0	-12.7	1.7	30.4	2.4	2.58	-5.35	3.22	7.93		C	x	31	23.06.23	05:02:00	MIRA A	Baehr-A	M. Vulic				0.0	object might have been moved by the current	n	n		y	y	nothing found
ITP-1701		442512.050	5943140.990	533802.0362	80750.1364	-13.0	-13.7	0.7	21.8	1.7	7.66	-8.41	3.01	16.07		C	x	31	03.07.23	13:22:00	MIRA A	T. Reiche	G. Maric	12.0	1.20	0.03	0.5	Next to the targetA´s location a boulder of 1.5 x 0.5 x 0.5 identified.	y	y		y	y	scrap
ITP-1702		442398.320	5943141.810	533802.0177	80743.9447	-12.0	-12.5	0.5	28.5	2.3	18.32	-11.51	3.61	29.83		C	x	31	08.07.23	12:06:00	MIRA A	T. Reiche	G. Maric	42.0	1.05	0.20	0.5		y	y		y	y	scrap
ITP-1703		442421.960	5943142.270	533802.0419	80745.2313	-12.4	-14.0	1.6	76.0	6.1	28.12	-0.54	8.78	28.65		B	x	31	08.07.23	06:21:00	MIRA A	Baehr-A	G. Maric	405.0	45.00	0.04	0.0		y	y		y	y	SWR (steel wire rope)
ITP-1704		442473.810	5943144.220	533802.1256	80748.0526	-12.6	-13.1	0.5	75.1	6.0	31.81	-32.62	2.28	64.43		B	x	31	03.07.23	07:04:00	MIRA A	T. Reiche	G. Maric	7.0	0.60	0.30	1.2		y	y		y	y	scrap
ITP-1705		442405.110	5943144.700	533802.1139	80744.3124	-12.1	-12.1	0.0	6.7	0.5	14.81	-3.31	3.24	18.12		E		31															n	
ITP-1706		442394.080	5943148.230	533802.2237	80743.7096	-12.1	-12.1	0.0	2.7	0.2	8.93	-0.85	2.34	9.78		F		31															n	
ITP-1707		442453.480	5943148.630	533802.2602	80746.9430	-12.4	-13.1	0.7	14.2	1.1	6.39	-3.76	2.24	10.15		D	x	31	03.07.23	07:34:00	MIRA A	T. Reiche	G. Maric	12.0	0.90	0.05	1.2		y	y		y	y	pipe
ITP-1708		442426.640	5943150.580	533802.3127	80745.4806	-12.4	-12.4	0.0	12.6	1.0	26.41	-7.50	5.34	33.90		D	x	31	08.07.23	06:40:00	MIRA A	Baehr-A	G. Maric	45.0	5.00	0.04	0.1		y	y		y	y	SWR (steel wire rope)
ITP-1709		442652.260	5943151.140	533802.4199	80757.7624	-15.7	-21.3	5.6	757.9	60.6	8.80	-12.48	8.28	21.29		A		5															n	
ITP-1710		442281.050	5943152.010	533802.3012	80737.5540	-11.6	-13.7	2.1	411.8	32.9	42.94	-38.64	4.00	81.58		A	x	31	19.06.23	09:06:00	MIRA A	T. Reiche	A. Franz	100.0	0.80	0.22	3.1		y	y	x	y	y	22 cm HE shell
ITP-1711		442561.400	5943152.380	533802.4242	80752.8154	-13.5	-13.6	0.1	17.5	1.4	27.74	-8.00	2.60	35.74		C	x	31	06.07.23	10:33:00	MIRA A	T. Reiche	G. Maric	6.0	0.43	0.10	1.1		y	y	x	y	y	10.5 cm HE projectile (not fired)
ITP-1712		442618.470	5943155.630	533802.5519	80755.9200	-15.0	-18.5	3.5	56.2	4.5	3.81	-1.67	6.46	5.48		C		5															n	
ITP-1713		442366.770	5943157.240	533802.5044	80742.2169	-11.9	-12.9	1.0	24.3	1.9	5.62	-6.44	2.43	12.06		C	x	31	23.06.23	05:53:00	MIRA A	Baehr-A	M. Vulic	4.0	1.05	0.15	0.7		y	y		y	y	metal rod/steel debris
ITP-1714		442509.640	5943157.650	533802.5743	80749.9942	-13.0	-13.9	0.9	15.2	1.2	6.95	-2.72	3.16	9.67		C	x	31	03.07.23	14:06:00	MIRA A	T. Reiche	G. Maric	1.0	0.60	0.03	0.7		y	y		y	y	scrap
ITP-1715		442427.330	5943157.670	533802.5423	80745.5134	-12.3	-12.3	0.0	6.9	0.5	12.50	-14.88	1.41	27.38		E		31															n	
ITP-1716		442280.620	5943159.150	533802.5321	80737.5259	-11.2	-12.1	0.9	39.7	3.2	17.59	-20.91	5.22	38.50		C	x	31	19.06.23	15:45:00	MIRA A	T. Reiche	A. Franz	12.0	3.50	0.03	3.5		y	y		y	y	SWR (steel wire rope)
ITP-1717		442489.580	5943159.860	533802.6378	80748.9007	-12.9	-13.3	0.4	13.3	1.1	13.81	-1.90	3.16	15.71		D	x	31	03.07.23	08:11:00	MIRA A	T. Reiche	G. Maric	51.0	0.48	0.17	0.7		y	y	x	y	y	17 cm HE projectile (German origin)

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		**1049**	**0**	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	veigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-1718		442558.330	5943161.800	533802.7278	80752.6420	-14.2	-14.2	0.0	2.0	0.2	3.89	-0.85	2.06	4.73		F		31																n	
ITP-1719		442427.230	5943163.750	533802.7390	80745.5039	-12.2	-13.8	1.6	162.5	13.0	12.50	-31.20	5.22	43.69		B	x	31	06.07.23	22:59:00	MIRA A	Baehr-A	G. Maric	10.0	0.33	12.00	0.3		y	y	x	y	y	12 cm HE projectile (German origin)
ITP-1720		442542.850	5943166.650	533802.8786	80751.7961	-13.6	-13.6	0.0	11.9	1.0	8.18	-11.14	1.97	19.32		D	x	31	06.07.23	16:03:00	MIRA A	T. Reiche	G. Maric	5.0	0.42	0.14	0.1		y	y		y	y	scrap
ITP-1721		442429.230	5943167.640	533802.8657	80745.6102	-12.3	-12.3	0.0	11.0	0.9	61.38	-48.43	2.81	109.80		D	x	31	06.07.23	22:12:00	MIRA A	Baehr-A	G. Maric	36.0	9.00	0.03	0.1		y	y		y	y	SWR (steel wire rope)
ITP-1722		442179.940	5943168.430	533802.7921	80732.0062	-12.2	-14.1	1.9	22.0	1.8	3.90	-1.67	4.47	5.57		C	x	33	22.07.23	23:10:00	MIRA A	D. Mirjanic	G. Maric	51.0	0.48	0.17	1.5		y	y	x	y	y	17 cm HE projectile (German origin)
ITP-1723		442590.840	5943171.580	533803.0531	80753.8609	-15.3	-16.6	1.3	19.0	1.5	5.41	-2.40	3.03	7.81		C	x	33	25.07.23	06:25:00	MIRA A	M. Heinz	G. Maric				1.1		y	n		y	y	geology
ITP-1724		442490.370	5943174.680	533803.1176	80748.9338	-13.0	-13.4	0.4	113.9	9.1	114.42	-13.59	2.47	128.01		B	x	31	04.07.23	02:00:00	MIRA A	Baehr-A	M. Vulic	150.0	1.40	0.65	0.2		y	y		y	y	metal chain
ITP-1725		442431.600	5943175.200	533803.1112	80745.7342	-12.4	-12.4	0.0	5.2	0.4	0.27	-19.71	1.97	19.98		E		31																n	
ITP-1726		442379.360	5943179.300	533803.2232	80742.8876	-12.4	-14.4	2.0	389.6	31.2	13.08	-49.48	4.31	62.56		A	x	31	23.06.23	17:01:00	MIRA A	T. Reiche	G. Maric		0.60	0.60	2.2	Magnetic boulder (0.6m x 0.6m x 0.6m)	y	n		y	y	boulder
ITP-1727		442483.980	5943179.770	533803.2798	80748.5826	-13.0	-14.5	1.5	212.4	17.0	3.15	-46.10	3.01	49.25		B	x	31	03.07.23	20:14:00	MIRA A	Baehr-A	M. Vulic	1800.0	1.00	0.65	0.2		y	y		y	y	DMA (dead-man anchor)
ITP-1728		442431.930	5943183.690	533803.3860	80745.7465	-12.4	-13.1	0.7	48.0	3.8	36.74	-2.30	4.10	39.04		C	x	31	07.07.23	10:14:00	MIRA A	T. Reiche	G. Maric	405.0	45.00	0.04	0.1		y	y		y	y	SWR (steel wire rope)
ITP-1729		442453.280	5943184.270	533803.4132	80746.9083	-12.3	-12.6	0.3	43.5	3.5	37.24	-19.89	2.41	57.14		C	x	31	07.07.23	11:16:00	MIRA A	T. Reiche	G. Maric	4.0	0.60	0.25	0.7		y	y		y	y	scrap
ITP-1730		442520.280	5943186.120	533803.4996	80750.5544	-13.0	-14.3	1.3	34.0	2.7	11.04	-2.74	3.33	13.77		C	x	31	04.07.23	08:33:00	MIRA A	T. Reiche	G. Maric	32.0	5.00	0.04	0.5		y	y		y	y	metal chain
ITP-1731		442478.580	5943187.530	533803.5287	80748.2834	-13.0	-13.0	0.0	17.5	1.4	58.85	-20.11	7.71	78.96		C	x	31	04.07.23	03:01:00	MIRA A	Baehr-A	M. Vulic	80.0	0.70	0.70	0.3		y	y		y	y	scrap
ITP-1732		442433.400	5943189.030	533803.5594	80745.8229	-12.4	-12.4	0.0	19.5	1.6	19.87	-20.62	2.20	40.49		C	x	31	07.07.23	10:06:00	MIRA A	T. Reiche	G. Maric	405.0	45.00	0.04	0.1		y	y		y	y	SWR (steel wire rope)
ITP-1733		442343.210	5943190.550	533803.5728	80740.9122	-11.6	-13.1	1.5	42.2	3.4	8.43	-5.37	3.69	13.80		C	x	31	08.07.23	18:10:00	MIRA A	T. Reiche	G. Maric	102.0	0.80	0.45	2.2		y	y		y	y	scrap
ITP-1734		442432.620	5943193.330	533803.6982	80745.7776	-12.4	-12.4	0.0	6.6	0.5	51.22	-9.34	2.51	60.56		E		31																n	
ITP-1735		442419.060	5943195.540	533803.7643	80745.0380	-12.5	-13.2	0.7	16.6	1.3	5.68	-5.24	1.98	10.93		C	x	31	07.07.23	10:46:00	MIRA A	T. Reiche	G. Maric	6.0	1.00	0.01	1.2		y	y		y	y	metal rod
ITP-1736		442496.710	5943197.400	533803.8552	80749.2638	-13.2	-14.2	1.0	52.0	4.2	15.72	-12.76	3.40	28.48		C	x	31	04.07.23	08:03:00	MIRA A	T. Reiche	G. Maric	2.0	0.50	0.13	0.5		y	y		y	y	scrap
ITP-1737		442602.550	5943198.080	533803.9191	80755.0251	-15.5	-16.4	0.9	109.8	8.8	26.84	-28.25	3.14	55.09		B		5																n	
ITP-1738		442435.890	5943198.960	533803.8784	80745.9514	-11.9	-13.1	1.2	87.3	7.0	32.08	-9.17	3.56	41.25		B	x	31	07.07.23	09:58:00	MIRA A	T. Reiche	G. Maric	405.0	45.00	0.04	0.1		y	y		y	y	SWR (steel wire rope)
ITP-1739		442523.100	5943199.100	533803.9207	80750.6993	-14.1	-14.1	0.0	2.4	0.2	12.04	-2.21	1.98	14.25		F		31																n	
ITP-1740		442363.620	5943202.080	533803.9500	80741.4712	-11.8	-13.3	1.5	183.6	14.7	29.16	-37.01	4.72	66.17		B	x	31	24.06.23	05:07:00	MIRA A	Baehr-A	M. Vulic	35.0	1.00	0.20	0.8		y	y		y	y	metal rod
ITP-1741		442437.030	5943204.420	533804.0588	80746.0103	-11.9	-13.0	1.1	67.5	5.4	11.60	-15.80	2.83	27.40		C	x	31	07.07.23	09:49:00	MIRA A	T. Reiche	G. Maric	405.0	45.00	0.04	0.1		y	y		y	y	SWR (steel wire rope)
ITP-1742		442520.210	5943204.940	533804.1085	80750.5381	-14.1	-14.2	0.1	13.2	1.1	10.37	-9.76	2.33	20.13		D	x	31	04.07.23	08:44:00	MIRA A	T. Reiche	G. Maric	5.0	0.50	0.20	0.2		y	y		y	y	scrap
ITP-1743		442381.150	5943205.640	533804.0761	80742.9675	-12.4	-12.6	0.2	3.2	0.3	4.29	-1.58	3.41	5.87		F		31																n	
ITP-1744		442361.310	5943205.900	533804.0766	80741.8873	-12.0	-13.4	1.4	60.5	4.8	11.91	-9.79	4.08	21.71		C	x	31	24.06.23	05:53:00	MIRA A	Baehr-A	M. Vulic	10.0	0.60	0.15	0.5		y	y		y	y	scrap
ITP-1745		442198.020	5943207.050	533804.0490	80732.9973	-11.3	-15.2	3.9	120.7	9.7	9.59	-2.25	6.40	11.84		B	x	33	23.07.23	05:13:00	MIRA A	D. Mirjanic	G. Maric				3.5		y	n		y	y	geology
ITP-1746		442439.120	5943208.140	533804.1799	80746.1216	-12.1	-13.9	1.8	112.0	9.0	11.48	-22.74	5.21	34.21		B	x	31	07.07.23	16:36:00	MIRA A	T. Reiche	G. Maric	405.0	45.00	0.04	0.1		y	y		y	y	SWR (steel wire rope)
ITP-1747		442350.670	5943209.770	533804.1976	80741.3055	-11.8	-11.9	0.1	19.9	1.6	38.09	-5.75	2.69	43.84		C	x	31	23.06.23	23:23:00	MIRA A	Baehr-A	M. Vulic	60.0	0.60	0.50	0.4		y	y		y	y	scrap
ITP-1748		442442.510	5943212.210	533804.3130	80746.3034	-12.2	-13.2	1.0	71.7	5.7	4.13	-29.13	2.88	33.26		B	x	31	07.07.23	17:02:00	MIRA A	T. Reiche	G. Maric	27.0	0.50	0.40	1.2		y	y		y	y	scrap
ITP-1749		442449.870	5943212.350	533804.3204	80746.7040	-12.6	-12.6	0.0	4.0	0.3	13.88	0.27	6.46	13.61		F		31																n	
ITP-1750		442435.340	5943212.520	533804.3202	80745.9129	-12.1	-12.2	0.1	45.7	3.7	4.56	-52.84	1.84	57.40		C	x	31	08.07.23	05:36:00	MIRA A	T. Reiche	G. Maric	360.0	40.00	0.04	0.3		y	y		y	y	SWR (steel wire rope)
ITP-1751		442440.540	5943216.820	533804.4613	80746.1931	-12.7	-15.1	2.4	376.2	30.1	2.86	-38.28	4.07	41.14		A	x	31	07.07.23	17:38:00	MIRA A	T. Reiche	G. Maric	31.0	4.00	0.04	0.5		y	y		y	y	SWR (steel wire rope)
ITP-1752		442434.670	5943217.670	533804.4865	80745.8730	-12.3	-13.4	1.1	109.6	8.8	30.32	-30.15	4.32	60.47		B	x	31	07.07.23	23:52:00	MIRA A	Baehr-A	G. Maric	360.0	40.00	0.04	0.3		y	y		y	y	SWR (steel wire rope)
ITP-1753		442357.840	5943218.200	533804.4732	80741.6902	-12.1	-12.1	0.0	1.7	0.1	6.56	-1.70	1.40	8.26		F		31																n	
ITP-1754		442450.570	5943220.380	533804.5805	80746.7368	-12.8	-12.8	0.0	5.1	0.4	52.56	0.31	1.53	52.25		E		31																n	
ITP-1755		442524.860	5943220.860	533804.6254	80750.7807	-15.1	-17.0	1.9	1920.1	153.6	304.94	-190.16	3.87	495.10		A	x	33	29.07.23	22:05:00	MIRA A	D. Mirjanic	G. Maric				2.5		y	n		y	y	magnet dredged out by the airlift
ITP-1756		442432.920	5943222.950	533804.6567	80745.7742	-12.5	-12.5	0.0	7.9	0.6	15.83	-12.70	2.51	28.53		E		31																n	
ITP-1757		442438.840	5943225.450	533804.7399	80746.0948	-12.6	-12.7	0.1	89.0	7.1	159.51	-21.66	5.22	181.17		B	x	31	07.07.23	23:39:00	MIRA A	Baehr-A	G. Maric	360.0	40.00	0.04	0.3		y	y		y	y	SWR (steel wire rope)
ITP-1758		442262.040	5943227.090	533804.7229	80736.4690	-10.3	-12.8	2.5	45.1	3.6	2.87	-4.02	4.22	6.89		C	x	31	19.06.23	21:01:00	MIRA A	T. Reiche	A. Franz				2.1		y	y		y	y	geology
ITP-1759		442372.810	5943227.510	533804.7804	80742.4989	-12.2	-12.2	0.0	6.5	0.5	8.91	-8.89	1.56	17.79		E		31																n	
ITP-1760		442337.070	5943233.070	533804.9461	80740.5495	-11.9	-13.3	1.4	66.2	5.3	17.96	-7.96	3.11	25.93		C	x	31	23.06.23	17:51:00	MIRA A	T. Reiche	G. Maric	11.0	0.90	0.17	0.5		y	y		y	y	scrap
ITP-1761		442294.470	5943234.630	533804.9797	80738.2294	-11.2	-14.1	2.9	103.5	8.3	4.87	-6.20	4.80	11.07		B	x	31	20.06.23	03:19:00	MIRA A	T. Reiche	A. Franz	11.0	1.00	0.04	2.5		y	y		y	y	scrap
ITP-1762		442492.500	5943234.700	533805.0604	80749.0098	-13.9	-14.6	0.7	12.3	1.0	9.77	-0.94	4.01	10.71		D	x	31	06.07.23	16:50:00	MIRA A	T. Reiche	G. Maric	51.0	0.48	0.17	0.7		y	y	x	y	y	17 cm HE projectile (German origin)
ITP-1763		442391.340	5943236.330	533805.0731	80743.5017	-12.4	-13.0	0.6	15.6	1.2	11.07	-3.98	2.72	15.06		C	x	31	09.07.23	00:26:00	MIRA A	Baehr-A	G. Maric	2.0	0.50	0.20	0.5		y	y		y	y	scrap
ITP-1764		442497.170	5943241.850	533805.2936	80749.2593	-14.3	-14.4	0.1	6.9	0.6	11.99	0.11	16.10	11.88		E		31																n	
ITP-1765		442347.360	5943243.290	533805.2809	80741.1029	-12.0	-13.0	1.0	36.5	2.9	26.08	0.01	6.80	26.07		C	x	31	22.06.23	10:06:00	MIRA A	T. Reiche	G. Maric	73.0	1.10	0.15	0.3		y	y	x	y	y	10.5 cm HE full round
ITP-1766		442604.170	5943244.720	533805.4287	80755.0823	-15.9	-21.0	5.1	289.0	23.1	5.86	-5.20	7.60	11.07		B		5																n	
ITP-1767		442362.370	5943245.400	533805.3551	80741.9186	-12.2	-13.1	0.9	260.8	20.9	77.55	-72.59	3.20	150.14		B	x	31	22.06.23	05:11:00	MIRA A	Baehr-A	M. Vulic	25.0	0.85	0.50	0.3		y	y		y	y	steel plate
ITP-1768		442380.690	5943246.790	533805.4073	80742.9150	-12.1	-12.1	0.0	4.3	0.3	8.38	-3.03	2.56	11.40		F		31																n	
ITP-1769		442455.710	5943249.540	533805.5260	80746.9972	-13.0	-13.2	0.2	3.5	0.3	5.14	-0.69	3.42	5.83		F		31																n	
ITP-1770		442287.810	5943250.620	533805.4944	80737.8562	-11.0	-13.2	2.2	68.2	5.5	4.47	-7.82	5.06	12.29		C	x	31	20.06.23	08:29:00	MIRA A	T. Reiche	A. Franz				1.9		y	n		y	y	geology
ITP-1771		442470.340	5943252.230	533805.6188	80747.7918	-14.0	-14.0	0.0	1.2	0.1	3.01	-1.48	1.53	4.49		F		31																n	
ITP-1772		442325.840	5943254.660	533805.6402	80739.9238	-11.7	-12.1	0.4	7.3	0.6	6.46	-2.41	2.28	8.87		E		31																n	
ITP-1773		442339.630	5943262.180	533805.8890	80740.6695	-12.1	-13.2	1.1	25.3	2.0	7.85	-5.54	3.85	13.39		C	x	31	21.06.23	04:00:00	MIRA A	Baehr-A	M. Vulic	51.0	0.48	0.17	1.5		y	y	x	y	y	17 cm HE projectile (German origin)
ITP-1774a		442327.100	5943264.730	533805.9665	80739.9857	-11.9	-13.2	1.3	28.1	2.2	4.33	-7.09	4.33	11.42		C	x	31	20.06.23	09:58:00	MIRA A	T. Reiche	A. Franz	3.0	0.50	0.08	1.1		y	y	x	y	y	7.5 cm HE shell
ITP-1774b		442326.700	5943264.200	533805.9492	80739.9642	-11.9	-13.2	1.3	28.1	2.2	4.33	-7.09	4.33	11.42		C	x	31	20.06.23	10:00:00	MIRA A	T. Reiche	A. Franz	0.2	0.10	0.03	1.1		y	y	x	y	y	artillery fuse
ITP-1775		442417.240	5943265.730	533806.0346	80744.8921	-12.4	-12.8	0.4	609.1	48.7	455.42	-244.68	2.72	700.10		A	x	31	08.07.23	23:32:00	MIRA A	Baehr-A	G. Maric	6.0	2.00	0.03	0.0		y	y		y	y	SWR (steel wire rope)
ITP-1776		442414.920	5943272.500	533806.2527	80744.7613	-12.6	-13.1	0.5	18.5	1.5	6.00	-9.64	2.63	15.64		C	x	31	08.07.23	23:50:00	MIRA A	Baehr-A	G. Maric	1.0	0.25	0.03	0.0		y	y		y	y	SWR (steel wire rope)
ITP-1777		442517.130	5943278.480	533806.4866	80750.3215	-15.1	-25.1	10.0	1130.5	90.4	5.35	-4.79	13.32	10.14		A	x	33	03.08.23	09:37:00	MIRA A	T. Reiche	G. Maric				2.0		y	n		y	y	geology
ITP-1778		442322.750	5943279.220	533806.4336	80739.7392	-12.0	-12.4	0.4	5.1	0.4	2.48	-2.41	2.41	4.89		E		31																n	
ITP-1779		442348.540	5943279.590	533806.4558	80741.1429	-12.5	-13.6	1.1	15.8	1.3	6.55	-1.33	3.61	7.88		C	x	31	21.06.23	09:42:00	MIRA A	T. Reiche	G. Maric	32.0	0.38	0.30	0.5		y	y	x	y	y	munition box (3 x 8cm HE mortars) (German's origin)
ITP-1780		442334.200	5943279.980	533806.4627	80740.3620	-12.2	-13.2	1.0	64.4	5.2	17.81	-14.67	3.20	32.47		C	x	31	21.06.23	10:32:00	MIRA A	T. Reiche	G. Maric	68.0	0.81	0.32	0.3		y	y		y	y	scrap
ITP-1781		442327.000	5943286.660	533806.6760	80739.9656	-12.2	-12.2	0.0	4.1	0.3	10.05	-4.03	1.84	14.08		F		31																n	
ITP-1782		442406.000	5943287.000	533806.7183	80744.2660	-13.1	-13.1	0.0	1.7	0.1	2.56	-1.99	2.20	4.55		F		31																n	
ITP-1783		442312.310	5943288.810	533806.7397	80739.1644	-11.9	-14.8	2.9	73.1	5.9	1.86	-5.34	5.56	7.20		B	x	31	20.06.23	09:28:00	MIRA A	T. Reiche	A. Franz				2.5		y	n		y	y	geology
ITP-1784		442376.550	5943291.170	533806.8416	80742.6600	-13.1	-14.7	1.6	136.5	10.9	22.54	-17.79	3.54	40.33		B	x	31	22.06.23	04:16:00	MIRA A	Baehr-A	M. Vulic	5.0	0.65	0.40	1.5		y	y		y	y	scrap
ITP-1785		442425.070	5943291.960	533806.8864	80745.3009	-14.0	-14.6	0.6	204.7	16.4	141.49	-58.08	2.81	199.57		B	x	31	09.07.23	07:00:00	MIRA A	Baehr-A	G. Maric	250.0	12.00	0.20	0.6		y	y		y	y	metal chain
ITP-1786		442385.910	5943295.860	533806.9970	80743.1665	-13.4	-13.4	0.0	4.7	0.4	31.20	0.11	1.23	31.09		F		31																n	
ITP-1787		442403.890	5943297.950	533807.0718	80744.1439	-13.6	-15.1	1.5	53.6	4.3	12.38	-6.78	3.77	19.16		C	x	31	09.07.23		MIRA A	T. Reiche	G. Maric	70.0	0.81	0.20	1.5	Cleared and recovered by MIRA A on 02.08.2023. Handed over to the German EOD Authorities (KBD) on 03.08.2023.	y	y	x	y	y	SD 70 German aerial bomb/ wet stored
ITP-1788		442303.770	5943299.120	533807.0699	80738.6926	-11.7	-13.4	1.7	32.9	2.6	5.52	-3.15	3.79	8.67		C	x	31	20.06.23	09:02:00	MIRA A	T. Reiche	A. Franz				1.7		y	n		y	y	geology
ITP-1789		442340.600	5943299.920	533807.1104	80740.6971	-12.5	-13.1	0.6	9.3	0.7	2.37	-4.19	2.83	6.56		E		31																n	
ITP-1790		442430.730	5943300.660	533807.1701	80745.6032	-14.4	-15.4	1.0	9.0	0.7	3.91	-3.01	3.97	6.92		E		31																n	
ITP-1791		442369.840	5943300.940	533807.1550	80742.2882	-13.7	-14.8	1.1	17.7	1.4	5.69	-3.51	3.26	9.21		C	x	31	21.06.23	22:50:00	MIRA A	Baehr-A	M. Vulic	40.0	0.90	0.45	1.5		y	y		y	y	scrap - Steel wire rope
ITP-1792		442449.190	5943313.020	533807.5773	80746.5999	-14.5	-14.5	0.0	44.6	3.6	46.41	-31.30	2.26	77.71		C	x	31	09.07.23	18:30:00	MIRA A	T. Reiche	G. Maric	5.0	0.40	0.10	1.2		y	y	x	y	y	10 cm mortar grenade
ITP-1793		442392.580	5943313.340	533807.5652	80743.5179	-14.3	-14.8	0.5	4.9	0.4	2.31	-1.60	2.84	3.91		F		31																n	
ITP-1794		442417.300	5943318.030	533807.7268	80744.8605	-14.2	-14.7	0.5	4.8	0.4	4.11	-0.49	3.00	4.60		F		31																n	
ITP-1795		442390.950	5943343.100	533808.5275	80743.4093	-14.2	-17.8	3.6	4953.4	396.3	487.29	-4.66	11.86	491.95		A	x	31	10.07.23	00:48:00	MIRA A	Baehr-A	G. Maric	495.0	55.00	0.04	1.2		y	y		y	y	SWR (steel wire rope)
ITP-1796		442379.760	5943349.560	533808.7320	80742.7958	-14.4	-16.5	2.1	1662.4	133.0	241.40	-140.39	4.32	381.79		A	x	31	10.07.23	00:58:00	MIRA A	Baehr-A	G. Maric	495.0	55.00	0.04	1.2		y	y		y	y	SWR (steel wire rope)
ITP-1797		442323.790	5943350.350	533808.7354	80739.7483	-12.7	-12.7	0.0	1.3	0.1	1.91	-6.34	2.33	8.25		F		31																n	
ITP-1798		442371.030	5943353.250	533808.8480	80742.3181	-14.1	-14.7	0.6	583.9	46.7	163.67	-300.44	2.41	464.10		A	x	31	10.07.23	01:07:00	MIRA A	Baehr-A	G. Maric	495.0	55.00	0.04	0.5		y	y		y	y	SWR (steel wire rope)
ITP-1799		442362.590	5943356.090	533808.9365	80741.8568	-14.0	-15.5	1.5	393.1	31.4	148.23	-96.07	10.72	244.29		A	x	31	10.07.23	01:37:00	MIRA A	Baehr-A	G. Maric	495.0	55.00	0.04	1.2		y	y		y	y	SWR (steel wire rope)
ITP-1800		442357.040	5943358.330	533809.0068	80741.5531	-14.0	-19.4	5.4	5084.1	406.7	0.27	-140.77	15.12	141.04		A	x	31	10.07.23	06:51:00	MIRA A	Baehr-A	G. Maric	495.0	55.00	0.04	0.5		y	y		y	y	SWR (steel wire rope)
ITP-1801		442342.940	5943363.280	533809.1614	80740.7822	-13.3	-18.3	5.0	8382.9	990.6	4.21	-514.78	10.29	518.99		A	x	31	10.07.23	08:00:00	MIRA A	T. Reiche	G. Maric	36.0	4.00	0.04	2.1		y	y		y	y	SWR (steel wire rope)

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP No.	SSS Contact No.	UTM zone 32N/ETRS 89 East (mE)	UTM zone 32N/ETRS 89 North (mN)	WGS84 Latitude (deg, min,sec)	WGS84 Longitude (deg, min,sec)	SKN water depth (m)	target depth SKN (m)	model depth b. g. (m)	model weigt (kg)	magn. moment (Am²)	max (nT)	min (nT)	dist max-min (m)	p-p max-min (nT)	ITP notes ST-Project No.	munition category	in/out scope (in=x)	Priotity area	date inspection	time of clearance	vessel	EOD	GEO	weigHT0 (kg)	length (m)	width/ diameter (m)	depth b. ground (m)	TR comment	found (y/n)	salvage (y/n)	UXO (X)	clear (y,n, w)	clear QA (y/n)	inspection results
ITP-1802		442294.740	5943364.520	533809.1824	80738.1574	-12.5	-13.8	1.3	8.7	0.7	2.06	-1.55	3.98	3.61		E		31											n					
ITP-1803		442441.060	5943377.140	533809.6487	80746.1146	-14.8	-20.6	5.8	784.3	62.7	10.08	-11.08	9.50	21.17		A	x	33	04.08.23	16:34:00	MIRA A	T. Reiche	G. Maric						y	n				geology
ITP-1804		442371.740	5943380.450	533809.7283	80742.3386	-14.4	-17.2	2.8	174.4	14.0	9.55	-13.58	6.80	23.13		B	x	31	29.07.23	10:14:00	MIRA A	T. Reiche	G. Maric	9.0	0.75	0.10	2.2		y	y		y	y	scrap
ITP-1805		442260.860	5943386.320	533809.8822	80737.3872	-12.4	-13.5	1.1	11.6	0.9	3.62	-1.93	2.61	5.55		D	x	31	10.07.23	12:23:00	MIRA A	T. Reiche	G. Maric				1.1		y	n		y	y	geology, dredged away by the airlift
ITP-1806		442272.310	5943392.610	533810.0823	80736.9175	-12.4	-14.4	2.0	80.4	6.4	4.93	-10.04	3.97	14.97		B	x	31	10.07.23	13:22:00	MIRA A	T. Reiche	G. Maric	11.0	0.85	0.40	2.2		y	y		y	y	scrap
ITP-1807		442366.600	5943402.730	533810.4471	80742.0440	-14.4	-17.1	2.7	241.0	19.3	12.94	-17.13	5.10	30.08		B	x	31	29.07.23	03:38:00	MIRA A	D. Mirjani	G. Maric	6.0	1.40	0.05	3.2		y	y		y	y	steel pipe
ITP-1808		442200.360	5943412.170	533810.6866	80732.9875	-10.8	-13.4	2.6	50.4	4.0	2.88	-3.96	5.44	6.85		C	x	33	23.07.23	10:39:00	MIRA A	M. Heinz	G. Maric				2.2		y	n		y	y	geology
ITP-1809		442336.850	5943413.610	533810.7874	80740.4171	-13.9	-15.6	1.7	30.2	2.4	6.77	-2.13	3.42	8.90		C	x	31	28.07.23		MIRA A	D. Mirjani	G. Maric	70.0	0.80	0.20	2.2	Cleared and recovered by MIRA A on 02.08.2023. Handed over to the German EOD Authorities (KBD) on 03.08.2023.	y	y	x	y	y	SD 70 HE German HE aerial bomb; wet stored at 442340.2E, 5943413.8N
ITP-1810		442304.900	5943416.630	533810.8724	80738.6757	-13.4	-13.4	0.0	2.5	0.2	33.34	-4.70	6.21	38.04		F		31															n	
ITP-1811		442294.180	5943416.880	533810.8762	80738.0919	-13.0	-13.0	0.0	9.7	0.8	123.63	-10.09	4.04	133.72		E		31															n	
ITP-1812		442314.290	5943419.750	533810.9771	80739.1848	-13.6	-13.6	0.0	4.6	0.4	49.20	-13.60	6.71	62.80		F		31															n	
ITP-1813		442307.010	5943420.850	533811.0098	80738.7878	-13.6	-14.0	0.4	54.2	4.3	45.20	-13.72	3.44	58.93		C	x	31	10.07.23	13:46:00	MIRA A	T. Reiche	G. Maric	20.0	0.65	0.65	0.3		y	y		y	y	tyre
ITP-1814		442279.460	5943425.430	533811.1470	80737.2849	-12.6	-14.6	2.0	274.3	21.9	30.95	-30.10	4.44	61.05		B	x	31	10.07.23	19:41:00	MIRA A	Baehr-A	G. Maric				1.5		y	n		y	y	small object dredged away by the airlift
ITP-1815		442429.370	5943436.470	533811.5636	80745.4387	-15.7	-16.7	1.0	138.5	11.1	14.95	-49.70	4.18	64.66		B		5															n	
ITP-1816		442230.440	5943436.680	533811.4915	80734.6087	-12.1	-13.2	1.1	24.1	1.9	6.37	-7.97	3.93	14.34		C	x	33	23.07.23	11:15:00	MIRA A	M. Heinz	G. Maric				0.0		n	n		y	y	nothing found
ITP-1817		442269.650	5943441.520	533811.6637	80736.7400	-12.4	-12.4	0.0	11.5	0.9	27.42	-6.49	2.97	33.91		D	x	31	11.07.23	01:24:00	MIRA A	Baehr-A	G. Maric	20.0	0.65	0.65	0.2		y	y		y	y	tyre
ITP-1818		442332.850	5943445.140	533811.8059	80740.1783	-14.2	-18.0	3.8	3679.9	294.4	141.00	-110.98	5.61	251.98		A	x	31	04.08.23	04:11:00	MIRA A	D. Mirjani	G. Maric				2.0		y	n		y	y	object deeper than SKN (dredged 2m below the sediment)
ITP-1819		442237.340	5943451.020	533811.9582	80734.9747	-12.4	-14.6	2.2	800.9	64.1	70.18	-77.57	4.40	147.76		A	x	31	11.07.23	08:36:00	MIRA A	T. Reiche	G. Maric	14.0	1.40	0.25	2.5		y	y		y	y	scrap
ITP-1820		442374.160	5943459.600	533812.2901	80742.4176	-14.8	-19.5	4.7	127.1	10.2	3.24	-2.26	6.91	5.49		B	x	33	04.08.23	09:46:00	MIRA A	T. Reiche	G. Maric				2.0		y	n		y	y	geology
ITP-1821		442283.040	5943459.610	80737.4276	533812.2357	-13.5	-19.2	5.7	477.1	38.2	6.24	-7.41	8.63	13.65		A	x	31	03.08.23	15:35:00	MIRA A	T. Reiche	G. Maric	3.0	0.31	0.08	2.5		y	y	x	y	y	8 cm HE mortar granate
ITP-1822		442210.050	5943460.750	533812.2622	80733.4825	-11.8	-13.1	1.3	126.1	10.1	26.69	-23.14	4.25	49.83		B	x	33	23.07.23	11:42:00	MIRA A	M. Heinz	G. Maric				0.0		n	n		y	y	nothing found
ITP-1823		442293.470	5943461.890	533812.3322	80738.0232	-13.7	-15.1	1.4	147.5	11.8	21.39	-30.36	3.42	51.75		B	x	31	13.07.23	03:18:00	MIRA A	K. Seiffer	O. Pfeil				1.2		y	n		y	y	small object dredged away by the air-lift
ITP-1824		442221.460	5943467.420	533812.4825	80734.0992	-12.4	-13.0	0.6	273.6	21.9	117.71	-94.46	2.32	212.17		B	x	33	23.07.23	17:12:00	MIRA A	M. Heinz	G. Maric	204.0	2.20	0.23	0.5		y	y		y	y	scrap
ITP-1825		442230.800	5943475.980	533812.7632	80734.6020	-12.6	-12.6	0.0	67.3	5.4	57.00	-127.60	3.26	184.60		C	x	33	23.07.23	17:52:00	MIRA A	M. Heinz	G. Maric				0.0		n	n		y	y	nothing found
ITP-1826		442264.030	5943476.620	533812.7971	80736.4106	-13.2	-14.3	1.1	11.6	0.9	1.77	-3.31	3.61	5.08		D	x	31	13.07.23	09:30:00	MIRA A	M. Heinz	G. Maric				0.0		y	n		y	y	geology
ITP-1827		442258.550	5943486.090	533813.1013	80736.1060	-13.3	-14.3	1.0	7.7	0.6	2.14	-1.57	3.42	3.71		E		31															n	
ITP-1828		442345.080	5943504.710	533813.7381	80740.8044	-14.8	-14.8	0.0	3.8	0.3	4.18	-2.33	2.00	6.51		F		33															n	
ITP-1829		442239.690	5943537.640	533814.7617	80735.0447	-13.6	-13.6	0.0	3.6	0.3	13.53	-1.63	1.34	15.16		F		33															n	
ITP-1830		442250.830	5943561.650	533815.5430	80735.6352	-14.1	-14.3	0.2	5.5	0.4	2.86	-4.74	2.16	7.60		E		31															n	
ITP-1831		442419.620	5942546.970	533742.7802	80745.5005	-11.5	-12.8	1.3	8.7	0.7	3.41	-0.30	12.45	3.71		E		32															n	
ITP-1832		442825.910	5942554.820	533743.1945	80807.6099	-12.9	-15.4	2.5	75.7	6.1	13.81	-1.24	5.47	15.05		B		5															n	
ITP-1833		442922.230	5942570.860	533743.7513	80812.8421	-15.1	-15.1	0.0	1.3	0.1	13.04	-2.20	1.84	15.23		F		33															n	
ITP-1834		442791.170	5942590.860	533744.3469	80805.6952	-12.3	-12.5	0.2	7.7	0.6	7.87	-3.72	2.13	11.59		E		33															n	
ITP-1835		442463.560	5942624.690	533745.3122	80747.8405	-14.1	-14.1	0.0	36.3	2.9	60.62	-19.72	2.21	80.34		C	x	31	07.06.23	09:20:00	HT08	. Scheffle		20.0	2.20	0.10	0.4		y	y		y	y	SWR (steel wire rope)
ITP-1836		442097.090	5942605.240	533744.5375	80727.9060	-8.7	-11.1	2.4	62.8	5.0	3.98	-7.77	4.51	11.75		C	x	32	04.08.23	09:40:00	HT08	. Scheffl	. Mikutei	15.0	0.80	0.05	2.9		y	y		y	y	SWR (steel wire rope)
ITP-1837		441819.400	5942162.600	533730.1052	80713.0889	-6.2	-7.6	1.4	14.1	1.1	7.90	-5.80	2.70	13.70		D	x	4	24.10.23	16:18:00	HT08	. K. Orth	. Mikutei	25.0	1.50	0.70	3.2		y	y		y	y	scrap
ITP-1838		441799.200	5942126.000	533728.9129	80712.0142	-6.1	-10.6	4.5	376.8	30.1	12.10	-20.10	6.70	32.10		A	x	4	29.10.23	07:17:00	Susanne A	M. Heinz	. Sobanski				3.5		y	n		y	y	Target dredged to 3.5m depth, signal and target deeper >3.5m
ITP-1839		441774.400	5942110.200	533728.3918	80710.6751	-6.2	-6.4	0.2	7.3	0.6	16.00	-37.90	1.30	54.00		E		4															n	
ITP-1840		441736.300	5942088.900	533727.6874	80708.6158	-5.5	-5.5	0.0	29.3	2.3	427.50	-204.90	1.00	632.40		C	x	4	29.08.23	12:20:00	HT08	. Scheffl	. Mikutei	20.0	0.70	0.50	0.0		y	y		y	y	scrap (anchor with wire)
ITP-1841		441724.300	5942120.100	533728.6920	80707.9417	-5.8	-8.5	2.7	95.3	7.6	32.00	-1.50	7.10	33.50		B	x	4	27.10.23	12:15:00	Susanne A	M. Heinz	. Sobanski				3.5		n	n		y	y	Target dredged to 3.5m depth, no signal found
ITP-1842		441720.700	5942083.500	533727.5064	80707.7704	-5.3	-8.7	3.4	286.6	22.9	31.00	-19.00	4.80	50.10		B	x	4	02.09.23	09:59:00	HT08	. Scheffl	. Mikutei	t			4.0		n	n		y	y	no signal, nothing found
ITP-1843		441719.200	5942215.100	533731.7637	80707.6001	-6.8	-7.7	0.9	15.5	1.2	27.10	-9.30	1.90	36.40		C	x	4	06.10.23	11:22:00	HT08	. Scheffl	. Mikutei	10.0	0.50	0.10	1.5		y	y		y	y	scrap (steel plate)
ITP-1844		441715.200	5942132.100	533729.0766	80707.4383	-5.8	-8.8	3.0	1563.5	125.1	202.40	-129.40	4.00	331.80		A	x	4	27.10.23	12:45:00	HT08	K. Orth	. Mikutei	250.0	2.00	0.80	3.5	Object recovered by HT0108; as-left done by Susanne A	y	y		y	y	buoy (with chain)
ITP-1845		441713.900	5942169.100	533730.2732	80707.3426	-6.2	-6.2	0.0	10.4	0.8	39.40	-162.10	0.80	201.50		D	x	4	04.08.23	10:10:00	HT08	. Scheffl	. Mikutei	2.0	0.18	0.05	0.0		y	y	x	y	y	2 inch mortar Granade, GB
ITP-1846		441703.000	5942159.000	533729.9421	80706.7562	-6.0	-7.0	1.0	212.5	17.0	216.90	-131.00	2.00	347.90		B	x	4	06.10.23	12:30:00	HT08	. Scheffl	. Mikutei	400.0	1.40	1.30	2.3		y	y		y	y	scrap (anchor)
ITP-1847		441626.900	5942051.900	533726.4464	80702.6867	-3.9	-7.8	3.9	330.5	26.4	12.80	-20.90	4.60	33.70		A	x	4	29.10.23	12:49:00	Susanne A	M. Heinz	. Sobans	4.0	3.50	0.01	4.3		y	y		y	y	Steel wire rope
ITP-1848		441602.700	5942091.400	533727.7147	80701.3429	-3.9	-7.5	3.6	107.1	8.6	7.50	-9.20	5.30	16.70		B	x	4	30.10.23	07:50:00	Susanne A	M. Heinz	. Sobanski				4.0		y	n		y	y	Target dredged to 4m depth, small object dredged away
ITP-1849		441596.900	5942354.400	533736.2216	80700.8496	-6.5	-7.5	1.0	21.2	1.7	12.10	-20.70	1.60	32.70		C	x	4	09.08.23	08:00:00	HT08	. Scheffl	. Mikutei	10.0	0.70	0.05	1.6		y	y		y	y	SWR (steel wire rope)
ITP-1850		441587.700	5942350.000	533736.0756	80700.3519	-6.3	-7.8	1.5	18.5	1.5	15.30	-4.50	2.60	19.70		C	x	4	09.08.23	07:16:00	HT08	. Scheffl	. Mikutei	5.0	0.40	0.02	2.1		y	y		y	y	SWR (steel wire rope)
ITP-1851		441583.400	5942339.000	533735.7179	80700.1253	-6.1	-7.3	1.2	17.6	1.4	8.90	-13.40	2.70	22.30		C	x	4	09.08.23	06:51:00	HT08	. Scheffl	. Mikutei	t			2.0		n	n		y	y	nothing found
ITP-1852		441577.900	5942054.000	533726.4946	80700.0185	-2.5	-12.0	9.5	4113.7	329.1	15.10	-27.20	11.70	42.40		A	x	4	31.10.23	QA interpretation		E. Schwab						clear to 3.5m bg based on modelling		n		y	y	target model well below 3.5m, clear to 3.5m below ground
ITP-1853		441569.500	5942357.900	533736.3239	80659.3559	-6.1	-7.3	1.2	12.2	1.0	26.70	-0.90	5.80	27.60		D	x	4	31.10.23	09:35:00	HT08	. Scheffl	. Mikutei	10.0	0.25	0.25	1.9		y	y		y	y	scrap
ITP-1854		441563.900	5942117.400	533728.5403	80659.2137	-3.2	-3.3	0.1	1.7	0.1	8.10	-8.60	1.20	16.60		F																	n	
ITP-1855		441525.500	5942049.500	533726.3280	80657.1697	-0.6	-1.5	0.9	10.3	0.8	18.00	-4.50	2.00	22.50		D	x	4	31.10.23	11:35:00	HT08	. Scheffl	. Mikutei	50.0	0.50	0.50	1.2		y	y	x	y	y	munition box (parts with explosive in wooden box)
ITP-1856		441515.500	5942579.300	533743.4655	80656.2671	-6.9	-9.1	2.2	94.4	7.6	4.50	-24.60	3.40	29.10		B	x	4	31.10.23	08:18:00	HT08	. Scheffl	. Mikutei	15.0	0.15	0.60	3.5		y	y		y	y	scrap (tyre)
ITP-1857		441511.500	5942660.100	533746.0781	80655.9947	-8.7	-10.2	1.5	98.3	7.9	34.00	-46.50	2.90	80.60		B	x	4	31.10.23	14:43:00	HT08	K. Orth	. Mikutei	4.0	1.40	0.02	1.5		y	y		y	y	metal rod
ITP-1858		441497.900	5942406.800	533737.8772	80655.4258	-5.1	-6.7	1.6	46.3	3.7	19.00	-16.50	2.60	35.50		C	x	4	31.10.23	13:02:00	HT08	. Scheffl	. Mikutei	10.0	1.20	0.10	3.2		y	y		y	y	scrap
ITP-1859		441489.200	5942673.500	533746.5027	80654.7718	-8.8	-8.9	0.1	30.5	2.4	155.10	-165.50	1.30	320.60		C	x	4	31.10.23	12:50:00	HT08	. Scheffl	. Mikutei	100.0	0.80	0.60	0.1		y	y		y	y	scrap
ITP-1860		441489.100	5942705.600	533747.5413	80654.7446	-9.6	-11.7	2.1	1130.0	90.4	157.70	-299.10	2.70	456.80		A	x	4	31.10.23	11:36:00	HT08	. Scheffl	. Mikutei	1500.0	1.80	1.00	3.4	recovered on 11.08.2023; chain over Target 1863 as left on 14.08.2023	y	y		y	y	scrap (anchor with chain)
ITP-1861		441483.800	5942269.900	533733.4422	80654.7510	-2.1	-8.2	6.1	1640.7	131.3	32.90	-29.60	7.80	62.50		A	x	4	31.10.23	11:57:00	HT08	. Scheffl	. Mikutei	t			5.0	clear to 5m below ground, borehole survey confirmed depth	n	n		y	y	clear to 5m below ground, object not recovered. Probe flushed up to 5 m. object depth > 5 m. Decision by the client whether the object should be cleared by effort.
ITP-1862		441482.700	5942661.000	533746.0957	80654.4264	-8.9	-10.6	1.7	65.4	5.2	19.00	-26.10	3.90	45.10		C	x	4	31.10.23	12:30:00	HT08	. Scheffl	. Mikutei	15.0	1.00	0.05	3.3		y	y		y	y	SWR (steel wire rope)
ITP-1863		441481.400	5942718.000	533747.9394	80654.3171	-9.4	-10.9	1.5	29.1	2.3	12.10	-11.10	3.80	23.20		C	x	4	31.10.23	11:42:00	HT08	. Scheffl	. Mikutei	2000.0	1.20	1.20	2.6	recovered on 11.08.2023; chain over Target 1860; as left on 14.08.2023	y	y		y	y	scrap (anchor stone with chain)
ITP-1864a		441479.100	5942601.800	533744.1788	80654.2705	-7.3	-7.5	0.2	167.5	13.4	314.80	-881.30	1.30	1196.00		B	x	4	31.10.23	13:30:00	HT08	. Scheffl	. Mikutei	5.0	0.36	0.80	0.8		y	y	x	y	y	8 cm mortar HE, GB
ITP-1864b		441478.300	5942600.200	533744.1082	80654.1987	-7.3	-7.5	0.2	167.5	13.4	314.80	-881.30	1.30	1196.00		B	x	33	31.10.23	13:35:00	HT08	. Scheffl	. Mikutei	5.0	0.28	0.10	0.6		y	y	x	y	y	anti tank bazooka head (German)
ITP-1865		441451.700	5942614.700	533744.5852	80652.7704	-7.2	-7.4	0.2	95.0	7.6	510.10	-234.90	1.30	745.00		B	x	4	31.10.23	06:57:00	HT08	. Scheffl	. Mikutei	50.0	20.00	0.03	0.8		y	y		y	y	scrap, steel wire rope
ITP-1866		441435.900	5942672.900	533746.4618	80651.8710	-8.0	-9.3	1.3	18.8	1.5	11.70	-10.40	3.10	22.10		C	x	4	10.08.23	13:55:00	HT08	. Scheffl	. Mikutei	10.0	1.00	0.10	2.5		y	y		y	y	scrap, steel wire rope
ITP-1867		441431.100	5942697.600	533747.2591	80651.5930	-8.4	-9.7	1.3	175.6	14.0	77.30	-95.20	2.40	172.50		B	x	4	31.10.23	13:20:00	HT08	. Scheffl	. Mikutei	25.0	5.00	0.04	2.0		y	y		y	y	scrap, steel wire rope
ITP-1868		441425.500	5942573.800	533743.2513	80651.3720	-4.8	-5.2	0.4	11.0	0.9	21.30	-16.50	1.80	37.70		D	x	4	31.10.23	17:55:00	HT08	. Scheffl	. Mikutei	5.0	0.70	0.02	1.3		y	y		y	y	scrap (steel wire rope)
ITP-1869		441408.200	5942680.200	533746.6869	80650.3583	-7.2	-7.4	0.2	15.3	1.2	83.40	-35.50	1.20	118.90		C	x	4	31.10.23	13:04:00	HT08	. K. Orth	. Mikutei	4.0	1.20	0.02	0.8		y	y		y	y	SWR (steel wire rope)
ITP-1870		441391.000	5942665.900	533746.2173	80649.4317	-5.9	-7.0	1.1	13.4	1.1	5.30	-12.10	2.40	17.40		D	x	4	31.10.23	13:43:00	HT08	. K. Orth	. Mikutei	2.0	0.30	0.02	2.2		y	y		y	y	scrap (metal bar, SWR)

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	veigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-1871		441390.300	5942621.100	533744.7675	80649.4240	-4.1	-4.9	0.8	19.1	1.5	52.10	-9.40	3.70	61.50		C	x	4	31.10.23	18:25:00	HT08	. Scheffl	. Mikutei				1.8		n	n		y	y	no signal, nothing found
ITP-1872		441250.100	5941814.200	533718.6040	80642.3410	0.5	-1.9	2.4	66.1	5.3	13.00	-10.00	4.20	23.00		C		5															n	
ITP-1873		441175.900	5941773.400	533717.2539	80638.3307	0.7	-0.5	1.2	68.3	5.5	48.10	-43.10	2.40	91.10		C		5															n	
ITP-1874		441155.600	5941829.400	533719.0576	80637.1879	0.7	0.1	0.6	3.6	0.3	10.20	-3.00	1.90	13.20		F																	n	
ITP-1875		441154.600	5942477.700	533740.0327	80636.6922	1.0	-5.6	6.6	507.4	40.6	8.50	-8.20	11.00	16.70		A	x	4	31.10.23	QA interpretation		E. Schwab						clear to 3.5m bg based on modelling		n		y	y	target model well below 3.5m, clear to 3.5m below ground
ITP-1876		441147.100	5941761.800	533716.8669	80636.7713	0.8	0.4	0.4	54.9	4.4	150.20	-147.70	1.30	297.90		C		5															n	
ITP-1877		441147.000	5941766.300	533717.0125	80636.7628	0.8	0.5	0.3	19.7	1.6	101.30	-60.20	2.20	161.60		C		5															n	
ITP-1878		441145.500	5941768.500	533717.0831	80636.6796	0.8	0.0	0.8	76.2	6.1	88.90	-73.00	1.70	161.90		B		5															n	
ITP-1879		441144.700	5941788.800	533717.7396	80636.6223	0.8	0.5	0.3	8.7	0.7	21.00	-25.90	1.50	46.90		E																	n	
ITP-1880		441144.100	5941755.500	533716.6619	80636.6123	0.9	0.6	0.3	28.2	2.3	90.40	-74.40	1.60	164.80		C		5															n	
ITP-1881		441143.700	5941786.100	533717.6518	80636.5697	0.8	0.3	0.5	15.9	1.3	67.50	-4.90	2.60	72.50		C		5															n	
ITP-1882		441142.300	5941754.600	533716.6321	80636.5150	0.9	0.8	0.1	18.4	1.5	55.10	-125.50	1.60	180.50		C		4															n	
ITP-1883		441142.200	5941752.000	533716.5479	80636.5113	0.9	0.9	0.0	13.1	1.1	69.10	-69.60	1.20	138.70		D		4															n	
ITP-1884		441141.700	5941778.700	533717.4116	80636.4659	0.9	0.7	0.2	187.2	15.0	1657.90	-274.10	2.00	1932.10		B		4															n	
ITP-1885		441140.700	5941771.700	533717.1847	80636.4162	0.8	0.6	0.2	1107.9	88.6	8009.40	-1577.70	1.50	9587.10		A		4															n	
ITP-1886		441140.000	5941755.000	533716.6441	80636.3895	1.0	0.8	0.2	41.0	3.3	160.90	-152.30	1.20	313.20		C		4															n	
ITP-1887		441138.800	5941766.300	533717.0092	80636.3165	0.9	0.8	0.1	22.5	1.8	56.30	-173.50	1.30	229.80		C		4															n	
ITP-1888		441138.700	5941775.000	533717.2906	80636.3052	0.9	0.9	0.0	188.5	15.1	3071.90	-716.30	1.50	3788.20		B		4															n	
ITP-1889		441138.600	5941753.000	533716.5788	80636.3147	1.0	1.0	0.0	14.5	1.2	76.80	-75.70	1.00	152.50		D		4															n	
ITP-1890		441137.900	5941755.500	533716.6594	80636.2749	1.0	0.9	0.1	19.5	1.6	88.70	-105.40	1.50	194.10		C		4															n	
ITP-1891		441137.300	5941762.800	533716.8953	80636.2373	1.0	0.4	0.6	183.7	14.7	743.30	-131.60	3.50	874.90		B		4															n	
ITP-1892		441136.000	5941774.400	533717.2701	80636.1586	0.9	0.2	0.7	1067.4	85.4	2697.00	-862.00	2.30	3558.90		A		4															n	
ITP-1893		441136.000	5942142.600	533729.1831	80635.9080	0.8	0.8	0.0	1.6	0.1	7.90	-12.60	1.00	20.50		F		4															n	
ITP-1894		441135.300	5942507.300	533740.9826	80635.6216	1.0	1.0	0.0	10.5	0.8	147.70	-45.80	1.30	193.50		D	x	4	31.08.23	13:25:00	HT08	. Scheffl	. Mikutei	5.0	0.35	0.20	0.4		y	y		y	y	scrap
ITP-1895		441134.600	5941767.400	533717.0431	80636.0872	0.9	0.8	0.1	324.1	25.9	3575.80	-405.30	2.00	3981.10		A		4															n	
ITP-1896		441134.400	5941780.000	533717.4507	80636.0677	0.9	-0.1	1.0	38.6	3.1	22.10	-77.10	3.30	99.20		C		4															n	
ITP-1897		441134.100	5941774.800	533717.2823	80636.0550	0.9	0.2	0.7	642.5	51.4	638.10	-1168.60	1.60	1806.70		A		4															n	
ITP-1898		441134.000	5941765.500	533716.9814	80636.0558	1.0	1.0	0.0	422.3	33.8	5702.30	-840.90	1.70	6543.10		A		4															n	
ITP-1899		441130.800	5941762.100	533716.8701	80635.8840	1.0	0.5	0.5	1019.7	81.6	2367.40	-2032.20	2.20	4399.60		A		4															n	
ITP-1900		441130.600	5941779.100	533717.4200	80635.8616	0.9	0.9	0.0	2.9	0.2	2.10	-62.30	1.30	64.40		F		4															n	
ITP-1901		441130.300	5941771.400	533717.1708	80635.8505	1.0	1.0	0.0	12.0	1.0	97.10	-184.00	0.90	281.00		D		4															n	
ITP-1902		441130.200	5941760.300	533716.8116	80635.8526	1.0	0.7	0.3	1383.7	110.7	6497.70	-2690.70	2.10	9188.50		A		4															n	
ITP-1903		441129.000	5941838.600	533719.3445	80635.7340	0.8	0.6	0.2	9.4	0.7	30.40	-38.00	1.00	68.40		E		4															n	
ITP-1904		441128.100	5941765.400	533716.9757	80635.7348	1.0	1.0	0.0	13.2	1.1	409.70	-327.20	1.00	736.80		D		4															n	
ITP-1905		441128.000	5941763.600	533716.9175	80635.7306	1.0	1.0	0.0	173.3	13.9	6613.70	-774.60	2.20	7388.30		B		4															n	
ITP-1906		441127.800	5941771.100	533717.1600	80635.7146	1.0	0.9	0.1	10.8	0.9	62.90	-59.70	1.50	122.50		D		4															n	
ITP-1907		441127.100	5941768.800	533717.0853	80635.6781	1.0	1.0	0.0	12.6	1.0	216.40	-164.90	1.20	381.30		D		4															n	
ITP-1908		441126.800	5941758.300	533716.7455	80635.6689	1.1	0.4	0.7	1194.5	95.6	2251.20	-1852.30	1.80	4103.50		A		4															n	
ITP-1909		441122.400	5941760.600	533716.8181	80635.4279	1.2	1.0	0.2	58.6	4.7	315.30	-244.80	3.20	560.10		C		4															n	
ITP-1910		441120.500	5941761.500	533716.8465	80635.3239	1.2	1.2	0.0	26.6	2.1	1285.10	-126.20	0.90	1411.30		C		4															n	
ITP-1911		441120.100	5941757.700	533716.7234	80635.3047	1.2	0.5	0.7	64.2	5.1	216.30	-16.60	3.70	232.80		C		4															n	
ITP-1912		441119.600	5941756.100	533716.6714	80635.2786	1.1	0.6	0.5	51.7	4.1	281.00	-5.90	2.00	286.90		C		4															n	
ITP-1913		441117.400	5941753.500	533716.5864	80635.1606	1.2	1.2	0.0	16.5	1.3	130.10	-184.30	2.00	314.50		C		4															n	
ITP-1914		441116.700	5941846.300	533719.5886	80635.0593	0.9	-5.5	6.4	442.8	35.4	13.40	-4.20	10.70	17.70		A		4															n	
ITP-1915		441115.000	5941750.400	533716.4851	80635.0321	1.2	0.3	0.9	152.0	12.2	4.60	-239.80	3.30	244.50		B		4															n	
ITP-1916		441114.800	5942531.200	533741.7475	80634.4895	0.0	-0.6	0.6	8.2	0.7	7.40	-18.30	1.40	25.70		E		4															n	
ITP-1917		441113.400	5941748.500	533716.4230	80634.9463	1.3	1.3	0.0	9.4	0.8	140.60	-15.80	5.50	156.40		E		4															n	
ITP-1918		441113.200	5941882.100	533720.7455	80634.8445	0.7	-0.6	1.3	13.2	1.1	12.20	-4.00	2.30	16.20		D		4															n	
ITP-1919		441110.300	5942520.100	533741.3866	80634.2521	1.0	0.6	0.4	17.4	1.4	41.00	-37.50	1.60	78.50		C	x	4	31.08.23	13:10:00	HT08	. Scheffl	. Mikutei	10.0	1.50	0.02	1.4		y	y		y	y	scrap
ITP-1920		441110.000	5941744.900	533716.3051	80634.7638	1.3	-0.6	1.9	339.1	27.1	2.10	-154.20	8.30	156.40		A		4															n	
ITP-1921		441108.400	5941755.000	533716.6313	80634.6698	1.3	0.8	0.5	216.3	17.3	143.60	-629.70	1.60	773.20		B		4															n	
ITP-1922		441108.000	5941753.200	533716.5729	80634.6493	1.3	0.8	0.5	59.2	4.7	207.20	-102.20	2.00	309.40		C		4															n	
ITP-1923		441107.700	5941742.700	533716.2330	80634.6401	1.4	1.1	0.3	69.0	5.5	497.80	-1.80	3.40	499.60		C		4															n	
ITP-1924		441105.400	5941740.100	533716.1480	80634.5167	1.4	-0.3	1.7	638.9	51.1	2.90	-303.90	13.90	306.90		A		4															n	
ITP-1925		441103.300	5941737.900	533716.0759	80634.4039	1.5	0.9	0.6	13.9	1.1	49.90	-8.90	3.10	58.70		D		4															n	
ITP-1926		441102.300	5941892.400	533721.0743	80634.2443	0.8	0.8	0.0	1.0	0.1	16.00	-4.30	0.90	20.20		F		4															n	
ITP-1927		441100.500	5941736.300	533716.0230	80634.2526	1.5	-0.3	1.8	273.3	21.9	0.80	-131.70	5.10	132.50		B		4															n	
ITP-1928		441097.500	5941734.200	533715.9539	80634.0908	1.5	1.1	0.4	39.9	3.2	252.30	-2.90	3.50	255.20		C		4															n	
ITP-1929		441095.100	5941733.500	533715.9303	80633.9607	1.5	0.5	1.0	38.0	3.0	86.00	-2.20	4.00	88.10		C		4															n	
ITP-1930		441093.100	5942064.400	533726.6356	80633.6264	0.2	-4.7	4.9	129.9	10.4	6.50	-4.70	7.80	11.10		B	x	4	21.08.23	15:56:00	HT08	. Scheffl	. Mikuteit				3.0		n	n		y	y	clear to 3.5m below ground, probe flushed up to 3 m. object depth > 3 m. Sediment is not stable. Modification of procedure (salvage pipe) necessary.
ITP-1931		441092.300	5941731.600	533715.8677	80633.8096	1.5	0.2	1.3	79.1	6.3	3.50	-71.00	4.90	74.50		B		4															n	
ITP-1932		441091.400	5941723.200	533715.5955	80633.7663	0.0	0.0	0.0	8.1	0.6	119.90	-49.80	1.10	169.70		E		4															n	
ITP-1933		441090.800	5941730.700	533715.8379	80633.7286	1.5	1.4	0.1	9.4	0.8	76.50	-34.40	1.40	110.90		E		4															n	
ITP-1934		441087.600	5941729.400	533715.7946	80633.5553	1.5	1.3	0.2	36.6	2.9	170.80	-120.40	1.10	291.20		C		4															n	
ITP-1935		441083.800	5941726.900	533715.7121	80633.3502	1.5	0.4	1.1	29.8	2.4	56.10	-2.60	7.50	58.70		C		4															n	
ITP-1936		441080.200	5941837.300	533719.2826	80633.0791	1.2	1.2	0.0	1.6	0.1	30.40	-18.70	0.80	49.10		F		4															n	
ITP-1937		441079.900	5941725.500	533715.6653	80633.1389	1.6	0.0	1.6	378.5	30.3	2.90	-235.90	10.10	238.90		A		4															n	
ITP-1938		441075.000	5941720.600	533715.5048	80632.8756	1.7	0.9	0.8	295.3	23.6	221.10	-440.90	3.10	662.00		B		4															n	
ITP-1939		441074.700	5941720.900	533715.5143	80632.8591	1.7	1.0	0.7	220.9	17.7	98.30	-350.90	2.80	449.20		B		4															n	
ITP-1940		441072.900	5941719.300	533715.4618	80632.7622	1.7	1.2	0.5	53.5	4.3	221.10	-353.80	2.70	574.90		C		4															n	
ITP-1941		441071.100	5941723.000	533715.5808	80632.6617	1.7	0.3	1.4	171.6	13.7	15.80	-140.00	3.10	155.80		B		4															n	
ITP-1942		441070.100	5941720.200	533715.4898	80632.6092	1.7	1.0	0.7	133.8	10.7	57.50	-274.40	1.60	331.90		B		4															n	
ITP-1943		441063.200	5941710.900	533715.1861	80632.2400	1.8	1.5	0.3	47.6	3.8	132.50	-138.70	1.60	271.20		C		4															n	
ITP-1944		441059.200	5942145.400	533729.2426	80631.7262	0.1	0.0	0.1	47.6	3.8	128.80	-258.60	1.00	387.40		C	x	4	29.08.23	11:29:00	HT08	. Scheffl	. Mikutei	0.1	0.03	0.03	0.5		y	y		y	y	scrap (round magnet)
ITP-1945		441058.300	5942044.100	533725.9647	80631.7463	0.5	0.5	0.0	12.8	1.0	105.30	-86.60	1.00	191.90		D	x	4	19.08.23	10:25:00	HT08	. Scheffl	. Mikutei	10.0	0.80	0.03	0.2		y	y		y	y	scrap
ITP-1946		441045.500	5942047.400	533726.0663	80631.0474	0.7	0.7	0.0	138.6	11.1	1444.00	-877.10	1.00	2321.10		B	x	4	19.08.23	10:15:00	HT08	. Scheffl	. Mikutei	10.0	0.90	0.03	0.5		y	y		y	y	scrap
ITP-1947		441040.200	5941703.400	533714.9342	80630.9935	2.0	2.0	0.0	2.1	0.2	1.30	-17.70	1.40	19.00		F		4															n	
ITP-1948		441032.800	5941757.700	533716.6880	80630.5538	1.8	1.8	0.0	1.4	0.1	13.40	-10.30	0.90	23.70		F		4															n	
ITP-1949		441030.600	5941704.400	533714.9626	80630.4704	2.1	1.5	0.6	663.9	53.1	1014.60	-1105.20	2.40	2119.80		A		4															n	
ITP-1950		441024.800	5942042.700	533725.9058	80629.9240	1.0	0.3	0.7	144.2	11.5	162.20	-230.30	1.50	392.50		B	x	4	21.08.23	16:13:00	HT08	. Scheffl	. Mikutei	15.0	1.40	0.03	1.3		y	y		y	y	scrap
ITP-1951		441023.600	5941711.200	533715.1798	80630.0848	2.1	2.1	0.0	6.4	0.5	36.60	-42.70	1.20	79.30		E		4															n	
ITP-1952		441021.300	5942402.700	533737.5521	80629.4880	0.6	0.6	0.0	15.9	1.3	52.60	-106.50	1.10	159.20		C	x	4	31.08.23	13:25:00	HT08	. Scheffl	. Mikutei	5.0	0.45	0.04	0.3		y	y		y	y	scrap
ITP-1953		441020.700	5941728.600	533715.7416	80629.9151	2.0	1.9	0.1	3.6	0.3	20.10	-20.20	1.20	40.30		F		4															n	
ITP-1954		441019.100	5942045.400	533725.9909	80629.6120	1.0	0.6	0.4	40.2	3.2	100.50	-89.00	1.70	189.50		C	x	4	20.08.23	16:33:00	HT08	. Scheffl	. Mikutei	10.0	1.30	0.02	0.8		y	y		y	y	scrap
ITP-1955		441012.000	5941689.800	533714.4827	80629.4681	2.1	2.1	0.0	2.3	0.2	12.60	-28.30	1.00	40.80		F		4															n	
ITP-1956		441009.900	5942025.400	533725.3401	80629.1249	1.1	0.7	0.4	52.7	4.2	136.20	-121.70	1.60	257.90		C	x	4	21.08.23	15:40:00	HT08	. Scheffl	. Mikutei	10.0	1.50	0.03	1.3		y	y		y	y	scrap
ITP-1957		441006.800	5941730.900	533715.8104	80629.1571	2.1	2.1	0.0	2.0	0.2	16.80	-11.60	1.00	28.50		F		4															n	
ITP-1958		441006.700	5942032.300	533725.5620	80628.9460	1.2	0.5	0.7	270.0	21.6	390.80	-320.20	1.70	711.00		B	x	4	21.08.23	15:56:00	HT08	. Scheffl	. Mikutei	10.0	1.00	0.03	1.7		y	y		y	y	scrap
ITP-1959		441006.500	5941689.400	533714.4675	80629.1691	0.0	0.0	0.0	3.7	0.3	70.70	-42.70	0.60	113.50		F		4															n	
ITP-1960		441003.900	5941702.000	533714.8741	80629.0190	2.2	2.2	0.0	9.9	0.8	175.50	-291.00	0.60	466.50		E		4															n	

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	veigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-1961		441003.500	5941700.400	533714.8222	80628.9983	2.3	2.3	0.0	4.9	0.4	203.50	-51.30	0.80	254.70		F		4															n	
ITP-1962		441000.600	5941717.900	533715.3872	80628.8286	2.1	1.8	0.3	53.6	4.3	313.90	-36.50	1.90	350.50		C		4															n	
ITP-1963		440999.400	5941721.600	533715.5065	80628.7607	2.1	1.8	0.3	18.7	1.5	54.80	-67.20	1.30	122.00		C		4															n	
ITP-1964		440996.700	5941701.000	533714.8389	80628.6278	0.0	-0.3	0.3	27.3	2.2	83.10	-91.80	1.30	174.80		C		4															n	
ITP-1965		440996.100	5942434.000	533738.5546	80628.0950	0.5	-0.1	0.6	6.2	0.5	8.00	-11.60	1.70	19.60		E		4															n	
ITP-1966		440995.700	5942338.300	533735.4581	80628.1386	0.1	-4.2	4.3	72.3	5.8	2.90	-3.90	8.70	6.80		B	x	4	09.11.23	QA Interpretation		E. Schwab						QA clear, target >3.5m bg		n		y	y	QA clear, target >3.5m bg
ITP-1967		440993.500	5941778.700	533717.3515	80628.4007	2.1	1.8	0.3	3.3	0.3	10.90	-9.70	1.20	20.60		F		4															n	
ITP-1968		440993.200	5941716.500	533715.3389	80628.4268	2.1	2.1	0.0	1.7	0.1	29.70	-17.10	1.10	46.80		F		4															n	
ITP-1969		440990.200	5942008.100	533724.7723	80628.0646	1.4	0.8	0.6	5.0	0.4	11.00	-7.50	1.90	18.50		E		4															n	
ITP-1970		440988.100	5941722.500	533715.5310	80628.1452	2.2	2.2	0.0	7.8	0.6	235.50	-193.90	0.60	429.40		E		4															n	
ITP-1971		440985.400	5941726.900	533715.6723	80627.9952	2.3	2.3	0.0	0.9	0.1	25.80	-45.30	0.60	71.10		F		4															n	
ITP-1972		440984.500	5941730.300	533715.7819	80627.9439	2.4	2.4	0.0	3.2	0.3	87.20	-18.40	0.80	105.50		F		4															n	
ITP-1973		440984.200	5942000.800	533724.5337	80627.7430	1.5	1.4	0.1	1.9	0.2	1.70	-12.40	1.60	14.10		F		4															n	
ITP-1974		440981.800	5941759.700	533716.7320	80627.7769	2.1	1.4	0.7	15.8	1.3	43.80	-12.50	2.00	56.30		C		4															n	
ITP-1975		440979.700	5941761.500	533716.7894	80627.6614	2.1	1.8	0.3	7.8	0.6	40.90	-14.20	2.00	55.00		E		4															n	
ITP-1976		440979.300	5941992.800	533724.2729	80627.4818	1.6	0.5	1.1	71.0	5.7	65.10	-59.10	4.30	124.30		B	x	4	20.08.23	15:25:00	HT08	. Scheffl	Mikute	10.0	0.95	0.03	1.3		y	y		y	y	scrap
ITP-1977		440978.400	5942000.100	533724.5087	80627.4278	1.5	0.6	0.9	83.4	6.7	70.80	-88.30	1.80	159.10		B	x	4	20.08.23	16:01:00	HT08	. Scheffl	Mikute	12.0	1.50	0.03	1.0		y	y		y	y	scrap
ITP-1978		440977.200	5942396.500	533737.3336	80627.0919	0.5	0.3	0.2	5.3	0.4	13.20	-32.20	1.40	45.40		E		4															n	
ITP-1979		440976.100	5941995.400	533724.3557	80627.3059	1.6	0.9	0.7	39.4	3.2	33.90	-64.70	1.80	98.70		C	x	4	20.08.23	16:45:00	HT08	. Scheffl	Mikute	10.0	1.05	0.02	1.2		y	y		y	y	scrap
ITP-1980		440973.300	5941771.100	533717.0974	80627.3066	2.1	2.1	0.0	16.4	1.3	165.00	-184.30	0.80	349.30		C		4															n	
ITP-1981		440972.000	5941759.700	533716.7281	80627.2436	2.1	2.1	0.0	3.5	0.3	19.50	-23.70	1.00	43.20		F		4															n	
ITP-1982		440969.300	5941989.500	533724.1621	80626.9398	1.7	0.7	1.0	61.8	4.9	111.00	-8.40	2.80	119.40		C	x	4	20.08.23	15:08:00	HT08	. Scheffl	Mikute	10.0	0.85	0.05	1.6		y	y		y	y	scrap
ITP-1983		440966.300	5941782.300	533717.4570	80626.9180	2.1	2.1	0.0	5.3	0.4	83.20	-23.70	1.20	106.80		E		4															n	
ITP-1984		440964.300	5942402.200	533737.5128	80626.3859	0.4	0.4	0.0	29.9	2.4	107.60	-2.30	2.50	109.90		C	x	4	31.08.23	13:55:00	HT08	. Scheffl	Mikute	0.1	0.03	0.03	0.5		y	y		y	y	scrap (round magnet)
ITP-1985		440963.900	5941782.500	533717.4625	80626.7872	2.1	2.0	0.1	42.9	3.4	252.20	-201.90	1.20	454.10		C		4															n	
ITP-1986		440963.800	5942362.800	533736.2378	80626.3856	0.4	-5.1	5.5	290.8	23.3	22.00	-1.90	14.90	23.90		B	x	4	31.10.23	QA interpretation		E. Schwab						clear to 3.5m bg based on modelling		n		y	y	target model well below 3.5m, clear to 3.5m below ground
ITP-1987		440961.700	5941770.500	533717.0733	80626.6757	2.1	2.1	0.0	5.0	0.4	135.90	-121.40	0.60	257.30		E		4															n	
ITP-1988		440960.400	5941784.500	533717.5257	80626.5954	2.1	2.1	0.0	5.8	0.5	93.10	-44.90	0.80	138.00		E		4															n	
ITP-1989		440959.900	5942052.900	533726.2095	80626.3849	1.5	1.5	0.0	0.3	0.0	22.10	-3.40	0.70	25.50		F		4															n	
ITP-1990		440954.300	5941788.300	533717.6462	80626.2608	2.1	2.1	0.0	11.2	0.9	167.30	-143.60	0.60	310.90		D		4															n	
ITP-1991		440951.100	5941797.300	533717.9361	80626.0805	2.2	1.9	0.3	11.2	0.9	79.70	-19.60	1.50	99.30		D		4															n	
ITP-1992		440951.000	5941800.400	533718.0364	80626.0730	2.2	2.2	0.0	4.1	0.3	30.20	-23.80	1.10	54.00		F		4															n	
ITP-1993		440946.100	5941796.700	533717.9147	80625.8088	2.2	2.2	0.0	1.1	0.1	27.20	-22.60	0.80	49.70		F		4															n	
ITP-1994		440945.300	5941808.000	533718.2800	80625.7576	2.2	2.0	0.2	24.2	1.9	113.80	-95.30	1.30	209.10		C		4															n	
ITP-1995		440941.400	5941800.500	533718.0357	80625.5505	2.2	2.2	0.0	7.2	0.6	27.10	-46.70	1.20	73.90		E		4															n	
ITP-1996		440941.100	5942309.200	533734.4944	80625.1867	0.7	-7.0	7.7	671.2	53.7	18.20	-1.00	13.90	19.30		A		4															n	
ITP-1997		440940.900	5942356.900	533736.0376	80625.1432	0.6	0.6	0.0	2.5	0.2	15.00	-26.50	0.80	41.50		F		4															n	
ITP-1998		440939.200	5941811.700	533718.3972	80625.4231	2.2	2.0	0.2	6.9	0.6	70.20	-5.20	1.90	75.40		E		4															n	
ITP-1999		440938.900	5942293.600	533733.9888	80625.0776	0.7	-2.8	3.5	110.8	8.9	5.80	-10.40	4.60	16.20		B		4															n	
ITP-2000		440929.500	5942417.900	533738.0066	80624.4811	0.7	-3.1	3.8	79.7	6.4	12.30	-2.00	5.80	14.20		B	x	4	05.09.23	16:59:00	HT08	. Scheffl	Mikute	750.0	45.00	0.05	3.5		y	y		y	y	scrap (steel wire rope), via 2002 until 2009 and 2011
ITP-2001		440925.500	5942279.200	533733.5174	80624.3581	1.0	-2.1	3.1	23.0	1.8	4.50	-1.80	5.60	6.20		C		4															n	
ITP-2002		440923.800	5942403.600	533737.5416	80624.1806	0.7	-5.3	6.0	566.3	45.3	0.90	-16.40	14.70	17.30		A	x	4	05.09.23	16:59:00	HT08	. Scheffl	Mikute	750.0	45.00	0.05	3.5		y	y		y	y	scrap (steel wire rope), via 2000 until 2009 and 2011
ITP-2003		440920.500	5942398.500	533737.3753	80624.0045	0.7	-3.1	3.8	69.6	5.6	9.00	-1.50	5.70	10.50		C	x	4	03.09.23	16:46:00	HT08	. Scheffl	Mikute	750.0	45.00	0.05	3.5		y	y		y	y	scrap (steel wire rope), via 2000 until 2009 and 2011
ITP-2004		440918.600	5942392.200	533737.1707	80623.9054	0.6	-2.6	3.2	60.4	4.8	13.80	-1.20	14.90	15.00		C	x	4	05.09.23	16:33:00	HT08	. Scheffl	Mikute	750.0	45.00	0.05	3.5		y	y		y	y	scrap (steel wire rope), via 2000 until 2009 and 2011
ITP-2005		440915.500	5942385.400	533736.9494	80623.7413	0.8	-4.6	5.4	315.7	25.3	0.50	-12.40	12.40	12.90		A	x	4	05.09.23	16:20:00	HT08	. Scheffl	Mikute	750.0	45.00	0.05	3.5		y	y		y	y	scrap (steel wire rope), via 2000 until 2009 and 2011
ITP-2006		440911.000	5942376.800	533736.6693	80623.5022	0.8	-2.7	3.5	142.8	11.4	26.90	-1.00	15.50	27.80		B	x	4	05.09.23	16:03:00	HT08	. Scheffl	Mikute	750.0	45.00	0.05	3.5		y	y		y	y	scrap (steel wire rope), via 2000 until 2009 and 2011
ITP-2007		440907.700	5942367.600	533736.3703	80623.3289	0.8	-1.2	2.0	256.3	20.5	53.60	-63.20	3.30	116.80		B	x	4	02.09.23	16:15:00	HT08	. Scheffl	Mikute	250.0	20.00	0.05	3.5		y	y		y	y	scrap (steel wire rope)
ITP-2008		440902.800	5942357.600	533736.0448	80623.0690	0.9	-1.2	2.1	94.8	7.6	11.60	-29.10	3.20	40.80		B	x	4	02.09.23	15:55:00	HT08	. Scheffl	Mikute	250.0	20.00	0.05	3.5		y	y		y	y	scrap (steel wire rope)
ITP-2009		440900.300	5942351.300	533735.8399	80622.9373	1.0	-5.3	6.3	277.2	22.2	1.80	-7.80	9.40	9.60		B	x	4	02.09.23	15:55:00	HT08	. Scheffl	Mikute	250.0	20.00	0.05	3.5		y	y		y	y	scrap (steel wire rope)
ITP-2010		440899.800	5941953.000	533722.9529	80623.1823	2.2	2.2	0.0	0.7	0.1	4.80	-9.20	0.80	14.00		F		4															n	
ITP-2011		440895.300	5942340.500	533735.4885	80622.6725	1.1	-0.6	1.7	44.5	3.6	16.90	-16.50	3.00	33.50		C	x	4	02.09.23	15:55:00	HT08	. Scheffl	Mikute	100.0	7.00	0.05	2.3		y	y		y	y	scrap (steel wire rope)
ITP-2012		440881.500	5942268.900	533733.1663	80621.9704	1.4	0.6	0.8	9.8	0.8	12.50	-10.60	1.70	23.00		E		4															n	
ITP-2013		440878.000	5942272.000	533733.2651	80621.7778	1.4	0.3	1.1	19.6	1.6	17.20	-11.60	2.30	28.80		C		4															n	
ITP-2014		440865.300	5941948.400	533722.7900	80621.3079	2.3	1.9	0.4	22.0	1.8	50.40	-63.40	1.60	113.80		C	x	4	19.08.23	08:22:00	HT08	. Scheffl	Mikute	5.0	1.20	0.01	0.4		y	y		y	y	scrap
ITP-2015		440863.500	5942276.400	533733.4016	80620.9856	1.5	0.4	1.1	6.7	0.5	9.80	-1.80	2.90	11.50		E		4															n	
ITP-2016		440858.800	5941930.900	533722.2212	80620.9661	2.3	2.3	0.0	2.4	0.2	26.20	-12.60	1.30	38.80		F		4															n	
ITP-2017		440858.100	5941938.300	533722.4603	80620.9229	2.3	2.2	0.1	22.5	1.8	198.00	-71.20	1.50	269.20		C	x	4	19.08.23	07:55:00	HT08	. Scheffl	Mikute	3.0	0.80	0.02	0.3		y	y		y	y	scrap
ITP-2018		440854.400	5942290.700	533733.8606	80620.4805	1.5	0.2	1.3	60.6	4.8	32.90	-32.00	1.80	65.00		C		4															n	
ITP-2019		440851.200	5941949.300	533722.8134	80620.5399	2.3	2.3	0.0	3.6	0.3	58.90	-26.90	0.90	85.80		F		4															n	
ITP-2020		440844.000	5941958.100	533723.0952	80620.1420	2.3	2.3	0.0	2.6	0.2	46.70	-21.60	2.60	68.30		F		4															n	
ITP-2021		440843.300	5941959.800	533723.1499	80620.1028	2.3	2.2	0.1	31.4	2.5	174.10	-169.90	1.20	344.10		C	x	4	19.08.23	08:32:00	HT08	. Scheffl	Mikute	5.0	1.30	0.02	0.6		y	y		y	y	scrap
ITP-2022		440841.300	5941962.800	533723.2462	80619.9919	2.3	2.3	0.0	14.4	1.2	245.00	-139.10	1.30	384.00		D	x	4	19.08.23	08:36:00	HT08	. Scheffl	Mikute	5.0	0.70	0.04	0.3		y	y		y	y	scrap
ITP-2023		440832.400	5941984.700	533723.9511	80619.4925	2.3	2.3	0.0	1.5	0.1	29.00	-39.40	0.70	68.50		F		4															n	
ITP-2024		440825.500	5942250.300	533732.5417	80618.9352	1.8	1.6	0.2	2.8	0.2	11.70	-8.40	1.40	20.00		F		4															n	
ITP-2025		440823.500	5942038.000	533725.6720	80618.9717	2.2	1.4	0.8	10.7	0.9	9.60	-14.60	2.30	24.20		D	x	4	23.08.23	17:01:00	HT08	. Scheffl	Mikute	10.0	0.05	0.35	1.8		y	y		y	y	scrap
ITP-2026		440823.200	5942364.900	533736.2486	80618.7316	1.6	-3.0	4.6	368.2	29.5	15.90	-16.30	6.50	32.30		A		4															n	
ITP-2027		440807.700	5942023.200	533725.1867	80618.1219	2.3	1.2	1.1	46.7	3.7	38.00	-34.60	2.20	72.60		C	x	4	22.08.23	17:00:00	HT08	. Scheffl	Mikute	2.0	0.15	0.05	1.8		y	y		y	y	scrap, tool
ITP-2028		440800.700	5942238.300	533732.1434	80617.5937	2.0	2.0	0.0	0.8	0.1	32.90	-5.90	1.10	38.80		F		4															n	
ITP-2029		440797.000	5942021.200	533725.1177	80617.5409	0.0	-1.6	1.6	82.9	6.6	63.10	-14.50	3.60	77.50		B		5											outside scope in the embankment					n	
ITP-2030		440775.400	5942307.700	533734.3785	80616.1691	2.0	0.4	1.6	75.4	6.0	25.70	-29.30	2.60	55.00		B		4															n	
ITP-2031		440765.700	5942220.200	533731.5435	80615.7011	2.2	1.5	0.7	13.5	1.1	18.20	-20.70	1.60	38.90		D		4															n	
ITP-2032		440749.700	5942167.200	533729.8222	80614.8666	2.3	1.1	1.2	7.9	0.6	3.90	-6.10	2.20	9.90		E		4															n	
ITP-2033		440728.000	5942161.600	533729.6322	80613.6894	2.3	2.3	0.0	2.4	0.2	42.20	-17.20	1.00	59.40		F		4															n	
ITP-2034		440726.100	5942155.200	533729.4243	80613.5904	2.3	1.9	0.4	8.9	0.7	14.90	-28.20	1.60	43.10		E		4															n	
ITP-2035		440715.300	5942196.000	533730.7400	80612.9746	2.3	2.3	0.0	2.0	0.2	25.30	-30.00	0.70	55.20		F		4															n	
ITP-2036		440714.600	5942276.200	533733.3345	80612.8816	2.2	0.6	1.6	36.6	2.9	15.80	-15.90	2.60	31.70		C		4															n	
ITP-2037		440712.400	5942170.200	533729.9040	80612.8345	2.3	2.1	0.2	7.6	0.6	73.70	-14.50	1.80	88.10		E		4															n	
ITP-2038		440706.700	5942189.900	533730.5391	80612.5108	2.2	1.0	1.2	11.8	0.9	6.40	-8.10	2.20	14.50		D		4															n	
ITP-2039		440696.300	5942195.700	533730.7225	80611.9408	2.3	1.9	0.4	27.3	2.2	61.40	-85.80	1.10	147.20		C		4															n	
ITP-2040		440694.000	5942248.800	533732.4396	80611.7792	2.3	2.3	0.0	5.7	0.5	31.70	-38.90	1.20	70.50		E		4															n	
ITP-2041		440693.800	5942212.500	533731.2651	80611.7932	2.3	2.3	0.0	2.6	0.2	27.60	-30.70	0.60	58.30		F		4															n	
ITP-2042		440693.600	5942218.500	533731.4591	80611.7782	2.3	2.3	0.0	1.1	0.1	19.70	-8.40	1.10	28.00		F		4															n	
ITP-2043		440692.700	5942200.300	533730.8699	80611.7417	0.0	-0.9	0.9	97.5	7.8	146.10	-63.90	1.80	210.00		B		4															n	
ITP-2044		440690.400	5942193.800	533730.6586	80611.6210	0.0	-0.1	0.1	10.1	0.8	45.00	-58.10	0.90	103.10		D		4															n	
ITP-2045		440688.500	5942237.500	533732.0718	80611.4876	2.3	2.1	0.2	6.3	0.5	39.30	-28.80	1.30	68.00		E		4															n	

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	veigHT01	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-2046		440687.800	5942207.000	533731.0847	80611.4704	0.0	-0.5	0.5	89.1	7.1	17.00	-287.40	1.60	304.30		B		4																n	
ITP-2047		440687.700	5942209.900	533731.1785	80611.4630	2.3	2.2	0.1	16.1	1.3	36.60	-104.70	2.00	141.20		C		4																n	
ITP-2048		440687.600	5942225.700	533731.6896	80611.4467	2.3	2.0	0.3	7.6	0.6	61.70	-3.40	2.00	65.10		E		4																n	
ITP-2049		440683.400	5942236.400	533732.0341	80611.2107	2.3	2.3	0.0	3.2	0.3	57.50	-43.20	1.00	100.70		F		4																n	
ITP-2050		440681.800	5942235.800	533732.0140	80611.1241	2.3	1.5	0.8	29.7	2.4	62.60	-32.30	2.50	94.90		C		4																n	
ITP-2051		440680.700	5942208.400	533731.1271	80611.0830	0.0	-0.9	0.9	87.6	7.0	135.20	-58.80	2.10	193.90		B		4																n	
ITP-2052		440679.500	5942241.400	533732.1943	80610.9951	2.3	1.3	1.0	40.7	3.3	35.40	-33.30	1.80	68.70		C		4																n	
ITP-2053		440679.000	5942209.700	533731.1684	80610.9896	0.0	-0.1	0.1	13.0	1.0	88.10	-44.70	1.20	132.80		D		4																n	
ITP-2054		440677.600	5942211.700	533731.2326	80610.9120	0.0	0.0	0.0	2.8	0.2	85.50	-56.40	0.70	141.90		F		4																n	
ITP-2055		440668.000	5942258.800	533732.7526	80610.3572	2.3	2.1	0.2	16.8	1.3	78.70	-55.30	1.00	134.00		C		4																n	
ITP-2056		440666.800	5942267.200	533733.0238	80610.2861	2.3	2.3	0.0	3.8	0.3	30.90	-28.90	1.00	59.80		F		4																n	
ITP-2057		440666.000	5942258.800	533732.7517	80610.2484	2.3	2.3	0.0	4.0	0.3	25.00	-55.90	0.90	81.00		F		4																n	
ITP-2058		440663.600	5942252.500	533732.5469	80610.1221	2.3	2.3	0.0	5.9	0.5	65.10	-34.90	0.90	100.10		E		4																n	
ITP-2059		440663.300	5942249.700	533732.4562	80610.1077	2.4	2.4	0.0	9.8	0.8	242.10	-54.50	1.00	296.60		E		4																n	
ITP-2060		440660.800	5942263.500	533732.9017	80609.9621	2.3	2.1	0.2	8.4	0.7	30.10	-32.90	1.40	63.00		E		4																n	
ITP-2061		440655.900	5942261.800	533732.8447	80609.6966	2.3	2.3	0.0	26.3	2.1	131.40	-245.60	1.20	377.00		C		4																n	
ITP-2062		440654.600	5942266.200	533732.9865	80609.6228	2.3	2.1	0.2	14.1	1.1	78.60	-34.90	1.30	113.50		D		4																n	
ITP-2063		440652.000	5942270.100	533733.1116	80609.4786	2.3	2.2	0.1	15.5	1.2	88.10	-75.00	2.20	163.10		C		4																n	
ITP-2064		440650.000	5942276.100	533733.3049	80609.3657	2.3	2.3	0.0	2.9	0.2	57.40	-31.80	0.90	89.20		F		4																n	
ITP-2065		440650.000	5942272.200	533733.1788	80609.3683	2.3	1.9	0.4	30.8	2.5	78.20	-80.30	1.50	158.50		C		4																n	
ITP-2066		440646.700	5942276.800	533733.3262	80609.1856	2.3	2.3	0.0	12.6	1.0	336.00	-111.30	1.00	447.40		D		4																n	
ITP-2067		442001.900	5942643.600	533745.7403	80723.6500	-6.5	-10.2	3.7	166.3	13.3	21.40	-5.10	6.30	26.50		B	x	4	20.08.23	10:00:00	HT08	. Scheffl	. Mikuteit					3.8		n	n		y	y	no signal, nothing found
ITP-2068		441272.800	5941868.700	533720.3765	80643.5394	0.6	-1.7	2.3	44.4	3.6	9.30	-4.90	3.70	14.20		C	x	4	22.10.23	17:36:00	HT08	K. Orth	. Mikuteit					3.5		n	n		y	y	no signal
ITP-2069		441235.100	5941908.800	533721.6587	80641.4604	0.7	-0.9	1.6	31.0	2.5	5.80	-7.50	2.80	13.30		C	x	4	21.10.23	18:02:00	HT08	K. Orth	. Mikuteit	5.0	0.50	0.10	2.2		y	y		y	y		tyre
ITP-2070		441738.900	5942070.800	533727.1028	80708.7695	-6.4	-11.2	4.8	218.8	17.5	9.30	-9.10	7.90	18.40		B	x	4	02.09.23	09:03:00	HT08	. Scheffl	. Mikuteit					3.9		n	n		y	y	no signal, nothing found
ITP-2071		441827.400	5942194.200	533731.1308	80713.5031	-6.4	-8.8	2.4	543.1	43.5	52.30	-65.20	4.50	117.50		A	x	4	22.10.23	20:00:00	HT08	K. Orth	. Mikuteit	200.0	1.50	0.03	3.5		y	y		y	y		metal ring
ITP-2072		441842.200	5942210.800	533731.6738	80714.2974	-6.6	-9.8	3.2	1577.6	126.2	121.10	-81.80	4.90	202.90		A	x	4	22.10.23	12:22:00	HT08	K. Orth	. Mikuteit	350.0	2.00	1.60	3.2		y	y		y	y		boiler grate
ITP-2073		441846.500	5942225.200	533732.1414	80714.5218	-6.9	-10.5	3.6	641.0	51.3	32.60	-34.90	5.90	67.40		A	x	4	21.10.23	11:40:00	HT08	K. Orth	. Mikuteit				3.5		y	n		y	y		signal deeper than 3.5 m below GOK
ITP-2074		442026.800	5942230.800	533732.3946	80724.3312	-7.9	-8.9	1.0	48.9	3.9	3.70	-28.70	3.50	32.40		C	x	4	26.09.23	16:22:00	HT08	Hollman	. Mikuteit	7.0	0.50	0.50	3.0		y	y		y	y		cat tyre
ITP-2075		441978.100	5942238.500	533732.6243	80721.6754	-6.9	-10.2	3.3	453.1	36.2	33.40	-21.50	4.10	54.90		A	x	4	26.10.23	18:13:00	Susanne A	M. Heinz	Sobanski				3.5		y	n		y	y		Target dredged to 3.5m depth, signal and target deeper >3.5m
ITP-2076		441943.300	5942242.800	533732.7495	80719.7785	-6.8	-9.5	2.7	68.0	5.4	11.60	-4.80	3.90	16.50		C	x	4	27.10.23	18:11:00	Susanne A	M. Heinz	Sobanski				3.5		y	n		y	y		Target dredged to 3.5m depth, signal and target deeper >3.5m
ITP-2077		441933.000	5942252.500	533733.0593	80719.2114	-5.4	-7.4	2.0	36.2	2.9	7.60	-4.20	4.70	11.80		C	x	4	08.10.23	14:06:00	HT08	. Scheffl	. Mikuteit				2.3		y	n		y	y		geology (dreged by Airlift)
ITP-2078		442010.000	5942254.100	533733.1417	80723.4012	-6.8	-9.1	2.2	49.1	3.9	10.80	-4.60	5.20	15.40		C	x	4	26.09.23	16:57:00	HT08	Hollman	. Mikuteit	90.0	0.88	0.22	2.2		y	y	x	y	y		22 cm Projectile (Fr)
ITP-2079		442043.500	5942265.400	533733.5207	80725.2169	-7.7	-14.9	7.2	1061.8	84.9	9.10	-12.80	9.30	21.90		A	x	4	31.10.23	QA interpretation		E. Schwab						clear to 3.5m bg based on modelling		n		y	y		target model well below 3.5m, clear to 3.5m below ground
ITP-2080		442073.300	5942270.800	533733.7073	80726.8352	-7.5	-8.6	1.1	12.2	1.0	10.00	-1.70	2.90	11.70		D	x	4	26.09.23	10:39:00	HT08	Hollman	. Mikuteit	7.0	1.00	0.30	1.5		y	y		y	y		steel pipe
ITP-2081		441966.100	5942272.500	533733.7196	80720.9995	-6.9	-8.8	1.9	280.0	22.4	49.50	-53.20	4.10	102.70		B	x	4	08.10.23	13:07:00	HT08	. Scheffl	. Mikuteit	20.0	1.00	0.10	2.5		y	y		y	y		scrap (steel pipe)
ITP-2082		442087.000	5942300.000	533734.6575	80727.5613	-8.2	-10.0	1.8	79.7	6.4	44.70	-1.00	4.70	45.70		B	x	4	27.09.23	17:15:00	HT08	Hollman	. Mikuteit	7.0	0.50	0.50	3.5		y	y		y	y		car tyre
ITP-2083		441955.000	5942322.300	533735.3264	80720.3619	-6.9	-11.6	4.7	285.7	22.9	16.20	-5.80	8.90	22.00		B	x	4	03.11.23	10:15:00	Susanne A	M. Heinz	aniak-Skorek				3.5		n	n		y	y		target dredged to 3.5m depth, signal and target deeper >3.5m
ITP-2084		442044.200	5942327.700	533735.5367	80725.2132	-8.0	-14.0	6.0	2817.0	225.4	17.20	-57.90	9.60	75.10		A	x	4	31.10.23	QA interpretation		E. Schwab						clear to 3.5m bg based on modelling		n		y	y		target model well below 3.5m, clear to 3.5m below ground
ITP-2085		441927.100	5942332.500	533735.6453	80718.8365	-7.4	-9.3	1.9	83.7	6.7	27.40	-17.50	3.70	44.90		B	x	4	27.09.23	17:56:00	HT08	Hollman	. Mikuteit	10.0	2.00	0.20	1.2		y	y		y	y		steel pipe
ITP-2086		441934.500	5942333.700	533735.6871	80719.2385	-7.3	-8.3	1.0	306.6	24.5	121.90	-125.30	2.90	247.30		A	x	4	27.09.23	18:18:00	HT08	Hollman	. Mikuteit	8.0	2.00	0.20	1.2		y	y		y	y		steel pipe
ITP-2087		442017.600	5942350.000	533736.2476	80723.7505	-7.4	-9.3	1.9	42.3	3.4	8.30	-6.50	2.90	14.70		C	x	4	29.08.23	18:40:00	HT08	. Scheffl	. Mikuteit	50.0	0.40	1.00	2.3		y	y		y	y		scrap (tyre)
ITP-2088		442042.500	5942350.400	533736.2705	80725.1055	-7.9	-13.5	5.6	1524.6	122.0	5.30	-38.40	9.80	43.70		A	x	4	31.10.23	QA interpretation		E. Schwab						clear to 3.5m bg based on modelling		n		y	y		target model well below 3.5m, clear to 3.5m below ground
ITP-2089		442053.100	5942358.700	533736.5432	80725.6769	-7.6	-11.2	3.6	285.2	22.8	24.40	-7.50	5.40	32.00		B	x	4	25.10.23	11:16:00	HT08	K. Orth	. Mikuteit	30.0	5.00	0.04	3.5		y	y		y	y		SWR (steel wire rope)
ITP-2090		442073.100	5942358.800	533736.5544	80726.7654	-7.7	-8.5	0.8	10.3	0.8	16.40	-0.40	8.20	16.70		D	x	4	27.09.23	12:00:00	HT08	Hollman	. Mikuteit	10.0	0.80	0.40	2.5		y	y		y	y		steel structure
ITP-2091		441987.300	5942365.300	533736.7305	80722.0911	-7.5	-12.7	5.2	352.0	28.2	5.20	-9.60	8.10	14.90		A	x	4	31.10.23	QA interpretation		E. Schwab						clear to 3.5m bg based on modelling		n		y	y		target model well below 3.5m, clear to 3.5m below ground
ITP-2092		442231.600	5942372.800	533737.0704	80735.3829	-7.4	-10.3	2.9	99.2	7.9	8.30	-8.80	4.80	17.10		B	x	4	09.10.23	08:57:00	HT08	. Scheffl	. Mikuteit				3.5		n	n		y	y		no signal, nothing found
ITP-2093		442029.400	5942372.800	533736.9900	80724.3775	-7.7	-7.7	0.0	17.7	1.4	12.70	-97.70	0.90	110.40		C	x	4	29.08.23	17:36:00	HT08	. Scheffl	. Mikuteit	15.0	0.20	0.60	0.5		y	y		y	y		scrap (tyre)
ITP-2094		442131.100	5942401.300	533737.9526	80729.8937	-7.8	-8.5	0.7	36.5	2.9	13.20	-25.90	2.70	39.10		C	x	4	18.09.23	16:45:00	HT08	K. Orth	. Mikuteit	4.0	2.00	0.02	0.7		y	y		y	y		SWR (steel wire rope)
ITP-2095		441683.500	5942401.500	533737.7803	80705.5313	-7.1	-8.7	1.6	99.0	7.9	15.10	-24.70	4.50	39.70		B	x	4	21.08.23	10:30:00	HT08	. Scheffl	. Mikuteit	60.0	2.50	10.00	1.8		y	y		y	y		scrap
ITP-2096		441656.800	5942408.700	533738.0025	80704.0732	-8.1	-8.1	0.0	11.2	0.9	30.30	-113.40	1.50	143.70		D	x	4	20.08.23	10:21:00	HT08	. Scheffl	. Mikuteit	10.0	0.60	0.30	0.1		y	y		y	y		scrap
ITP-2097		442223.500	5942417.300	533738.5070	80734.9123	-7.4	-9.8	2.3	74.2	5.9	16.40	-4.00	4.50	20.40		B	x	4	07.10.23	19:32:00	HT08	. Scheffl	. Mikuteit	30.0	2.00	0.10	2.3		y	y		y	y		scrap (steel pipe)
ITP-2098		441772.600	5942439.700	533739.0519	80710.3552	-8.8	-8.8	0.0	14.5	1.2	26.90	-49.00	1.20	75.90		D	x	4	21.08.23	10:30:00	HT08	. Scheffl	. Mikuteit	10.0	0.60	0.03	1.0		y	y		y	y		scrap
ITP-2099		441660.100	5942486.100	533740.5081	80704.2006	-8.5	-10.8	2.3	314.5	25.2	37.90	-41.60	4.00	79.50		A	x	4	30.08.23	13:10:00	HT08	. Scheffl	. Mikuteit	15.0	0.30	0.08	3.3		y	y		y	y		scrap
ITP-2100		441549.200	5942733.100	533748.4552	80657.9974	-8.5	-11.2	2.8	340.4	27.2	80.10	-29.90	11.20	110.00		A	x	4	05.09.23	10:59:00	HT08	. Scheffl	. Mikuteit	1000.0	10.00	0.08	2.8		y	y		y	y		scrap (chain and anchor); via ITP-2103
ITP-2101		441611.600	5942735.700	533748.5644	80701.3922	-10.9	-10.9	0.0	2.8	0.2	23.70	-24.80	1.00	48.50		F		4																n	
ITP-2102		441594.800	5942738.600	533748.6514	80700.4758	-10.7	-10.7	0.0	502.8	40.2	4013.50	-461.90	2.00	4475.40		A	x	4	11.09.23	17:39:00	HT08	K. Orth	. Mikuteit	1500.0	62.00	2.00	1.5	The chain has been cut from the anchor in order to recover the anchor and chain in a safe way. The weigHT01 and length refers to the whole object.	y	y		y	y		anchor with chain
ITP-2103		441542.300	5942738.900	533748.6401	80657.6179	-8.8	-9.1	0.3	496.9	39.7	1509.10	-143.20	2.50	1652.30		A	x	4	05.09.23	10:59:00	HT08	. Scheffl	. Mikuteit	1000.0	2.00	1.40	2.8		y	y		y	y		scrap (chain and anchor); via ITP-2100
ITP-2104		441557.700	5942740.000	533748.6818	80658.4554	-8.3	-10.6	2.4	716.0	57.3	124.50	-98.30	6.20	222.80		A	x	4	05.09.23	10:38:00	HT08	. Scheffl	. Mikuteit	500.0	40.00	0.08	2.6		y	y		y	y		scrap (chain and anchor stone); via ITP-2106
ITP-2105		441527.500	5942742.800	533748.7603	80656.8096	-8.9	-10.0	1.1	24.5	2.0	12.60	-10.60	3.60	23.20		C	x	4	05.09.23	10:38:00	HT08	. Scheffl	. Mikuteit				3.2		n	n		y	y		possibility of the same objects as ITP 2100 and 2103
ITP-2106		441553.100	5942746.400	533748.8871	80658.2007	-8.8	-9.5	0.8	190.9	15.3	230.40	-71.20	3.50	301.50		B	x	4	05.09.23	10:38:00	HT08	. Scheffl	. Mikuteit	500.0	40.00	0.08	2.6		y	y		y	y		scrap (chain and anchor stone); via ITP-2104
ITP-2107		441601.500	5942766.800	533749.5665	80700.8214	-11.1	-11.6	0.6	26.1	2.1	21.30	-18.60	2.20	39.90		C	x	4	11.09.23	18:18:00	HT08	K. Orth	. Mikuteit	2.0	0.20	0.05	2.6		y	y		y	y		bolt
ITP-2108		441672.600	5942817.100	533751.2225	80704.6576	-10.8	-11.1	0.2	3552.1	284.2	9419.70	-1352.60	1.80	10772.40		A	x	4	03.09.23	10:05:00	HT08	. Scheffl	. Mikuteit	2500.0	1.80	1.20	1.5		y	y		y	y		scrap, (anchor with chain)
ITP-2109		441842.800	5942921.900	533754.6815	80713.9517	-9.6	-12.3	2.7	224.9	18.0	22.50	-20.00	4.40	42.50		B	x	4	04.10.23	12:00:00	HT08	. Scheffl	. Mikuteit	100.0	1.50	0.40	2.8		y	y		y	y		scrap, steel plate
ITP-2110		441847.300	5942928.000	533754.8966	80716.2699	-9.6	-12.5	2.9	47.3	3.8	3.90	-4.40	4.40	8.30		C	x	4	07.10.23	18:32:00	HT08	. Scheffl	. Mikuteit	10.0	1.30	0.03	3.2		y	y		y	y		scrap (steel wire rope)
ITP-2111		441180.700	5941719.300	533715.5049	80638.6305	-1.0	-1.5	0.5	138.0	11.0	66.00	-58.20	2.90	124.20		B		4																n	
ITP-2112		441160.200	5941729.900	533715.8409	80637.5066	-1.0	-1.8	0.8	54.9	4.4	15.00	-22.90	3.20	37.90		C		4																n	
ITP-2113		441153.600	5941736.900	533716.0649	80637.1437	-1.0	-0.8	0.0	19.4	1.6	16.50	-19.90	1.60	36.50		C		4																n	
ITP-2114		441213.200	5941769.400	533717.1405	80640.3618	-0.8	-2.1	1.3	65.3	5.2	8.40	-14.90	3.50	23.30		C		4																n	
ITP-2115		441648.800	5942004.900	533724.9359	80703.9085	-3.9	-9.7	5.8	2761.4	220.9	18.60	-46.20	11.00	64.80		A	x	4	31.10.23	QA interpretation		E. Schwab						clear to 3.5m bg based on modelling		n		y	y		target model well below 3.5m, clear to 3.5m below ground
ITP-2116		442193.900	5942264.700	533733.5574	80733.4017	-7.5	-7.6	0.1	133.0	10.6	179.60	-38.10	2.00	217.70		B	x	4	29.08.23	19:45:00	HT08	. Scheffl	. Mikuteit	2000.0	10.00	1.00	1.2		y	y		y	y		anchorstone with chain
ITP-2117		442182.400	5942275.400	533733.8988	80732.7719	-7.5	-10.5	3.0	257.9	20.6	26.20	-6.90	8.10	33.10		B	x	4	09.10.23	16:54:00	HT08	. Scheffl	. Mikuteit				3.0		y	n		y	y		target > 3.5m below ground, not cleared; dredged up to 3 and probe flushed up to 3.5 m; object depth > 3.5 m. Sediment is not stable. Modification of procedure (salvage pipe) necessary.
ITP-2118		442174.500	5942291.100	533734.4053	80732.3316	-7.5	-9.4	1.9	299.4	24.0	4.60	-51.20	5.20	55.80		B	x	4	25.09.23	15:15:00	HT08	Hollman	. Mikuteit	10.0	0.50	0.50	3.0		y	y		y	y		car tyre

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	weigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-2119		442036.300	5942298.200	533734.5780	80724.8031	-7.8	-8.4	0.6	10.3	0.3	4.10	-4.20	2.10	8.30		D	x	4	26.09.23	10:08:00	HT08	Hollman	Mikuteit	7.0	1.00	0.20	1.2		y	y		y	y	steel pipe
ITP-2120		442169.400	5942327.500	533735.5812	80732.0278	-7.3	-8.3	1.0	16.2	1.3	6.70	-2.20	9.20	8.90		C	x	4	26.09.23	14:22:00	HT08	Hollman	Mikuteit	10.0	0.50	0.50	2.5		y	y		y	y	car tyre
ITP-2121		442249.300	5942338.300	533735.9628	80736.3714	-7.0	-10.3	3.3	666.8	53.3	29.50	-29.30	6.50	58.80		A	x	4	09.10.23	09:56:00	HT08	Scheffl	Mikuteit				3.5		n	n		y	y	no signal, nothing found
ITP-2122		442607.400	5942501.000	533741.3682	80755.7524	-12.9	-14.0	1.1	41.9	3.4	12.00	-7.60	3.40	19.60		C	x	4	07.09.23	13:25:00	HT08	Scheffl	Mikuteit	40.0	0.50	0.17	1.5		y	y	x	y	y	17 cm shell, HE, not fired
ITP-2123		442615.000	5942505.500	533741.5144	80756.1600	-12.9	-11.5	0.0	0.9	0.1	5.60	-2.50	5.00	8.10		F		4																n	
ITP-2124		442633.300	5942512.800	533741.7596	80757.1543	-12.9	-13.7	0.8	11.8	0.9	6.90	-2.90	4.30	9.80		D	x	4	07.09.23	12:23:00	HT08	Scheffl	Mikuteit				1.0		n	n		y	y	no signal, nothing found
ITP-2125		442616.300	5942520.100	533741.9875	80756.2220	-12.9	-13.7	0.8	24.4	1.9	10.00	-6.10	3.00	16.10		C	x	4	07.09.23	12:01:00	HT08	Scheffl	Mikuteit	15.0	0.25	0.30	1.3		y	y		y	y	geology, boulder
ITP-2126		442629.100	5942520.200	533741.9984	80756.2192	-12.9	-12.3	0.0	219.1	17.5	159.00	-378.00	1.70	537.00		B	x	4	07.09.23	12:34:00	HT08	Scheffl	Mikuteit	25.0	1.60	0.08	0.6		y	y		y	y	scrap
ITP-2127		442628.700	5942524.000	533742.1197	80756.8960	-12.9	-11.7	0.0	4.8	0.4	6.40	-11.90	1.00	18.30		F		4																n	
ITP-2128		442627.700	5942530.600	533742.3317	80756.8387	-12.9	-12.5	0.0	6.6	0.5	6.90	-5.10	2.00	12.00		E		4																n	
ITP-2129		442618.400	5942532.600	533742.3949	80756.3280	-12.9	-13.1	0.2	10.5	0.8	14.60	-2.50	3.40	17.10		D	x	4	07.09.23	11:45:00	HT08	Scheffl	Mikuteit				1.0		n	n		y	y	no signal, nothing found
ITP-2130		442657.400	5942537.300	533742.5612	80758.4481	-12.9	-12.3	0.0	3.9	0.3	14.30	-0.20	2.40	14.40		F		4																n	
ITP-2131		442080.000	5942567.300	533743.9510	80726.9864	-8.6	-9.7	1.1	129.9	10.4	28.40	-35.50	4.80	63.90		B	x	4	11.09.23	11:58:00	HT08	K. Orth	Mikuteit	15.0	1.50	0.04	2.1		y	y		y	y	SWR (steel wire rope)
ITP-2132		442073.900	5942599.200	533744.3332	80726.6463	-8.9	-10.5	1.7	118.0	9.4	37.80	-1.10	7.60	38.90		B	x	4	11.09.23	11:35:00	HT08	K. Orth	Mikuteit	25.0	0.80	0.20	2.2		y	y		y	y	tyre
ITP-2133		442054.800	5942607.600	533744.5976	80725.6032	-9.1	-10.7	1.6	828.0	66.2	148.20	-94.30	2.40	242.50		A	x	4	28.09.23	19:47:00	HT08	Hollman	Mikuteit	89.0	0.80	0.21	4.0		y	y	x	y	y	21 cm grenade
ITP-2134		441345.300	5942682.800	533746.7448	80646.9313	-3.4	-3.2	0.0	23.0	1.8	26.30	-25.60	2.00	51.80		C	x	4	06.09.23	18:50:00	HT08	Scheffl	Mikuteit				1.8		n	n		y	y	no signal, nothing found
ITP-2135		441378.500	5942706.400	533747.5241	80648.7264	-6.6	-9.0	2.4	2257.3	180.6	156.30	-329.40	5.60	481.70		A	x	4	15.09.23	14:15:00	HT08	K. Orth	Mikuteit	6.0	4.00	0.03	2.2		y	y		y	y	SWR (steel wire rope)
ITP-2136		441434.400	5942707.000	533747.5637	80651.7636	-8.5	-9.3	0.8	30.8	2.5	14.60	-5.70	3.10	20.40		C	x	4	08.09.23	06:51:00	HT08	Scheffl	Mikuteit				1.5		n	n		y	y	no signal, nothing found
ITP-2137		441438.400	5942718.900	533747.9515	80651.9768	-8.9	-7.5	0.0	35.0	2.8	62.80	-135.20	1.30	198.00		C	x	4	08.09.23	07:07:00	HT08	Scheffl	Mikuteit	5.0	0.17	0.05	0.7		y	y		y	y	scrap
ITP-2138		441452.900	5942720.900	533748.0207	80652.7614	-9.3	-9.4	0.1	13.9	1.1	20.00	-6.50	2.50	26.50		D	x	4	08.09.23	07:21:00	HT08	Scheffl	Mikuteit				0.0		n	n		y	y	no signal, nothing found
ITP-2139		441474.900	5942732.800	533748.4164	80653.9531	-9.1	-9.4	0.3	539.2	43.1	437.20	-228.50	2.90	665.70		A	x	4	08.09.23	07:53:00	HT08	Scheffl	Mikuteit				1.2		n	n		y	y	anchor cain, recovered on 14/08/2023, via ITP 1860 and 1863
ITP-2140		441730.100	5942746.700	533748.9674	80707.8330	-9.8	-10.6	0.8	63.1	5.0	19.80	-18.90	2.60	38.70		C	x	4	01.09.23	09:13:00	HT08	Scheffl	Mikuteit	20.0	3.00	0.04	1.5		y	y		y	y	scrap (steel wire rope)
ITP-2141		441705.000	5942754.600	533749.2124	80706.4655	-8.9	-9.7	0.8	27.3	2.2	20.60	-4.30	5.60	24.90		C	x	4	16.09.23	08:18:00	HT08	K. Orth	Mikuteit				3.0		y	n		y	y	target below 3.5 below ground, object not recovered. Probe flushed up to 3 m. object depth > 3 m. Sediment is not stable. Modification of procedure (salvage pipe) necessary.
ITP-2142		441860.600	5942778.600	533750.0507	80714.9194	-8.9	-8.5	0.0	960.0	76.8	1790.70	-762.60	2.30	2553.30		A	x	4	12.09.23	11:58:00	HT08	K. Orth	Mikuteit	40.0	11.30	0.03	0.6		y	y		y	y	SWR (steel wire rope)
ITP-2143		441654.900	5942785.100	533750.1816	80703.7139	-11.1	-10.2	0.0	938.0	75.0	2006.80	-1204.70	1.90	3211.50		A	x	4	01.09.23	08:00:00	HT08	Scheffl	Mikuteit	2000.0	1.80	1.00	0.5		y	y		y	y	scrap (2143 anchor with 20 m chain via 2147, 2148,2149 and 2151)
ITP-2144		441777.900	5942788.100	533750.3267	80710.4101	-9.5	-11.5	2.0	357.4	28.6	42.20	-32.40	3.90	74.60		A	x	4	16.09.23	15:05:00	HT08	K. Orth	Mikuteit	80.0	2.30	0.40	3.6		y	y		y	y	scrap (buoy)
ITP-2145		441851.100	5942791.000	533750.4492	80714.3926	-10.2	-10.8	0.6	386.4	30.9	160.30	-211.50	5.70	371.70		A	x	4	12.09.23	12:44:00	HT08	K. Orth	Mikuteit	10.0	3.50	0.03	0.3		y	y		y	y	SWR (steel wire rope)
ITP-2146		441840.900	5942792.400	533750.4903	80713.8330	-10.9	-11.1	0.2	20.6	1.7	1.30	-20.30	1.80	21.50		C	x	4	12.09.23	13:08:00	HT08	K. Orth	Mikuteit				0.0		y	n		y	y	small object dredged away
ITP-2147		441650.900	5942792.500	533750.4170	80703.4941	-11.0	-9.8	0.0	17.6	1.4	66.80	-21.00	1.30	87.80		C	x	4	01.09.23	08:00:00	HT08	Scheffl	Mikuteit	500.0	20.00	0.10	0.3		y	y		y	y	scrap (2143 anchor with 20 m chain via 2147, 2148,2149 and 2151)
ITP-2148		441648.300	5942795.400	533750.5103	80703.3501	-11.1	-10.1	0.0	47.3	3.8	77.40	-75.20	1.80	152.50		C	x	4	01.09.23	08:00:00	HT08	Scheffl	Mikuteit	500.0	20.00	0.10	0.3		y	y		y	y	scrap (2143 anchor with 20 m chain via 2147, 2148,2149 and 2151)
ITP-2149		441646.900	5942799.100	533750.6293	80703.2726	-11.1	-10.8	0.0	15.6	1.2	40.20	-1.20	2.90	41.40		C	x	4	01.09.23	08:00:00	HT08	Scheffl	Mikuteit	500.0	20.00	0.10	0.3		y	y		y	y	scrap (2143 anchor with 20 m chain via 2147, 2148,2149 and 2151)
ITP-2150		441874.000	5942801.700	533750.8039	80715.6313	-8.9	-8.6	0.0	85.2	6.8	169.40	-89.80	3.90	259.20		B	x	4	12.09.23	12:22:00	HT08	K. Orth	Mikuteit	50.0	0.80	0.20	1.5		y	y		y	y	tyre
ITP-2151		441642.000	5942806.400	533750.8624	80702.9965	-11.2	-10.8	0.0	13.7	1.1	28.30	-9.40	3.20	37.70		D	x	4	01.09.23	08:00:00	HT08	Scheffl	Mikuteit	500.0	20.00	0.10	0.3		y	y		y	y	scrap (2143 anchor with 20 m chain via 2147, 2148,2149 and 2151)
ITP-2152		441767.600	5942816.800	533751.2524	80709.8275	-10.4	-10.9	0.5	37.8	3.0	21.40	-11.10	2.20	32.50		C	x	4	16.09.23	09:05:00	HT08	K. Orth	Mikuteit	1200.0	1.20	1.10	0.7	The chain has been cut from the anchor in order to recover the anchor and chain in a safe way.	y	y		y	y	anchor with chain
ITP-2153		441639.400	5942818.200	533751.2445	80702.8514	-10.6	-9.8	0.0	7.4	0.6	18.70	-7.80	1.90	26.50		E		4																n	
ITP-2154		441865.700	5942833.500	533751.8302	80715.1587	-9.9	-11.0	1.1	40.6	3.2	11.90	-13.40	2.80	25.30		C	x	4	18.09.23	16:22:00	HT08	K. Orth	Mikuteit	30.0	0.60	0.15	1.1		y	y		y	y	scrap
ITP-2155		441662.000	5942835.200	533751.8041	80704.0658	-9.7	-10.0	0.4	46.0	3.7	53.20	-0.70	14.90	53.90		C	x	4	03.09.23	10:05:00	HT08	Scheffl	Mikuteit	750.0	50.00	0.08	0.3		y	y		y	y	scrap (chain)
ITP-2156		441658.000	5942841.500	533752.0060	80703.8459	-9.7	-10.1	0.5	132.9	10.6	54.50	-69.70	7.60	124.20		B	x	4	03.09.23	10:05:00	HT08	Scheffl	Mikuteit	750.0	50.00	0.08	0.3		y	y		y	y	scrap (chain)
ITP-2157		441837.600	5942843.300	533752.1350	80713.6231	-8.5	-10.0	1.4	465.3	37.2	150.10	-34.80	4.20	184.90		A	x	4	18.09.23	15:55:00	HT08	K. Orth	Mikuteit	260.0	110.00	0.04	4.2		y	y		y	y	SWR (steel wire rope)
ITP-2158		441653.600	5942851.600	533752.3319	80703.5986	-9.7	-9.2	0.0	29.0	2.3	194.00	-29.00	1.60	223.00		C	x	4	04.09.23	09:56:00	HT08	Scheffl	Mikuteit	1500.0	1.00	1.00	1.2		y	y		y	y	scrap (chain and anchor stone)
ITP-2159		441847.600	5942859.100	533752.6502	80714.1566	-8.9	-10.3	1.5	1377.9	110.2	269.30	-217.00	3.70	486.40		A	x	4	06.09.23	12:30:00	HT08	Scheffl	Mikuteit	750.0	2.00	0.60	2.8		y	y		y	y	scrap
ITP-2160		441720.500	5942862.800	533752.7188	80707.2332	-8.5	-11.2	2.7	125.7	10.1	5.80	-9.70	4.80	15.50		B	x	4	04.09.23	11:05:00	HT08	Scheffl	Mikuteit	5.0	0.28	0.07	3.3		y	y		y	y	scrap
ITP-2161		441669.000	5942866.700	533752.8258	80704.4266	-10.1	-10.0	0.0	49.6	4.0	51.50	-40.50	2.60	91.90		C	x	4	03.09.23	09:19:00	HT08	Scheffl	Mikuteit	15.0	0.20	0.60	0.2		y	y		y	y	scrap (tyre)
ITP-2162		441706.500	5942872.500	533753.0284	80706.4678	-8.5	-8.9	0.4	48.3	3.9	20.10	-22.90	2.60	43.00		C	x	4	04.09.23	11:32:00	HT08	Scheffl	Mikuteit	10.0	5.00	0.02	1.4		y	y		y	y	scrap (steel wire rope)
ITP-2163		441835.000	5942874.800	533753.1546	80713.4606	-9.4	-9.5	0.1	11.3	0.9	2.30	-10.50	2.40	12.90		D	x	4	06.09.23	10:02:00	HT08	Scheffl	Mikuteit	15.0	0.40	0.30	0.5		y	y		y	y	scrap
ITP-2164		441745.500	5942912.600	533754.3404	80708.5628	-7.1	-5.7	0.0	13.1	1.0	21.10	-50.20	1.10	71.20		D	x	4	15.09.23	07:50:00	HT08	K. Orth	Mikuteit	30.0	0.75	0.20	2.2		y	y		y	y	tyre
ITP-2165		441768.700	5942930.500	533754.9289	80709.8106	-7.8	-9.1	1.2	45.8	3.7	9.20	-9.20	3.60	18.40		C	x	4	15.09.23	08:54:00	HT08	K. Orth	Mikuteit	3.0	0.70	0.50	3.7		y	y		y	y	metal plate, steel wire rope
ITP-2166		441832.100	5942937.400	533755.1795	80713.2585	-9.4	-11.4	2.1	47.9	3.8	1.30	-6.20	4.10	7.50		C	x	4	04.10.23	10:49:00	HT08	Scheffl	Mikuteit	15.0	0.20	0.60	2.3		y	y		y	y	scrap (car tyre)
ITP-2167		441896.200	5942955.000	533755.7726	80716.7353	-9.8	-11.4	1.6	127.9	10.2	17.90	-24.20	4.50	42.10		B	x	4	29.09.23	07:59:00	HT08	Hollman	Mikuteit	25.0	5.00	0.05	2.5		y	y		y	y	SWR (steel wire rope)
ITP-2168		441927.300	5942980.600	533756.6135	80718.4115	-9.8	-11.5	1.7	82.6	6.6	15.70	-7.20	4.10	22.90		B	x	4	14.09.23	06:42:00	HT08	K. Orth	Mikuteit	25.0	0.55	0.15	1.7		y	y		y	y	H-beam
ITP-2169		441931.100	5942989.800	533756.9136	80718.6127	-9.9	-14.4	4.5	799.5	64.0	15.30	-18.00	6.70	33.30		A	x	4	14.09.23	08:06:00	HT08	K. Orth	Mikuteit	8.0	2.80	0.03	3.8		y	y		y	y	SWR (steel wire rope)
ITP-2170		442018.200	5943065.900	533759.4097	80723.3039	-13.6	-15.5	1.9	569.1	45.5	58.80	-60.40	3.60	119.20		A	x	4	12.09.23	18:48:00	HT08	K. Orth	Mikuteit	15.0	0.30	0.05	2.7		y	y		y	y	bolts x 3
ITP-2171		442043.200	5943087.400	533800.1162	80724.6495	-14.2	-15.6	1.4	610.7	48.9	39.20	-128.10	3.80	167.30		A	x	4	12.09.23	18:03:00	HT08	K. Orth	Mikuteit	10.0	6.80	0.02	1.6		y	y		y	y	SWR (steel wire rope)
ITP-2172		442146.000	5943130.200	533801.5406	80730.2180	-13.1	-14.4	1.3	20.2	1.6	9.60	0.30	7.40	9.30		C	x	4	12.09.23	19:23:00	HT08	K. Orth	Mikuteit				1.5		y	n		y	y	geology
ITP-2173		442629.200	5942559.300	533743.2434	80756.8705	-12.3	-18.8	2.0	40.9	3.3	3.50	-2.90	4.70	6.30		C		6																n	
ITP-2174		442506.000	5942585.400	533744.0393	80750.1473	-13.2	-14.8	1.6	69.3	5.5	19.00	-1.50	3.70	20.50		C	x	6	11.10.23	18:28:00	HT08	Scheffl	Mikuteit	80.0	10.00	0.05	3.5		y	y		y	y	SWR (steel wire rope)
ITP-2175		442428.300	5942586.300	533744.0376	80745.9174	-12.8	-13.4	0.6	31.6	2.5	10.40	-7.90	3.00	18.20		C		6																n	
ITP-2176		442320.900	5942615.300	533744.9334	80740.0522	-11.0	-14.7	0.6	14.2	1.1	2.80	-3.40	2.80	6.20		D		6																n	
ITP-2177		442281.800	5942677.000	533746.9141	80737.8827	-11.6	-15.7	4.1	172.3	13.8	5.70	-3.00	8.30	8.70		B	x	6	12.10.23	12:51:00	HT08	Scheffl	Mikuteit				4.0		n	n		y	y	no signal, nothing found, dreged by airlift until 4m depHT01
ITP-2178		442362.100	5942696.500	533747.5769	80742.2406	-14.4	-15.6	1.2	103.2	8.3	10.10	-17.20	3.50	27.30		B	x	6	10.10.23	10:43:00	HT08	Scheffl	Mikuteit				0.5		y	n		y	y	geology, stone layer eared; soft sediment up to a depth of 0.5 m, deep stone layer of unknown thickness, no treatment with airlift possible.
ITP-2179		442507.600	5942702.800	533747.8383	80750.1563	-14.1	-15.3	1.2	302.2	24.2	21.30	-63.20	4.70	84.50		A	x	6	14.11.23	19:22:00	Susanne A	T. Reiche	Sobans	10.0	3.00	0.02	0.5		y	y		y	y	SWR (steel wire rope)
ITP-2180		442494.800	5942742.900	533749.1307	80749.4329	-14.6	-25.1	4.0	3462.4	277.0	200.50	-6.60	10.60	207.10		A	x	6	27.11.23	13:08:00	HT01	M. Kano		10.0	1.00	0.04	3.5	CPT Probe recovered; other end still in the ground but not possible to recover	y	n		y	y	CPT probe, clear to 4.5m below ground
ITP-2181		442373.700	5942752.100	533749.3804	80742.8350	-14.5	-20.4	1.7	154.4	12.4	11.70	-16.60	3.40	28.30		B	x	6	11.10.23	12:17:00	HT08	Scheffl	Mikuteit	125.0	1.60	0.80	2.0		y	y		y	y	scrap (steel plate)
ITP-2182		442322.000	5942763.400	533749.7255	80740.0132	-14.6	-15.6	1.0	13.4	1.1	3.40	-1.60	5.10	4.90		D		6																n	
ITP-2183		442354.300	5942769.500	533749.9357	80741.7674	-14.4	-20.9	2.0	131.0	10.5	10.10	-9.00	4.40	19.10		B	x	6	11.10.23	11:27:00	HT08	Scheffl	Mikuteit	75.0	1.60	0.90	1.0		y	y		y	y	scrap (steel plate)
ITP-2184		442241.800	5942770.100	533749.9105	80735.6432	-12.9	-17.2	0.9	11.0	0.9	1.80	-2.00	3.00	3.70		D		6																n	
ITP-2185		442300.100	5942771.600	533749.9822	80738.8157	-14.8	-15.4	0.6	11.4	0.9	6.70	-2.00	5.00	8.70		D		6																n	
ITP-2186		442511.000	5942774.600	533750.1628	80750.2936	-14.5	-16.4	1.9	41.3	3.3	5.90	-1.90	5.40	7.70		C		6																n	
ITP-2187		442295.100	5942779.600	533750.2390	80738.5382	-14.1	-14.8	0.7	12.7	1.0	5.90	-1.50	3.60	7.40		D		6																n	
ITP-2188		442266.800	5942779.900	533750.2375	80736.9975	-15.1	-16.6	1.5	45.6	3.6	10.70	-1.50	4.60	12.10		C		6																n	
ITP-2189		442212.000	5942793.000	533750.6396	80734.0058	-11.9	-26.8	6.2	1245.0	99.6	11.10	-14.60	10.70	25.70		A	x	6	22.11.23	14:15:00	HT01	M. Kano		350.0	2.00	0.50	3.5		y	y		y	y	metal frame
ITP-2190		442300.700	5942795.000	533750.7395	80738.8327	-13.3	-13.7	0.4	34.2	2.7	8.80	-10.00	3.00	18.80		C		6																n	
ITP-2191		442306.500	5942808.600	533751.1818	80739.1394	-14.4	-14.7	0.3	13.2	1.1	4.50	-5.00	2.70	9.50		D		6																n	
ITP-2192		442355.800	5942809.700	533751.2370	80741.8222	-15.0	-21.3	1.9	29.5	2.4	4.10	-1.50	5.10	5.60		C		6																n	

SeaTerra Geophysics & EOD Services GmbH
UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	weigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-2193		442324.800	5942817.700	533751.4835	80740.1294	-14.3	-19.4	1.3	22.8	1.8	4.00	-2.30	5.20	6.30		C		6																n	
ITP-2194		442346.800	5942819.500	533751.5505	80741.3258	-14.4	-19.9	1.5	17.9	1.4	3.10	-1.70	5.40	4.80		C		6																n	
ITP-2195		442367.700	5942825.100	533751.7400	80742.4597	-14.5	-18.8	0.9	25.2	2.0	8.70	-1.80	4.20	10.50		C		6																n	
ITP-2196		442298.400	5942825.400	533751.7222	80738.6872	-14.3	-18.2	0.7	10.7	0.9	5.70	-0.40	6.30	6.00		D		6																n	
ITP-2197		442346.400	5942832.400	533751.9677	80741.2954	-14.5	-15.4	0.9	14.6	1.2	0.70	-3.40	3.30	4.10		D		6																n	
ITP-2198		442376.100	5942840.300	533752.2351	80742.9068	-14.9	-16.0	1.1	40.2	3.2	7.60	-5.00	4.20	12.60		C		6																n	
ITP-2199		442259.200	5942852.800	533752.5931	80736.5351	-14.7	-15.0	0.3	12.0	1.0	6.90	-1.70	4.30	8.60		D		6																n	
ITP-2200		442313.100	5942876.400	533753.3781	80739.4534	-14.9	-20.2	1.4	23.4	1.9	6.00	-1.80	3.50	7.80		C		6																n	
ITP-2201		442199.000	5942888.200	533753.7146	80733.2345	-14.5	-17.5	3.0	54.7	4.4	4.30	-1.00	7.80	5.30		C	x	6	17.10.23	15:13:00	HT08	K. Orth	J. Mikuteit	6.0	0.50	0.15	2.2		y	y		y	y	tyre
ITP-2202		442283.800	5942901.800	533754.1883	80737.8415	-12.9	-14.7	0.0	9.4	0.8	18.80	-7.50	2.00	26.30		E		6																n	
ITP-2203		442298.700	5942907.300	533754.3721	80738.6489	-15.0	-20.3	1.4	35.2	2.8	3.20	-4.10	3.90	7.30		C		6																n	
ITP-2204		442137.400	5942924.900	533754.8775	80729.8568	-11.9	-14.6	2.7	102.5	8.2	10.30	-1.20	5.90	11.60		B	x	6	17.10.23	10:06:00	HT08	K. Orth	J. Mikuteit		1.30	1.00	2.5	Boulder lays within a boulder field	y	n		y	y	boulder
ITP-2205		442273.700	5942935.300	533755.2682	80737.2693	-13.4	-13.4	0.0	5.1	0.4	7.00	-2.40	2.60	9.40		E		6																n	
ITP-2206		442298.500	5942937.800	533755.3589	80738.6176	-13.7	-13.8	0.1	17.4	1.4	13.60	-4.10	2.80	17.70		C		6																n	
ITP-2207		442173.700	5942941.300	533755.4226	80731.8218	-12.8	-14.3	1.5	59.2	4.7	9.00	-5.00	4.60	14.00		C	x	6	17.10.23	08:57:00	HT08	K. Orth	J. Mikuteit	5.0	1.45	0.10	2.4		y	y		y	y	metal pipe
ITP-2208		442224.900	5943068.800	533759.5681	80734.5237	-14.3	-19.0	1.1	21.3	1.7	4.70	-2.30	4.90	7.00		C		6																n	
ITP-2209		442155.700	5943079.900	533759.8998	80730.7492	-13.2	-14.4	1.2	102.3	8.2	21.70	-9.30	4.30	31.00		B	x	6	10.10.23	17:02:00	HT08	J. Scheffl	J. Mikuteit	20.0	2.00	0.03	1.5		y	y		y	y	scrap (steel wire rope)
ITP-2210		442200.500	5943108.900	533800.8559	80733.1686	-14.7	-18.8	0.8	15.9	1.3	3.50	-3.30	4.00	6.80		C		6																n	
ITP-2211		442174.400	5943115.400	533801.0558	80731.7434	-12.6	-16.5	0.7	57.9	4.6	14.80	-13.40	3.80	28.10		C	x	6	10.10.23	16:33:00	HT08	J. Scheffl	J. Mikuteit	25.0	1.20	0.05	1.4		y	y		y	y	scrap (steel pipe)
ITP-2212		442173.900	5943186.800	533803.3657	80731.6684	-12.2	-14.3	2.1	192.8	15.4	24.60	-12.30	5.00	36.90		B	x	6	02.12.23	16:00:00	HT01	D. Mirjanic		50.0	12.00	0.02	1.5		y	y		y	y	Chain
ITP-2213		442698.500	5942548.600	533742.9246	80800.6497	-12.0	-12.5	0.5	21.6	1.7	9.90	-3.00	4.10	12.90		C		6																n	
ITP-2214		442790.100	5942549.500	533742.9898	80805.6349	-12.3	-16.2	3.9	624.5	50.0	27.00	-5.50	6.20	32.60		A	x	6	31.10.23	QA Interpretation		E. Schwab						target model well below 2m bg		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2215		442745.100	5942553.100	533743.0885	80803.1832	-12.4	-13.0	0.6	22.5	1.8	7.50	-3.20	2.40	10.70		C		6																n	
ITP-2216		442692.500	5942554.200	533743.1034	80800.3194	-12.1	-12.4	0.3	11.2	0.9	4.70	-1.60	3.70	6.30		D		6																n	
ITP-2217		442738.800	5942555.300	533743.1572	80802.8388	-12.6	-12.6	0.0	5.9	0.5	4.20	-2.80	4.30	7.00		E		6																n	
ITP-2218		442708.500	5942567.900	533743.5530	80801.1812	-12.3	-13.5	1.2	63.2	5.1	13.00	-5.80	5.70	18.80		C	x	6	01.11.23	14:50:00	Susanne AM. Heinz	aniak-Sk		2.0	3.00	0.02	0.5		y	y		y	y	SWR (steel wire rope)
ITP-2219		442602.400	5942573.900	533743.7053	80755.4021	-13.3	-13.8	0.5	8.8	0.7	5.40	-0.40	4.20	5.70		E		6																n	
ITP-2220		442764.500	5942574.100	533743.7756	80804.2252	-12.6	-16.7	4.2	2804.9	224.4	33.80	-10.00	13.20	43.90		A	x	6	31.10.23	QA Interpretation		E. Schwab						target model well below 2m bg		n		y	y	target deeper 2m below ground
ITP-2221		442686.100	5942575.200	533743.7803	80759.9571	-12.0	-12.0	0.0	6.8	0.5	12.60	0.50	2.50	12.10		E		6																n	
ITP-2222		442894.700	5942577.600	533743.9400	80811.3098	-14.4	-14.9	0.5	53.4	4.3	15.30	-12.50	3.30	27.80		C	x	6	01.11.23	15:20:00	Susanne AM. Heinz	aniak-Sk		6.0	1.70	0.10	0.5		y	y		y	y	SWR (steel wire rope)
ITP-2223		442851.500	5942579.000	533743.9684	80808.9575	-13.5	-13.5	0.0	14.8	1.2	9.70	-4.00	2.20	13.70		D		6																n	
ITP-2224		442799.300	5942583.900	533744.1064	80806.1129	-13.2	-13.2	0.0	8.5	0.7	5.70	-3.10	6.70	8.70		E		6																n	
ITP-2225		442882.400	5942586.000	533744.2070	80810.6348	-14.3	-18.4	4.2	112.3	9.0	3.10	-2.20	7.60	5.20		B	x	6	31.10.23	QA Interpretation		E. Schwab						target model well below 2m bg		n		y	y	target deeper 2m below ground
ITP-2226		442590.100	5942587.000	533744.1242	80754.7239	-13.6	-14.6	1.1	10.0	0.8	2.30	-1.00	5.00	3.30		D		6																n	
ITP-2227		442790.700	5942589.400	533744.2810	80805.6412	-14.3	-15.2	0.9	35.0	2.8	7.30	-6.80	5.50	14.10		C		6																n	
ITP-2228		442542.800	5942602.900	533744.6200	80752.1387	-14.7	-15.1	0.5	10.7	0.9	1.60	-3.40	3.10	5.00		D		6																n	
ITP-2229		442697.600	5942604.300	533744.7264	80800.5638	-14.0	-14.3	0.2	16.1	1.3	11.60	-1.30	3.90	12.90		C		6																n	
ITP-2230		442583.000	5942608.400	533744.8138	80754.3232	-14.6	-15.4	0.8	11.4	0.9	4.00	-1.50	4.20	5.50		D		6																n	
ITP-2231		442489.500	5942611.900	533744.8901	80749.2316	-14.4	-15.6	1.2	17.0	1.4	1.60	-2.70	5.20	4.30		C		6																n	
ITP-2232		442732.100	5942626.200	533745.4485	80802.4271	-14.3	-18.2	3.9	5178.6	414.3	42.00	-9.00	16.10	51.00		A	x	6	19.11.23	16:47:00	Susanne AM. Reiche	Sobanski					2.2		y	n		y	y	geology
ITP-2233		442468.100	5942626.500	533745.3540	80748.0570	-14.5	-15.0	0.5	18.4	1.5	4.30	-5.60	3.20	9.90		C		6																n	
ITP-2234		442438.900	5942629.900	533745.4525	80746.4654	-14.1	-14.1	0.0	5.4	0.4	4.30	-3.10	4.20	7.30		E		6																n	
ITP-2235		442872.600	5942634.700	533745.7788	80810.0692	-14.2	-14.9	0.6	52.8	4.2	9.00	-10.30	3.70	19.30		C	x	6	15.11.23	14:39:00	Susanne AM. Reiche	Sobans		1.0	0.70	0.40	1.5		y	y		y	y	metal plate
ITP-2236		442633.300	5942637.400	533745.7720	80757.0419	-14.2	-14.6	0.4	11.0	0.9	6.30	-0.60	4.20	6.90		D		6																n	
ITP-2237		442555.800	5942638.800	533745.7867	80752.8225	-15.0	-15.1	0.2	8.1	0.6	7.20	-0.20	6.80	7.40		E		6																n	
ITP-2238		442838.800	5942639.100	533745.9079	80808.2265	-14.4	-17.3	2.9	59.5	4.8	5.60	-0.50	7.00	6.10		C	x	6	15.11.23	08:01:00	Susanne AM. Reiche	Sobans		0.5	0.37	0.27	1.2		y	y		y	y	metal plate
ITP-2239		442360.700	5942647.000	533745.9748	80742.1974	-14.3	-15.6	1.2	9.6	0.8	2.00	-0.70	2.80	2.70		E		6																n	
ITP-2240		442708.000	5942664.700	533746.6847	80801.0898	-14.5	-16.5	2.0	26.4	2.1	3.40	-1.50	6.20	4.80		C		6																n	
ITP-2241		442552.000	5942673.200	533746.8982	80752.5928	-14.1	-15.5	1.4	15.8	1.3	3.60	-0.70	6.60	4.30		C		6																n	
ITP-2242		442720.600	5942680.100	533747.1879	80801.7655	-14.3	-14.7	0.5	22.6	1.8	9.40	-4.00	3.30	13.30		C		6																n	
ITP-2243		442532.300	5942694.700	533747.5860	80751.5062	-14.3	-15.7	1.5	50.3	4.0	5.20	-6.00	4.20	11.20		C	x	6	10.10.23	11:26:00	HT08	J. Scheffl	J. Mikuteit				1.2		n	n		y	y	geology, target >3.5m below ground, not cleared; Soft sediment up to a depth of 1.2 m, deep stone layer of unknown thickness, no treatment with airlift possible.
ITP-2244		442774.400	5942695.800	533747.7171	80804.6835	-12.9	-13.4	0.5	23.2	1.9	11.10	-2.70	3.70	13.80		C	x	7	09.11.23	QA Interpretation		E. Schwab						same as 1185: boulder		n		y	y	boulder
ITP-2245		442414.100	5942704.000	533747.8402	80745.0661	-14.0	-17.0	3.1	35.9	2.9	2.80	-0.60	6.70	3.40		C		6																n	
ITP-2246		442716.800	5942715.800	533748.3415	80801.5350	-14.6	-17.4	2.9	63.4	5.1	5.80	-1.00	6.30	6.80		C	x	6	18.11.23	15:53:00	Susanne AM. Reiche	Sobans		50.0	0.40	0.35	1.2		y	y		y	y	boulder
ITP-2247		442400.400	5942715.900	533748.2198	80744.3124	-14.4	-16.0	1.5	19.7	1.6	4.00	-0.90	3.80	4.90		C		6																n	
ITP-2248		442353.000	5942716.300	533748.2139	80741.7321	-14.5	-14.6	0.2	9.3	0.7	3.50	-2.60	2.40	6.10		E		6																n	
ITP-2249		442677.200	5942720.400	533748.4747	80759.3764	-14.7	-16.3	1.6	52.8	4.2	7.70	-3.30	5.60	11.00		C	x	6	30.10.23	14:16:00	Susanne AM. Heinz	Sobanski					1.0		y	n		y	y	boulder
ITP-2250		442462.500	5942720.600	533748.3964	80747.6896	-13.9	-14.5	0.7	11.7	0.9	4.80	-1.40	8.90	6.20		D		6																n	
ITP-2251		442730.400	5942726.500	533748.6931	80802.2682	-13.2	-15.7	2.5	102.2	8.2	6.00	-4.10	7.20	10.10		B	x	7	14.11.23	20:07:00	Susanne AM. Reiche	Sobans		30.0	15.00	0.03	0.5	As left survey completed on 18.11.2023 by SusanneA	y	y		y	y	SWR (steel wire rope)
ITP-2252		442806.300	5942729.200	533748.8103	80806.3978	-13.7	-14.2	0.5	12.0	1.0	4.70	-1.80	3.00	6.50		D	x	7	17.11.23	15:49:00	Susanne AM. Reiche	Sobanski					0.5		y	n		y	y	boulder 0.7x0.5 left insitu
ITP-2253		442675.000	5942738.500	533749.0595	80759.2446	-14.1	-14.7	0.6	17.8	1.4	5.70	-2.50	3.50	8.20		C		6																n	
ITP-2254		442656.400	5942742.500	533749.1816	80758.2295	-14.9	-15.9	1.0	14.1	1.1	4.00	-1.00	3.90	5.00		D		6																n	
ITP-2255		442634.600	5942746.700	533749.3089	80757.0401	-14.6	-15.6	1.1	124.6	10.0	19.00	-16.90	3.40	35.90		B	x	6	30.10.23	13:30:00	Susanne AM. Heinz	Sobans		3.0	0.90	0.10	0.6		y	y		y	y	Steel wire rope
ITP-2256		442573.300	5942748.700	533749.3494	80753.7020	-14.4	-15.7	1.3	21.7	1.7	4.50	-1.80	4.00	6.30		C		6																n	
ITP-2257		442541.700	5942752.800	533749.4696	80751.9792	-14.3	-14.9	0.6	14.9	1.2	2.30	-3.80	2.90	6.10		D		6																n	
ITP-2258		442615.300	5942761.900	533749.7930	80755.9795	-14.6	-15.3	0.6	10.6	0.8	4.40	-1.10	4.60	5.50		D		6																n	
ITP-2259		442297.700	5942766.300	533749.8097	80738.6886	-14.4	-15.5	1.1	22.6	1.8	3.20	-3.50	3.70	6.70		C		6																n	
ITP-2260		442678.300	5942777.000	533750.3065	80759.3987	-13.5	-14.8	1.3	19.9	1.6	4.80	-0.60	2.30	5.30		C		6																n	
ITP-2261		442558.000	5942777.800	533750.2849	80752.8499	-14.5	-14.5	0.0	7.9	0.6	7.40	-1.40	2.00	8.80		E		6																n	
ITP-2262		442600.100	5942778.200	533750.3144	80755.1412	-15.0	-15.4	0.4	9.5	0.8	4.40	-1.10	4.10	5.50		E		6																n	
ITP-2263		442706.400	5942782.900	533750.5084	80800.9244	-13.0	-13.9	0.9	13.9	1.1	3.60	-1.60	3.60	5.20		D	x	7	18.11.23	16:33:00	Susanne AM. Reiche	Sobans		10.0	0.40	0.40	0.6		y	y		y	y	scrap
ITP-2264		442561.200	5942795.400	533750.8556	80753.0124	-14.7	-15.0	0.3	9.8	0.8	7.90	-0.10	4.00	8.10		E		6																n	
ITP-2265		442504.900	5942797.500	533750.9013	80749.9464	-14.4	-15.4	1.0	11.6	0.9	4.30	-0.10	4.50	4.40		D		6																n	
ITP-2266		442657.800	5942805.200	533751.2108	80758.2641	-13.3	-13.6	0.4	16.5	1.3	10.30	-1.60	4.80	11.80		C	x	7	25.10.23	16:28:00	Susanne AM. Heinz	Sobans		0.5	0.17	0.07	0.0		y	y		y	y	boulder
ITP-2267		442486.700	5942830.800	533751.9715	80748.9335	-14.6	-15.7	1.1	13.8	1.1	3.90	-1.40	4.20	5.20		D		6																n	
ITP-2268		442549.500	5942845.900	533752.4849	80752.3419	-13.5	-14.7	1.3	33.2	2.7	10.80	-0.10	7.90	10.90		C		6																n	
ITP-2269		442575.700	5942850.900	533752.6570	80753.7648	-14.9	-15.7	0.8	13.2	1.1	3.10	-2.20	4.30	5.30		D		6																n	
ITP-2270		442512.700	5942854.700	533752.7550	80750.3329	-14.3	-15.3	1.0	25.0	2.0	4.80	-3.50	3.40	8.30		C		6																n	
ITP-2271		442592.600	5942854.900	533752.7931	80754.6821	-14.5	-15.9	1.4	38.2	3.1	9.70	-0.60	5.70	10.30		C		6																n	
ITP-2272		442451.500	5942862.900	533752.9961	80746.9961	-14.4	-14.5	0.1	5.1	0.4	1.80	-1.90	2.60	3.70		E		6																n	
ITP-2273		442601.000	5942866.200	533753.1620	80755.1318	-12.9	-14.1	1.2	40.8	3.3	5.10	-4.90	4.40	10.00		C	x	7	07.11.23	06:19:00	Susanne AM. Heinz	aniak-Sk		14.0	0.60	0.20	1.2		y	y		y	y	tyre
ITP-2274		442683.800	5942876.900	533753.5409	80759.6319	-12.6	-13.6	1.0	140.9	11.3	18.50	-22.30	6.20	40.80		B	x	7	02.12.23	09:35:00	HT01	D. Mirjanic		15.0	0.80	0.15	1.6		y	y		y	y	scrap
ITP-2275		442432.100	5942878.600	533753.4964	80745.9296	-14.8	-15.6	0.8	12.9	1.0	3.30	-2.50	4.10	5.80		D		6																n	

SeaTerra Geophysics & EOD Services GmbH
UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP No.	SSS Contact No.	UTM zone 32N/ETRS 89 East (mE)	North (mN)	WGS84 Latitude (deg, min,sec)	Longitude	SKN water depth (m)	target depth SKN (m)	model depth b. g. (m)	weigt (kg)	magn. moment (Am²)	max (nT)	min (nT)	dist max-min (m)	p-p max-min (nT)	ITP notes ST-Project No.	munition category	in/out scope (in=x)	Priotity area	date inspection	time of clearance	vessel	EOD	GEO	weigHT0 (kg)	length (m)	width/ diameter (m)	depth b. ground (m)	TR comment	found (y/n)	salvage (y/n)	UXO (X)	clear (y,n, w)	clear QA (y/n)	inspection results
ITP-2276		442650.900	5942882.000	533753.6920	80757.8376	-12.9	-13.9	1.1	20.5	1.6	5.10	-1.30	3.80	6.40		C	x	7	07.11.23	08:02:00	Susanne AM. Heinzelmaniak-Skorek				1.60	1.40	0.3		y	n		y	y	geology, boulder
ITP-2277		442523.300	5942884.700	533753.7299	80750.8900	-14.7	-16.4	1.6	27.4	2.2	5.50	-1.20	3.70	6.70		C		6																n	
ITP-2278		442329.400	5942886.400	533753.7081	80740.3340	-14.8	-16.4	1.6	40.4	3.2	2.10	-5.00	4.00	7.00		C		6																n	
ITP-2279		442275.300	5942887.800	533753.7319	80737.3881	-15.4	-15.5	0.1	4.5	0.4	3.80	-0.70	6.30	4.50		F		6																n	
ITP-2280		442410.800	5942895.000	533754.0186	80744.7592	-15.0	-15.9	0.9	14.4	1.2	3.70	-1.80	4.00	5.50		D		6																n	
ITP-2281		442505.100	5942899.000	533754.1854	80749.8897	-14.7	-15.5	0.8	44.0	3.5	14.90	-5.60	3.60	20.40		C		6																n	
ITP-2282		442349.900	5942901.200	533754.1951	80741.4400	-15.1	-15.4	0.3	5.5	0.4	2.60	-1.20	3.20	3.80		E		6																n	
ITP-2283		442384.500	5942901.200	533754.2088	80743.3235	-14.4	-14.4	0.0	3.0	0.2	4.20	-1.20	2.60	5.40		F		6																n	
ITP-2284		442484.700	5942908.000	533754.4685	80748.7733	-14.3	-18.7	4.4	427.6	34.2	14.00	-0.10	15.10	14.10		A	x	6	31.10.23	QA Interpretation		E. Schwab						target model well below 2m bg		n		y	y	target deeper 2m below ground
ITP-2285		442633.000	5942908.200	533754.5335	80756.8458	-13.0	-13.3	0.3	51.1	4.1	22.80	-11.70	2.50	34.50		C	x	7	07.11.23	07:13:00	Susanne AM. Heinzelmaniak-Sk			70.0	0.80	0.20	0.3	07.11-2023 - as found/ wet stored at 442634.7 E, 5942906.8 N 10.11.2023 - additional inspection done. Wet stored at 442633.00 E, 5942908.20 N. As left survey completed 07.12-2023 - recovered and handed over to the German EOD Authorities (KBD)	y	y	x	y	y	SD 70 HE German HE aerial bomb
ITP-2286		442173.800	5942908.200	533754.3517	80731.8494	-13.4	-13.4	0.0	6.6	0.5	4.90	-1.50	1.80	6.40		E		6																n	
ITP-2287		442303.600	5942928.100	533755.0471	80738.9017	-14.1	-14.8	0.7	10.3	0.8	3.90	-1.00	2.50	4.90		D		6																n	
ITP-2288		442426.200	5942931.800	533755.2154	80745.5730	-15.0	-16.0	1.1	104.7	8.4	13.40	-14.90	3.10	28.30		B	x	6	25.10.23	17:28:00	Susanne AM. Heinz	Sobans		10.0	2.10	0.10	1.0		y	y		y	y	chain
ITP-2289		442294.200	5942936.900	533755.3281	80738.3842	-13.3	-13.3	0.0	9.9	0.8	10.80	-1.80	4.00	12.60		E		6																n	
ITP-2290		442532.500	5942939.700	533755.5130	80751.3542	-12.5	-16.6	4.1	245.2	19.6	14.60	0.40	8.10	14.20		B	x	7	31.10.23	QA Interpretation		E. Schwab						target depth model check > 3.5m, same position as 1533		n		y	y	clear to 3.5m bg
ITP-2291		442437.900	5942941.600	533755.5371	80746.2034	-14.3	-14.5	0.2	36.0	2.9	12.60	-10.50	2.80	23.10		C		6																n	
ITP-2292		442628.700	5942948.500	533755.8357	80756.5850	-12.3	-13.2	0.9	55.6	4.5	14.50	-7.40	4.10	22.00		C	x	7	02.12.23	09:35:00	HT01	D. Mirjanic		5.0	1.30	0.60	1.6		y	y		y	y	scrap
ITP-2293		442345.300	5942949.700	533755.7625	80741.1573	-14.0	-15.2	1.3	20.0	1.6	5.40	-0.50	4.40	5.90		C		6																n	
ITP-2294		442585.400	5942951.200	533755.9060	80754.2262	-12.5	-14.0	1.5	55.1	4.4	11.60	-1.50	3.90	13.10		C	x	7	09.11.23	10:38:00	Susanne AM. Reichelmaniak-Sk			58.0	1.70	0.20	1.5		y	y		y	y	scrap, gas bottle
ITP-2295		442417.000	5942953.900	533755.9268	80745.0575	-15.0	-15.4	0.4	11.9	1.0	3.10	-2.90	3.00	6.00		D		6																n	
ITP-2296		442323.400	5942957.300	533755.9997	80739.9601	-12.8	-12.8	0.0	1.5	0.1	3.60	-1.50	2.80	5.10		F		6																n	
ITP-2297		442260.800	5942959.300	533756.0396	80736.5511	-13.4	-13.4	0.0	6.5	0.5	15.70	-1.60	2.00	17.40		E		6																n	
ITP-2298		442532.500	5942960.000	533756.1698	80751.3407	-12.7	-14.6	1.9	365.8	29.3	37.60	-25.70	5.40	63.30		A	x	7	06.11.23	18:45:00	Susanne AM. Heinzelmaniak-Sk			50.0	0.90	0.80	1.5		y	y		y	y	scrap
ITP-2299		442343.900	5942960.500	533756.1114	80741.0739	-13.9	-14.6	0.6	25.1	2.0	11.30	-3.10	4.20	14.40		C		6																n	
ITP-2300		442361.800	5942974.800	533756.5811	80742.0387	-14.0	-14.7	0.8	13.1	1.1	4.00	-2.00	3.50	6.00		D		6																n	
ITP-2301		442260.100	5942983.200	533756.8126	80736.4970	-13.6	-14.6	1.1	16.4	1.3	4.50	-1.00	4.90	5.50		C		6																n	
ITP-2302		442293.300	5942985.600	533756.9034	80738.3027	-13.6	-13.6	0.0	4.2	0.3	4.30	-3.30	1.60	7.60		F		6																n	
ITP-2303		442358.500	5942992.000	533757.1363	80741.8476	-14.0	-14.9	1.0	14.4	1.2	2.60	-2.30	3.70	4.90		D		6																n	
ITP-2304		442284.400	5942993.300	533757.1490	80737.8130	-13.7	-13.7	0.0	5.1	0.4	7.20	-1.60	2.10	8.80		E		6																n	
ITP-2305		442233.900	5942996.100	533757.2195	80735.0622	-14.5	-14.8	0.3	8.0	0.6	3.80	-1.60	3.00	5.40		E		6																n	
ITP-2306		442382.700	5943001.900	533757.4662	80743.1583	-13.1	-13.1	0.0	6.5	0.5	7.10	-2.00	2.70	9.10		E		6																n	
ITP-2307		442282.000	5943004.000	533757.4942	80737.6753	-13.2	-13.2	0.0	3.9	0.3	4.30	-0.90	3.80	5.20		F		6																n	
ITP-2308		442435.200	5943009.900	533757.7458	80746.0109	-14.1	-14.4	0.3	8.9	0.7	6.80	-1.80	5.70	8.60		E		6																n	
ITP-2309		442365.100	5943012.800	533757.8119	80742.1930	-13.6	-13.6	0.0	42.5	3.4	18.50	-19.50	2.60	38.10		C		6																n	
ITP-2310		442242.900	5943023.100	533758.0967	80735.5341	-14.6	-15.3	0.6	9.9	0.8	4.70	-0.80	4.40	5.50		E		6																n	
ITP-2311		442232.100	5943024.800	533758.1831	80739.8443	-13.0	-13.1	0.1	4.8	0.4	2.80	-1.00	2.40	3.90		F		6																n	
ITP-2312		442433.700	5943026.100	533758.2694	80745.9184	-12.9	-14.6	1.6	53.7	4.3	11.40	-1.40	7.70	12.80		C	x	6	01.11.23	09:15:00	Susanne AM. Heinzelmaniak-Sk			20.0	0.51	0.15	0.5		y	y	x	y	y	28 cm Wurfkoerper Spr
ITP-2313		442567.800	5943027.500	533758.3677	80753.2174	-12.9	-14.6	1.7	90.5	7.2	6.60	-9.70	5.50	16.30		B	x	7	09.11.23	17:06:00	Susanne AM. Reichelmaniak-Sk			8.0	2.00	0.10	0.2		y	y		y	y	SWR (steel wire rope)
ITP-2314		442404.800	5943027.900	533758.3162	80744.3440	-14.0	-14.6	0.6	19.7	1.6	6.00	-3.20	2.40	9.10		C		6																n	
ITP-2315		442289.600	5943032.900	533758.4323	80738.0697	-14.0	-14.7	0.6	11.0	0.9	3.70	-1.70	3.20	5.40		D		6																n	
ITP-2316		442447.100	5943034.100	533758.5335	80746.6426	-12.1	-12.2	0.1	8.3	0.7	6.50	-1.60	2.20	8.20		E		7																n	
ITP-2317		442428.700	5943034.500	533758.5392	80745.6407	-13.0	-14.1	1.1	14.3	1.1	4.60	-1.20	6.80	5.80		D		6																n	
ITP-2318		442348.800	5943037.200	533758.5949	80741.2894	-13.8	-14.5	0.7	13.8	1.1	3.40	-2.50	3.20	5.90		D		6																n	
ITP-2319		442290.800	5943049.400	533758.9666	80738.1240	-13.6	-15.7	2.0	26.8	2.1	2.10	-2.10	5.40	4.20		C		6																n	
ITP-2320		442301.500	5943050.400	533759.0032	80739.7058	-14.3	-17.4	3.1	56.5	4.5	3.70	-1.40	8.40	5.10		C	x	6	10.10.23	17:45:00	HT08	. Scheffl	M. Mikute	25.0	0.35	0.12	1.2		y	y	x	y	y	12.5 cm shell, HE, not fired
ITP-2321		442366.300	5943055.000	533759.1778	80742.2302	-13.3	-13.5	0.2	10.7	0.9	5.10	-2.80	2.70	7.80		D		6																n	
ITP-2322		442315.700	5943056.900	533759.2192	80739.4744	-13.8	-14.3	0.5	5.4	0.4	1.20	-1.50	2.60	2.70		E		6																n	
ITP-2323		442375.500	5943057.100	533759.2493	80742.7296	-13.2	-13.2	0.0	65.9	5.3	64.50	-34.10	3.20	98.70		C	x	6	24.10.23	08:23:00	HT08	K. Orth	M. Mikute	5.0	2.00	0.03	0.2		y	y		y	y	SWR (steel wire rope)
ITP-2324		442461.500	5943061.500	533759.4258	80747.4082	-12.4	-13.1	0.7	18.5	1.5	3.80	-4.00	3.80	7.80		C	x	7	01.12.23	15:25:00	HT01	D. Mirjanic		31.0	1.00	0.10	1.4		y	y	x	y	y	10.5cm artillery shell german
ITP-2325		442294.200	5943069.900	533759.6312	80738.2954	-14.6	-15.8	1.2	28.4	2.3	7.40	-1.60	2.80	9.00		C		6																n	
ITP-2326		442302.700	5943079.800	533759.9549	80738.7515	-13.6	-14.7	1.1	36.1	2.9	11.40	-2.40	5.20	13.80		C		6																n	
ITP-2327		442432.100	5943086.700	533800.2295	80745.7910	-12.3	-12.4	0.1	73.8	5.9	28.50	-25.20	2.00	53.60		B	x	7	24.10.23	09:16:00	HT08	K. Orth	M. Mikute	10.0	2.50	0.02	1.4	heavily corroded SWR, small pieces left in situ	y	y		y	y	SWR (steel wire rope)
ITP-2328		442272.600	5943091.900	533800.3345	80737.1048	-14.6	-15.2	0.6	6.8	0.5	2.50	-0.80	4.60	3.30		E		6																n	
ITP-2329		442308.300	5943099.900	533800.6075	80739.0429	-15.0	-16.7	1.7	56.3	4.5	4.10	-5.10	5.70	9.20		C	x	6	31.10.23	07:30:00	Susanne AM. Heinzelmaniak-Sk			6.0	4.00	0.03	0.7		y	y		y	y	Steel wire rope
ITP-2330		442232.900	5943107.000	533800.8073	80734.9336	-14.9	-15.4	0.5	7.2	0.6	4.50	-0.60	5.50	5.10		E		6																n	
ITP-2331		442393.000	5943107.100	533800.8740	80743.6489	-11.9	-12.6	0.8	5.6	0.4	2.40	-1.00	10.00	3.40		E		7																n	
ITP-2332		442253.400	5943111.000	533800.9448	80736.0469	-15.2	-17.0	1.8	21.9	1.8	2.70	-1.20	4.80	3.90		C		6																n	
ITP-2333		442306.000	5943125.500	533801.4349	80738.9006	-14.1	-14.1	0.0	3.1	0.3	3.90	-1.60	2.20	5.50		F		6																n	
ITP-2334		442300.400	5943133.700	533801.6979	80738.5903	-13.6	-13.6	0.0	4.5	0.4	5.60	-1.80	2.80	7.30		F		6																n	
ITP-2335		442324.400	5943137.600	533801.8336	80739.8942	-13.2	-14.3	1.1	24.7	2.0	6.00	-1.50	3.80	7.50		C		6																n	
ITP-2336		442406.100	5943144.800	533802.0990	80744.3369	-12.2	-12.8	0.6	16.5	1.3	4.20	-3.60	3.60	7.80		C	x	7	19.11.23	09:35:00	Susanne AM. Reiche	Sobans		30.0	0.35	0.30	1.2		y	y	x	y	y	ammunition box (3 pieces of 8cm HE mortar granade)
ITP-2337		442423.900	5943145.100	533802.1157	80745.3057	-12.4	-13.8	1.4	134.5	10.8	10.30	-15.20	4.00	25.60		B	x	7	19.11.23	10:22:00	Susanne AM. Reiche	Sobans		45.0	7.00	0.03	1.1		y	y		y	y	SWR (steel wire rope)
ITP-2338		442190.100	5943151.000	533802.2139	80732.5743	-13.2	-13.7	0.5	5.7	0.5	2.60	-0.80	5.20	3.40		E		6																n	
ITP-2339		442313.900	5943153.400	533802.3407	80739.3120	-13.1	-14.8	1.8	67.9	5.4	6.40	-5.30	3.10	11.70		C	x	6	01.11.23	08:10:00	Susanne AM. Heinzelmaniak-Skorek						1.5		y	n		y	y	geology, boulder
ITP-2340		442424.300	5943155.400	533802.4491	80745.3206	-12.3	-13.4	1.2	92.0	7.4	14.30	-16.30	3.60	30.50		B	x	7	19.11.23	10:55:00	Susanne AM. Reiche	Sobanski					0.5		y	y		y	y	geology, group of ferromagnetic rocks left in situ
ITP-2341		442234.700	5943159.000	533802.4904	80734.9968	-14.4	-14.9	0.5	22.3	1.8	11.60	-1.20	3.90	12.80		C		6																n	
ITP-2342		442290.300	5943160.500	533802.5610	80738.0226	-14.4	-16.7	2.3	43.4	3.5	3.50	-1.80	5.60	5.30		C		6																n	
ITP-2343		442322.900	5943165.700	533802.7422	80739.7938	-11.3	-11.3	0.0	5.2	0.4	3.70	-1.60	1.90	5.30		E		7																n	
ITP-2344		442430.700	5943170.400	533802.9370	80745.6590	-12.4	-15.2	2.9	376.0	30.1	32.90	-16.40	11.60	49.30		A	x	7	20.11.23	11:28:00	Susanne AM. Reiche	Sobans		15.0	3.50	0.04	0.2		y	y		y	y	SWR (steel wire rope)
ITP-2345		442272.400	5943174.100	533802.9940	80737.0391	-14.5	-14.7	0.3	4.2	0.3	3.00	-0.10	8.10	3.20		F		6																n	
ITP-2346		442297.400	5943174.200	533803.0071	80738.3999	-14.4	-15.9	1.5	35.8	2.9	7.00	-1.70	3.10	8.70		C		6																n	
ITP-2347		442380.000	5943180.200	533803.2340	80742.8925	-12.2	-12.7	0.5	78.1	6.3	12.90	-20.40	2.10	33.30		B	x	7	09.11.23	QA Interpretation		E. Schwab						same as 1726: boulder		n		y	y	boulder
ITP-2348		442433.500	5943181.000	533803.2811	80745.8044	-12.3	-16.0	3.7	377.5	30.2	0.90	-16.30	13.70	17.10		A	x	7	20.11.23	11:52:00	Susanne AM. Reiche	Sobans		20.0	4.70	0.04	0.9		y	y		y	y	SWR (steel wire rope)
ITP-2349a		442306.000	5943183.200			-11.2	-13.0	1.8	29.6	2.4	4.50	-1.00	3.70	5.60		C	x	7	06.11.23	12:10:00	Susanne AM. Heinzelmaniak-Sk			24.5	0.58	0.12	1.2		y	y	x	y	y	12.2 cm HE projectile
ITP-2349b		442305.000	5943183.800	533803.3207	80738.8072	-11.2	-13.0	1.8	29.6	2.4	4.50	-1.00	3.70	5.60		C	x	7	06.11.23	12:23:00	Susanne AM. Heinzelmaniak-Sk			15.0	0.33	0.12	1.2		y	y	x	y	y	12 cm HE projectile, Dutch origin
ITP-2350		442220.700	5943186.900	533803.3876	80734.2161	-13.8	-15.8	2.0	61.0	4.9	10.90	-1.00	4.80	11.90		C	x	6	17.10.23	16:06:00	HT08	K. Orth	M. Mikute	50.0	0.48	0.17	2.3		y	y	x	y	y	17 cm shell, not fired, WW1, dutch
ITP-2351		442215.500	5943194.500	533803.6314	80733.9279	-14.0	-15.1	1.1	28.7	2.3	6.20	-2.70	4.00	8.90		C		6																n	

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	veigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-2352a		442298.200	5943197.300			-11.6	-12.6	1.0	30.9	2.5	8.50	-3.20	3.40	11.70		C	x	7	06.11.23	10:50:00	Susanne AM. Heinz	aniak-Sk		5.9	0.22	0.08	1.2		y	y	x	y	y	7.6 cm HE projectile
ITP-2352b		442299.500	5943198.500			-11.6	-12.6	1.0	30.9	2.5	8.50	-3.20	3.40	11.70		C	x	7	06.11.23	11:12:00	Susanne AM. Heinz	aniak-Sk		16.0	0.49	0.10	1.2		y	y	x	y	y	10.5cm HE projectile
ITP-2352c		442299.200	5943197.500	533803.7617	80738.4824	-11.6	-12.6	1.0	30.9	2.5	8.50	-3.20	3.40	11.70		C	x	7	06.11.23	11:37:00	Susanne AM. Heinz	aniak-Sk		24.5	0.58	0.12	1.3		y	y	x	y	y	12.2 cm HE projectile
ITP-2353		442295.000	5943202.300	533803.9153	80738.2505	-12.5	-12.7	0.1	6.2	0.5	4.20	-1.30	4.20	5.50		E		6															n	
ITP-2354		442206.200	5943207.900	533804.0612	80733.4127	-14.5	-15.3	0.8	38.1	3.0	12.20	-3.70	3.60	15.90		C		6															n	
ITP-2355		442201.000	5943214.100	533804.2598	80733.1254	-14.3	-16.8	2.5	38.6	3.1	2.60	-1.90	5.40	4.40		C		6															n	
ITP-2356		442173.600	5943218.000	533804.3751	80731.6312	-11.9	-12.6	0.8	10.7	0.9	2.60	-1.70	4.10	4.30		D		6															n	
ITP-2357		442359.100	5943218.600	533804.4681	80741.7291	-12.1	-13.6	1.5	16.8	1.3	4.10	-0.50	6.90	4.50		C	x	7	07.11.23	13:20:00	Susanne AM. Heinz	aniak-Sk		31.0	1.00	0.10	1.5		y	y	x	y	y	10.5 cm HE full round
ITP-2358		442221.400	5943227.700	533804.7079	80734.2269	-14.5	-15.2	0.7	33.9	2.7	13.80	-4.40	4.20	18.20		C		6															n	
ITP-2359		442372.900	5943228.200	533804.7842	80742.4740	-12.3	-12.7	0.4	11.8	0.9	3.40	-2.60	3.20	5.90		D	x	7	07.11.23	14:13:00	Susanne AM. Heinz	aniak-Sk		40.0	0.40	0.30	0.4		y	y	x	y	y	ammunition box (3 pieces of 8cm HE mortar granade)
ITP-2360		442301.100	5943229.600	533804.8010	80738.5644	-12.5	-12.5	0.0	8.1	0.7	5.40	-6.60	2.30	12.00		E		6															n	
ITP-2361		442269.800	5943231.600	533804.8533	80736.8591	-14.5	-15.9	1.4	21.7	1.7	2.70	-2.20	4.80	4.80		C		6															n	
ITP-2362		442171.800	5943239.800	533805.0797	80731.5187	-12.0	-12.9	0.9	21.5	1.7	6.40	-2.20	4.50	8.60		C		6															n	
ITP-2363		442265.200	5943241.500	533805.1718	80736.6021	-14.0	-16.4	2.4	33.9	2.7	4.80	-0.20	8.80	5.00		C		6															n	
ITP-2364		442302.600	5943244.000	533805.2675	80738.6364	-13.6	-13.6	0.0	7.5	0.6	7.80	-6.10	2.10	13.90		E		6															n	
ITP-2365		442345.400	5943245.800	533805.3428	80740.9652	-11.8	-15.2	3.3	168.4	13.5	12.10	-1.70	9.10	13.80		B	x	7	12.11.23	18:04:00	Susanne AM. Reiche	aniak-Skorek					3.2		y	n		y	y	geology
ITP-2366		442192.600	5943248.300	533805.3630	80732.6453	-11.3	-11.4	0.1	13.1	1.0	8.20	-3.10	3.10	11.30		D		6															n	
ITP-2367		442286.200	5943250.500	533805.4713	80737.7393	-13.6	-13.6	0.0	79.2	6.3	34.80	-31.30	2.80	66.00		B	x	6	02.12.23	16:20:00	HT01	D. Mirjanic		4.0	1.20	0.03	0.2		y	y		y	y	scrap
ITP-2368		442326.300	5943255.000	533805.6328	80739.9193	-11.8	-13.7	1.9	26.8	2.1	3.00	-1.40	5.20	4.30		C	x	7	08.11.23	09:52:00	Susanne AM. Heinz	aniak-Sk		68.0	0.49	0.17	1.5		y	y	x	y	y	17 cm HE projectile
ITP-2369		442305.700	5943260.200	533805.7929	80738.7943	-12.7	-13.7	1.1	25.8	2.1	7.00	-1.30	4.60	8.30		C		6															n	
ITP-2370		442325.000	5943263.600	533805.9106	80739.8427	-11.8	-13.7	1.8	27.3	2.2	5.00	-1.00	7.90	6.00		C	x	7	12.11.23	18:42:00	Susanne AM. Reiche	aniak-Skorek					2.1		y	n		y	y	geology
ITP-2371		442225.900	5943275.200	533806.2465	80734.4401	-14.3	-15.8	1.5	22.2	1.8	1.90	-2.50	5.50	4.40		C		6															n	
ITP-2372		442314.200	5943284.000	533806.5663	80739.2412	-12.4	-15.7	3.3	150.6	12.1	2.60	-6.00	5.50	8.70		B	x	6	31.10.23	QA Interpretation		E. Schwab						target model well below 2m bg		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2373		442197.500	5943291.200	533806.7529	80732.8833	-11.5	-12.1	0.7	8.1	0.7	2.20	-1.30	3.30	3.50		E		6															n	
ITP-2374		442249.000	5943367.500	533809.2421	80735.6360	-13.6	-15.3	1.6	18.0	1.4	1.00	-1.90	3.70	2.90		C		6															n	
ITP-2375		442288.000	5943367.900	533809.2705	80737.7589	-14.0	-16.0	2.0	26.8	2.1	3.20	-1.40	5.10	4.60		C		6															n	
ITP-2376		442281.000	5943385.600	533809.8404	80737.3659	-13.4	-13.4	0.0	6.2	0.5	7.20	-1.40	2.70	8.60		E		6															n	
ITP-2377		442266.100	5943405.500	533810.4783	80736.5415	-14.3	-14.5	0.3	5.8	0.5	3.40	-1.10	3.70	4.50		E		6															n	
ITP-2378		442199.400	5943411.700	533810.6524	80732.9062	-11.3	-13.7	2.5	50.7	4.1	2.70	-3.00	5.50	5.70		C	x	6	09.11.23	QA interpretation		E. Schwab						target model well below 2m bg, same as 1808		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2379		442229.000	5943416.100	533810.8066	80734.5147	-13.7	-16.6	2.9	34.6	2.8	3.40	-0.40	9.90	3.80		C		6															n	
ITP-2380		442229.600	5943440.200	533811.5865	80734.5312	-14.0	-18.9	4.9	576.7	46.1	1.80	-14.90	11.00	16.70		A	x	6	31.10.23	QA interpretation		E. Schwab						clear to 2m bg based on modelling		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2381		442224.400	5943445.400	533811.7527	80734.2446	-12.7	-13.2	0.5	11.8	0.9	5.00	-6.10	3.70	11.10		D		6															n	
ITP-2382		442211.000	5943460.400	533812.2327	80733.5051	-11.8	-12.8	1.0	120.4	9.6	18.10	-19.70	4.10	37.70		B	x	6	03.12.23	17:15:00	HT01	D. Mirjanic		5.0	1.80	0.03	3.0		y	y		y	y	SWR (steel wire rope)
ITP-2383		442825.300	5942558.600	533743.2980	80807.5449	-12.9	-14.3	1.4	38.0	3.0	9.00	-1.80	4.70	10.90		C		6															n	
ITP-2384		442944.400	5942584.900	533744.1957	80814.0102	-16.0	-16.9	0.9	27.4	2.2	10.80	-0.60	5.10	11.40		C		8															n	
ITP-2385		442753.400	5942694.400	533747.6635	80803.5414	-13.2	-13.7	0.5	18.9	1.5	8.60	-1.90	3.60	10.40		C		6															n	
ITP-2386		442667.300	5942908.500	533754.5568	80758.7127	-13.1	-15.3	2.2	104.1	8.3	6.40	-6.30	4.60	12.70		B		7												same as 1492					n	
ITP-2387		442679.200	5942952.200	533755.9754	80759.3315	-12.0	-15.3	3.3	242.5	19.4	10.80	-4.30	3.50	15.20		B	x	7	06.12.23	13:15:00	HT01	D. Mirjanic					1.1		y	n		y	y	geology
ITP-2388		442659.600	5942971.900	533756.6050	80758.2515	-12.2	-12.4	0.2	28.0	2.2	19.80	-3.50	2.60	23.30		C		7												same as 1571: boulder					n	
ITP-2389		442606.300	5942989.500	533757.1534	80755.3384	-13.1	-13.1	0.0	10.9	0.9	7.40	-10.50	1.70	17.90		D	x	7	09.11.23	16:20:00	Susanne AT. Reiche	aniak-Sk		5.7	0.29	0.07	0.4		y	y	x	y	y	7.5 cm HE projectile
ITP-2390		442593.200	5943022.700	533758.2225	80754.6033	-13.1	-15.7	2.6	77.2	6.2	6.10	-3.00	4.20	9.10		B	x	7	10.11.23	10:52:00	Susanne AT. Reiche	aniak-Sk		3.0	0.40	0.40	3.0		y	y		y	y	scrap
ITP-2391		442565.500	5943096.500	533800.5993	80753.0463	-13.6	-13.6	0.0	72.8	5.8	49.40	-23.00	2.40	72.50		B	x	7	25.11.23	16:58:00	Susanne AM. Heinz	C. Sobanski		7.6	0.25	0.10	0.5		y	y	x	y	y	95 mm smoke emission grenadel Q.F./ Nebelgranate
ITP-2392		442341.000	5943300.800	533807.1205	80740.6889	-12.6	-12.7	0.2	5.8	0.5	3.70	-1.40	3.00	5.10		E		7															n	
ITP-2393		442281.500	5943428.000	533811.2124	80737.3648	-13.0	-14.2	1.3	482.9	38.6	51.10	-68.00	5.00	119.10		A	x	6	31.10.23	14:45:00	Susanne AM. Heinz	aniak-Sk		40.0	3.50	0.20	1.5		y	y		y	y	scrap
ITP-2394		442621.200	5943550.000	533815.2942	80755.7773	-19.5	-21.7	2.2	1047.5	83.8	144.30	-20.90	8.60	165.20		A	x	8	08.12.23	14:54:00	Susanne AT. Reiche	aniak-Sk		85.0	15.00	0.03	1.5		y	y		y	y	SWR (steel wire rope)
ITP-2395		442590.900	5943593.600	533816.6929	80754.0988	-19.5	-21.5	2.1	50.8	4.1	4.00	-3.10	4.30	7.10		C	x	8	13.02.24	09:45:00	Susanne AM. Kano	D. Panfil					2.0		n	n		y	y	object deeper than 2m below the sediment
ITP-2396		442568.200	5943628.200	533817.8034	80752.8399	-19.4	-21.8	2.4	68.8	5.5	2.40	-4.60	5.20	7.00		C	x	8	16.02.24	11:26:00	Susanne AM. Kano	D. Panfil					2.0		n	n		y	y	object deeper than 2m below the sediment
ITP-2397		442452.100	5943785.100	533822.8339	80746.4146	-19.3	-19.7	0.4	34.1	2.7	7.80	-9.40	3.10	17.20		C		8															n	
ITP-2398		442420.400	5943850.200	533824.9277	80744.6453	-19.6	-21.9	2.3	421.4	33.7	8.20	-109.90	12.30	118.10		A	x	8	15.02.24	11:37:00	Susanne AM. Kano	D. Panfil		225.0	70.00	0.04	1.0	As left survey still pending. As left survey done on second tide window.	y	y		y	y	SWR (steel wire rope)
ITP-2399		442397.800	5943881.300	533825.9249	80743.3941	-19.5	-21.1	1.6	42.8	3.4	4.90	-4.00	4.20	8.80		C		8															n	
ITP-2400		443164.000	5942564.000	533743.6055	80825.9771	-21.2	-21.5	0.3	39.1	3.1	8.50	-13.80	2.20	22.30		C		8															n	
ITP-2401		443151.100	5942572.200	533743.8658	80825.2695	-21.0	-21.0	0.0	3.5	0.3	3.10	-4.40	2.00	7.50		F		8															n	
ITP-2402		443036.600	5942580.500	533744.0895	80819.0317	-18.0	-18.0	0.0	13.5	1.1	28.10	-21.90	2.00	49.90		D		8															n	
ITP-2403		443183.000	5942595.700	533744.6386	80826.9904	-20.4	-21.9	1.5	46.9	3.8	5.90	-4.20	4.00	10.20		C		8															n	
ITP-2404		443040.700	5942600.800	533744.7479	80819.2415	-18.4	-19.9	1.6	113.6	9.1	1.90	-18.60	6.40	20.50		B	x	8	04.11.23	10:25:00	Susanne AM. Heinz	aniak-Sk		10.0	0.55	0.20	0.5		y	y		y	y	tyre
ITP-2405		443124.900	5942602.200	533744.8262	80823.8237	-19.4	-21.1	1.7	55.6	4.4	7.50	-3.70	4.00	11.20		C	x	8	26.11.23	18:22:00	Susanne AM. Heinz	C. Sobanski		6.0	0.70	0.07	1.7		y	y		y	y	L-Beam
ITP-2406		442993.300	5942603.000	533744.8005	80816.6600	-16.4	-17.1	0.7	39.1	3.1	14.20	-4.30	4.00	18.50		C		8															n	
ITP-2407		443122.300	5942609.600	533745.0646	80823.6773	-20.4	-21.2	0.8	40.6	3.2	3.50	-8.50	3.10	12.00		C		8															n	
ITP-2408		443096.000	5942616.900	533745.2905	80822.2409	-19.4	-21.7	2.3	546.1	43.7	29.20	-33.10	5.00	62.30		A	x	8	01.12.23	09:11:00	Susanne AM. Heinz	aniak-Sk		27.0	0.95	0.07	2.5		y	y		y	y	SWR (steel wire rope)
ITP-2409		443190.400	5942628.800	533745.7124	80827.3715	-20.2	-20.6	0.3	42.1	3.4	27.60	-3.70	4.10	31.20		C		8															n	
ITP-2410		443219.200	5942636.800	533745.9825	80828.9338	-19.8	-22.3	2.5	49.1	3.9	4.60	-1.50	5.70	6.10		C		8															n	
ITP-2411		443098.600	5942644.000	533746.1683	80822.3646	-19.6	-19.6	0.0	58.8	4.7	61.80	-24.40	1.80	86.20		C	x	8	01.12.23	09:46:00	Susanne AM. Heinz	aniak-Sk		4.0	0.70	0.70	0.5		y	y		y	y	metal plate
ITP-2412		443154.300	5942648.900	533746.3486	80825.3933	-21.0	-22.8	1.8	111.3	8.9	16.30	-8.90	6.10	25.10		B	x	8	11.11.23	18:28:00	Susanne AT. Reiche	aniak-Sk		1.0	0.12	0.04	1.5		y	y		y	y	magnet
ITP-2413		443174.700	5942659.800	533746.7093	80826.4965	-20.4	-22.2	1.8	50.6	4.0	10.30	-0.90	8.10	11.20		C	x	8	03.12.23	10:24:00	Susanne AT. Reiche	aniak-Skorek					1.8		y	n		y	y	geology
ITP-2414		442991.600	5942668.500	533746.9191	80816.5243	-15.9	-15.9	0.0	13.0	1.0	3.50	-12.70	3.10	16.20		D		8															n	
ITP-2415		443001.400	5942669.500	533746.9553	80817.0570	-16.1	-16.4	0.4	15.7	1.3	6.40	-3.30	3.40	9.70		C		8															n	
ITP-2416		443078.800	5942670.000	533747.0018	80821.2697	-20.0	-20.0	0.0	4.7	0.4	4.50	-2.00	2.60	6.50		F		8															n	
ITP-2417		442881.700	5942673.400	533747.0345	80810.5389	-14.6	-15.8	1.2	38.2	3.1	2.90	-6.60	4.30	9.50		C		6															n	
ITP-2418		443030.600	5942674.800	533747.1382	80818.6430	-18.0	-18.6	0.6	14.2	1.1	6.30	-1.10	3.70	7.40		D		8															n	
ITP-2419		443096.400	5942676.400	533747.2158	80822.2235	-18.8	-22.9	4.1	5341.0	427.3	3.00	-74.40	19.40	77.30		A	x	8	31.10.23	QA interpretation		E. Schwab						clear to 2m bg based on modelling		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2420		443093.400	5942690.300	533747.6643	80822.0511	-20.0	-20.6	0.6	62.3	5.0	47.30	-0.30	16.20	47.60		C	x	8	03.12.23	11:04:00	Susanne AT. Reiche	aniak-Skorek					0.6		y	n		y	y	geology
ITP-2421		442885.700	5942692.400	533747.6508	80810.7441	-13.7	-15.3	1.6	36.0	2.9	8.70	-1.00	6.20	9.80		C		6															n	
ITP-2422		443081.500	5942695.200	533747.8182	80821.4001	-20.0	-23.4	3.4	742.5	59.4	57.60	-0.30	13.40	57.90		A	x	8	09.12.23	15:42:00	Susanne AT. Reiche	aniak-Skorek					2.0	borehole detection, soft ground	y	n		y	y	geology
ITP-2423		443090.300	5942696.800	533747.8734	80821.8781	-20.4	-20.4	0.0	22.1	1.8	24.90	3.10	2.70	21.90		C		8															n	
ITP-2424		443107.900	5942697.600	533747.9062	80822.8356	-20.1	-21.6	1.5	154.8	12.4	26.30	-13.60	4.00	39.90		B	x	8	02.12.23	10:38:00	Susanne AT. Reiche	aniak-Sk		15.0	5.00	0.03	2.2		y	y		y	y	SWR (steel wire rope)
ITP-2425		442513.900	5942703.300	533747.8570	80750.4989	-14.4	-14.4	0.0	10.4	0.8	0.00	-17.50	2.20	17.50		D		6															n	
ITP-2426		442976.100	5942707.000	533748.1587	80815.6552	-14.9	-15.6	0.7	94.5	7.6	15.40	-21.00	3.50	36.30		B	x	7	15.12.23	21:07:00	Susanne AT. Reiche	C. Sobanski					0.5		y	n		y	y	lump of ferromagnetic boulders
ITP-2427		442994.500	5942709.000	533748.2306	80816.6554	-14.4	-15.5	1.1	74.1	5.9	16.60	-7.80	4.30	24.40		B	x	7	16.12.23	09:14:00	Susanne AT. Reiche	C. Sobanski					0.5		y	n		y	y	lump of ferromagnetic boulders
ITP-2428		442969.300	5942719.600	533748.5637	80815.2767	-15.5	-15.5	0.0	6.1	0.5	7.20	-3.70	2.20	10.90		E		7															n	
ITP-2429		443103.000	5942724.000	533748.7584	80822.5515	-20.3	-24.0	3.7	323.0	25.8	7.70	-11.00	5.50	18.70		A	x	8	09.12.23	16:20:00	Susanne AT. Reiche	aniak-Skorek					2.0	borehole detection, hard ground	y	n		y	y	object deeper than 2m
ITP-2430a		443001.600	5942726.800	533748.8093	80817.0301	-15.7	-16.3	0.6	269.0	21.5	18.60	-93.30	3.50	112.00		B	x	7	14.12.23	13:56:00	Susanne AT. Reiche	C. Sobanski		14.0	0.42	0.11	0.5		y	y	x	y	y	10.5 cm fog projectile

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	veigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-2430b		443004.000	5942726.700	533748.8993	80817.0301	-15.7	-16.3	0.6	269.0	21.5	18.60	-93.30	3.50	112.00		B	x	7	14.12.23	13:56:00	Susanne A	T. Reiche	aniak-Sk	150.0	0.09	0.04	0.5		y	y	x	y	y	large buster C/98 with the fuse
ITP-2431		443098.300	5942752.200	533749.6690	80822.2771	-20.5	-20.5	0.1	11.1	0.9	6.10	-3.80	2.60	9.90		D		8																n	
ITP-2432		442860.200	5942756.700	533749.7212	80809.3136	-13.4	-14.6	1.2	73.8	5.9	8.10	-10.50	3.20	18.60		B	x	7	17.11.23	09:31:00	Susanne A	T. Reiche	aniak-Sk	40.0	0.75	0.75	0.5		y	y		y	y	metal plate
ITP-2433		442903.100	5942758.000	533749.7801	80811.6479	-14.6	-16.3	1.7	38.0	3.0	3.60	-3.50	6.10	7.10		C	x	7	16.11.23	09:19:00	Susanne A	T. Reiche	Sobanski	2.0	1.10	0.02	2.2		y	y		y	y	pipe
ITP-2434		443070.000	5942759.800	533749.9038	80820.7316	-19.8	-19.8	0.0	3.7	0.3	4.30	-2.60	3.80	6.80		F		8																n	
ITP-2435		443074.900	5942766.300	533750.1160	80820.9940	-20.3	-21.1	0.8	40.6	3.2	9.10	-6.70	4.00	15.70		C		8																n	
ITP-2436		443097.000	5942769.200	533750.2185	80822.1951	-19.6	-21.6	2.0	205.8	16.5	25.90	-9.70	5.20	35.60		B	x	8	04.12.23	11:12:00	Susanne A	T. Reiche	aniak-Sk	150.0	1.10	0.40	2.0	as left survey completed on 07.12.2023	y	y		y	y	tire with steel wire rope
ITP-2437		442970.500	5942777.000	533750.4213	80815.3042	-16.4	-17.9	1.5	110.6	8.9	11.30	-12.40	4.30	23.70		B	x	7	19.12.23	11:30:00	HT 01	Scheffl	Guenzl	25.0	1.50	1.00	2.3		y	y		y	y	fishing net with metal reinforcements
ITP-2438		443109.000	5942777.700	533750.4982	80822.8427	-20.2	-23.0	2.8	502.1	40.2	34.00	-15.10	5.80	49.10		A	x	8	07.12.23	14:26:00	Susanne A	T. Reiche	aniak-Sk	orek			2.0	object deeper than 2m	y	n		y	y	>2m depth
ITP-2439		443116.800	5942782.900	533750.6695	80823.2639	-20.2	-23.3	3.1	166.2	13.3	5.70	-9.00	5.50	14.70		B	x	8	07.02.24	16:42:00	Susanne A	M. Kano	D. Panfil	4.0			0.0		y	y		y	y	SWR (steel wire rope)
ITP-2440		442980.300	5942784.400	533750.6646	80815.8327	-18.1	-18.6	0.5	21.5	1.7	7.00	-3.40	2.50	10.40		C		8																n	
ITP-2441		443025.700	5942794.600	533751.0124	80818.2973	-19.3	-19.8	0.5	62.2	5.0	34.10	-3.40	3.70	37.50		C	x	8	12.12.23	19:00:00	Susanne A	T. Reiche	Sobanski	50.0	0.40	0.40	1.2	As left survey completed on 13.12.2023	y	y		y	y	scrap
ITP-2442		442800.600	5942800.300	533751.1085	80806.0405	-13.5	-13.5	0.0	8.7	0.7	9.80	-3.60	2.60	13.40		E		7																n	
ITP-2443		442825.600	5942800.700	533751.1312	80807.4011	-13.9	-14.8	0.9	146.9	11.8	17.20	-33.10	2.90	50.30		B	x	7	13.11.23	06:34:00	Susanne A	T. Reiche	aniak-Sk	8.0	3.60	0.02	0.5		y	y		y	y	SWR (steel wire rope)
ITP-2444		442910.700	5942809.000	533751.4332	80812.0279	-14.7	-14.7	0.0	7.7	0.6	4.10	-2.50	3.50	6.60		E		7																n	
ITP-2445		442819.600	5942810.900	533751.4589	80807.0677	-13.5	-15.4	1.9	469.0	37.5	67.10	-38.80	6.40	105.90		A	x	7	13.11.23	07:18:00	Susanne A	T. Reiche	aniak-Sk	25.0	10.00	0.02	1.5		y	y		y	y	SWR (steel wire rope)
ITP-2446		442876.000	5942811.800	533751.5102	80810.1372	-15.0	-15.5	0.5	139.3	11.1	28.50	-37.80	3.70	66.30		B	x	7	13.11.23	12:45:00	Susanne A	T. Reiche	aniak-Sk	7.5	0.40	0.10	1.2		y	y	x	y	y	10 cm morter shell 40 HE
ITP-2447		442955.800	5942814.200	533751.6192	80814.4794	-18.0	-18.1	0.1	103.9	8.3	68.60	-43.80	3.80	112.40		B	x	8	26.11.23	12:26:00	Susanne A	M. Heinz	Sobans	16.0	0.43	0.11	1.2		y	y	x	y	y	10.5cm HE projectile
ITP-2448		442890.300	5942814.300	533751.5967	80810.9139	-14.8	-16.3	1.5	231.7	18.5	18.30	-30.70	5.00	49.00		B	x	7	13.11.23	13:21:00	Susanne A	T. Reiche	aniak-Sk	3.0	0.70	0.07	0.9		y	y		y	y	scrap
ITP-2449		442951.500	5942815.700	533751.6660	80814.2444	-18.1	-18.1	0.0	52.7	4.2	34.10	-33.80	2.30	67.90		C	x	8	26.11.23	12:03:00	Susanne A	M. Heinz	Sobans	36.0	8.00	0.04	0.5		y	y		y	y	SWR (steel wire rope)
ITP-2450		442990.100	5942820.800	533751.8462	80816.3422	-18.1	-20.7	2.5	513.6	41.1	46.50	-18.60	6.80	65.10		A	x	8	02.12.23	16:45:00	Susanne A	T. Reiche	aniak-Sk	10.0	2.50	0.05	2.5		y	y		y	y	metal pipe
ITP-2451		442788.700	5942821.000	533751.7735	80805.3790	-12.7	-14.7	2.0	68.2	5.5	9.80	-1.70	10.60	11.40		C		7											same as 1366: boulder					n	
ITP-2452		442900.200	5942837.600	533752.3545	80811.4375	-14.4	-14.4	0.0	9.5	0.8	7.70	-2.90	2.20	10.50		E		7																n	
ITP-2453a		442810.900	5942842.200	533752.4682	80806.5734	-13.8	-14.7	0.9	337.1	27.0	80.50	-60.80	3.50	141.30		A	x	7	19.11.23	17:32:00	Susanne A	T. Reiche	Sobans	6.0	0.80	0.35	1.2		y	y		y	y	metal plate
ITP-2453b		442809.900	5942842.700			-13.8	-14.7	0.9	337.1	27.0	80.50	-60.80	3.50	141.30		A	x	7	21.11.23	13:15:00	HT01	M. Kano		5.0	0.30	0.10	0.6		y	y	x	y	y	8.8 cm RPG Anti tank
ITP-2454		442979.300	5942843.200	533752.5667	80815.7395	-19.1	-19.1	0.0	25.4	2.0	19.10	-32.70	1.30	51.90		C		8																n	
ITP-2455		443065.400	5942844.800	533752.6522	80820.4252	-19.5	-19.8	0.3	43.3	3.5	5.80	-18.80	3.10	24.60		C		8																n	
ITP-2456		442830.100	5942846.100	533752.6019	80807.6160	-14.3	-14.9	0.6	13.8	1.1	7.20	-1.90	3.90	9.10		D	x	7	21.11.23	12:45:00	HT01	M. Kano		12.0	0.50	0.13	0.5		y	y	x	y	y	INC 30 LB Incendiary Bomb MKI
ITP-2457		442826.300	5942858.800	533753.0113	80807.4008	-14.3	-14.3	0.0	10.4	0.8	8.60	-8.30	2.00	16.90		D	x	7	21.11.23	12:45:00	HT01	M. Kano		5.0	0.30	0.20	1.0		y	y		y	y	Plate
ITP-2458		442855.000	5942863.000	533753.1585	80808.9602	-14.6	-14.6	0.0	11.5	0.9	12.80	-0.20	4.60	12.90		D		7											same as 1419: boulders					n	
ITP-2459		442807.800	5942867.200	533753.2758	80806.3882	-14.0	-15.8	1.8	70.2	5.6	6.80	-5.10	4.80	11.90		B	x	7	18.12.23	16:41:00	Susanne A	T. Reiche	Sobans	67.0	0.80	0.20	0.5		y	y	x	y	y	SD-70 (not fused) German aerial bomb
ITP-2460		442914.800	5942878.100	533753.6706	80812.2054	-18.0	-20.4	2.4	41.1	3.3	3.30	-2.20	6.20	5.50		C		8																n	
ITP-2461		443044.400	5942881.900	533753.8443	80819.2577	-19.8	-24.6	4.8	11840.9	947.3	89.60	-101.30	10.80	191.00		A	x	8	10.12.23	17:31:00	Susanne A	T. Reiche	aniak-Sk	orek			2.0		y	n		y	y	object deeper than 2m
ITP-2462		442865.300	5942882.400	533753.7902	80809.5081	-16.0	-17.6	1.5	38.2	3.1	6.40	-3.00	3.50	9.40		C	x	7	19.12.23	12:01:00	Susanne A	T. Reiche	Sobans	15.0	6.00	0.03	1.5		y	y		y	y	SWR (steel wire rope)
ITP-2463		443004.600	5942884.400	533753.9096	80817.0895	-18.8	-23.2	4.4	475.9	38.1	1.70	-13.30	6.70	15.10		A	x	8	31.10.23	QA interpretation		E. Schwab						clear to 2m bg based on modelling		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2464		442830.000	5942890.500	533754.0384	80807.5812	-14.6	-15.0	0.4	9.3	0.7	3.40	-2.80	3.90	6.20		E		7																n	
ITP-2465		442851.600	5942892.000	533754.0955	80808.7560	-16.4	-20.9	4.5	176.8	14.1	7.60	-0.60	10.30	8.20		B	x	7	31.10.23	QA Interpretation		E. Schwab						target depth model check > 3.5m, same as 1472		n		y	y	clear to 3.5m bg
ITP-2466		442975.300	5942896.100	533754.2767	80815.4869	-18.8	-19.9	1.0	16.1	1.3	2.70	-1.80	3.40	4.50		C		8																n	
ITP-2467		442996.500	5942898.900	533754.3756	80816.6390	-19.1	-21.9	2.8	245.8	19.7	20.00	-8.40	5.60	28.40		B	x	8	15.12.23	08:22:00	Susanne A	T. Reiche	Sobanski				2.0		y	n		y	y	target dredged to 2m depth, signal and target deeper > 2m
ITP-2468		442844.900	5942909.800	533754.6687	80808.3795	-16.8	-19.2	2.4	257.6	20.6	23.10	-10.70	5.80	33.90		B	x	7	04.12.23	11:20:00	HT01	D. Mirjanic		3.0	1.20	0.30	2.8		y	y		y	y	scrap
ITP-2469		442766.000	5942914.200	533754.7801	80804.0817	-13.6	-13.6	0.0	8.8	0.7	9.60	-3.20	3.10	12.80		E		7																n	
ITP-2470		442786.600	5942925.200	533755.1441	80805.1958	-14.0	-14.0	0.0	6.9	0.5	10.80	-2.80	4.50	13.60		E		7																n	
ITP-2471		442752.200	5942930.700	533755.3085	80803.3195	-13.4	-14.5	1.1	27.9	2.2	8.20	-7.30	5.80	15.50		C	x	7	06.12.23	12:05:00	HT01	D. Mirjanic					1.3		y	n		y	y	geology
ITP-2472		442824.200	5942934.700	533755.4662	80807.2362	-16.6	-18.2	1.6	309.2	24.7	36.50	-24.50	3.90	61.00		A	x	7	03.12.23	10:35:00	HT01	D. Mirjanic		11.0	12.00	0.02	1.8		y	y		y	y	SWR (steel wire rope)
ITP-2473		443000.100	5942937.800	533755.6356	80816.8093	-19.3	-22.7	3.4	80.2	6.4	3.00	-2.70	5.30	5.70		B	x	8	07.02.24	17:29:00	Susanne A	M. Kano	D. Panfil						n	n		y	y	nothing found/ geology
ITP-2474		442821.400	5942942.500	533755.7175	80807.0787	-16.5	-20.8	4.3	551.4	44.1	0.10	-19.30	14.60	19.40		A	x	7	31.10.23	QA Interpretation		E. Schwab						target depth model check > 3.5m		n		y	y	clear to 3.5m bg
ITP-2475		442814.000	5942950.400	533755.9702	80806.6706	-15.7	-15.7	0.0	4.3	0.3	9.40	-10.40	3.30	19.70		F		7																n	
ITP-2476		442822.700	5942953.800	533756.0836	80807.1419	-16.5	-17.4	0.9	202.3	16.2	19.50	-48.40	3.40	67.90		B	x	8	05.11.23	11:44:00	Susanne A	M. Heinz	aniak-Sk	100.4	0.75	0.22	1.2		y	y	x	y	y	22 cm projectile, French origin, not fired
ITP-2477		442707.600	5942968.000	533756.4978	80800.8670	-12.5	-14.1	1.6	33.3	2.7	4.30	-3.10	5.50	7.40		C		7											same as 1567: boulder					n	
ITP-2478		442826.300	5942974.200	533756.7451	80807.3244	-16.3	-19.1	2.9	55.6	4.4	4.60	-0.90	6.40	5.50		C	x	8	11.12.23	QA interpretation		E. Schwab						clear to 2m bg based on modelling		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2479		442702.500	5943015.300	533758.0261	80800.5580	-14.4	-15.1	0.7	21.4	1.7	9.80	-1.70	4.40	11.50		C	x	7	21.11.23	19:12:00	HT01	M. Kano		9.0	0.50	0.10	0.8		y	y	x	y	y	10 cm Mortar
ITP-2480a		442667.400	5943020.700	533758.1870	80758.6438	-14.5	-14.5	0.0	14.9	1.2	11.10	-10.90	2.10	22.00		D	x	7	21.11.23	19:12:00	HT01	M. Kano		15.0	0.60	0.50	0.8		y	y		y	y	metal frame
ITP-2480b		442666.200	5943021.700			-14.5	-14.5	0.0	14.9	1.2	11.10	-10.90	2.10	22.00		D	x	7	21.11.23	19:12:00	HT01	M. Kano		15.0	0.60	0.50	0.6		y	y		y	y	metal frame
ITP-2481		442742.200	5943021.600	533758.2456	80802.7150	-14.3	-14.3	0.0	6.5	0.5	4.50	-3.30	2.80	7.80		E		7																n	
ITP-2482		442618.300	5943042.900	533758.8859	80755.9562	-13.8	-14.0	0.1	11.7	0.9	8.10	-3.70	4.60	11.70		D	x	7	25.11.23	17:50:00	Susanne A	M. Heinz	Sobanski				0.5		y	n		y	y	geology
ITP-2483		442823.000	5943046.600	533759.0863	80807.0969	-17.4	-20.0	2.6	2839.8	227.2	335.50	-87.60	8.10	423.10		A	x	8	04.12.23	18:47:00	Susanne A	T. Reiche	aniak-Sk	1200.0	40.00	0.04	1.9	as left survey completed on 06.12.2023	y	y		y	y	SWR (steel wire rope)
ITP-2484		442901.900	5943048.600	533759.1820	80811.3906	-18.7	-19.9	1.3	151.7	12.1	17.90	-21.20	3.50	39.10		B	x	8	04.12.23	17:05:00	Susanne A	T. Reiche	aniak-Sk	10.0	10.00	0.02	1.3		y	y		y	y	SWR (steel wire rope)
ITP-2485		442873.000	5943051.800	533759.2742	80809.8153	-18.3	-23.0	4.8	177.3	14.2	7.00	-0.60	20.00	7.60		B	x	8	31.10.23	QA interpretation		E. Schwab						clear to 2m bg based on modelling		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2486		442862.400	5943066.800	533759.7553	80809.2283	-18.8	-23.2	4.4	359.4	28.7	6.70	-5.00	13.20	11.70		A	x	8	31.10.23	QA interpretation		E. Schwab						clear to 2m bg based on modelling		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2487		442815.000	5943068.100	533759.7788	80806.6472	-17.4	-18.3	0.9	235.4	18.8	17.20	-49.20	3.70	66.40		B	x	8	04.12.23	18:25:00	Susanne A	T. Reiche	aniak-Sk	1200.0	40.00	0.04	0.9	as left survey completed on 06.12.2023	y	y		y	y	SWR (steel wire rope)
ITP-2488		442915.700	5943071.200	533759.9186	80812.1269	-19.2	-19.2	0.0	2.9	0.2	2.30	-6.50	2.20	8.80		F		8																n	
ITP-2489		442814.000	5943075.800	533800.0275	80806.5876	-17.5	-17.9	0.4	139.0	11.1	54.90	-62.70	3.60	117.60		B	x	8	04.12.23	17:43:00	Susanne A	T. Reiche	aniak-Sk	1200.0	40.00	0.04	0.4	as left survey completed on 06.12.2023	y	y		y	y	SWR (steel wire rope)
ITP-2490		442905.600	5943083.700	533800.3191	80811.5688	-18.9	-18.9	0.0	6.2	0.5	2.20	-3.20	2.80	5.40		E		8																n	
ITP-2491		442697.800	5943088.300	533800.3862	80800.2538	-15.8	-19.9	4.1	255.7	20.5	8.90	-5.20	8.10	14.20		B	x	7	31.10.23	QA Interpretation		E. Schwab						target depth model check > 3.5m, same as 1675		n		y	y	clear to 3.5m bg
ITP-2492		442886.000	5943089.500	533800.4991	80810.4980	-19.5	-20.7	1.2	10.3	0.8	0.90	-1.60	3.20	2.50		D		8																n	
ITP-2493		442915.600	5943100.700	533800.8731	80812.1020	-19.5	-20.2	0.7	104.6	8.4	30.40	-19.40	3.60	49.80		B	x	8	08.02.24	17:54:00	Susanne A	M. Kano	D. Panfil		6.0	0.30		0.3		y	y		y	y	scrap
ITP-2494		442846.300	5943116.400	533801.3538	80808.3191	-18.9	-20.3	1.4	26.9	2.2	2.90	-3.30	4.70	6.20		C		8																n	
ITP-2495		442834.000	5943117.700	533801.3910	80807.6486	-18.7	-20.7	2.0	16.7	1.3	1.50	-1.40	4.40	2.90		C		8																n	
ITP-2496		442866.900	5943127.100	533801.7081	80809.4334	-19.3	-19.3	0.0	4.6	0.4	4.00	-3.90	2.40	8.00		F		8																n	
ITP-2497		442691.400	5943128.900	533801.6973	80759.8785	-16.3	-17.0	0.7	26.8	2.1	4.90	-5.90	3.30	10.80		C		8																n	
ITP-2498		442653.400	5943150.900	533802.3941	80757.7953	-15.7	-20.6	4.9	510.8	40.9	9.00	-8.50	7.00	17.40		A	x	8	31.10.23	QA interpretation		E. Schwab						clear to 2m bg based on modelling		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2499		442566.300	5943153.700	533802.4503	80753.0519	-13.6	-13.6	0.0	10.2	0.8	6.70	-5.20	2.60	11.90		D	x	7	22.11.23	07:51:00	Susanne A	T. Reiche	Sobans	28.0	0.50	0.40	1.2		y	y		y	y	scrap

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	weigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-2500		442618.300	5943154.300	533802.4902	80755.8822	-14.9	-18.7	3.7	55.6	4.4	2.60	-1.00	9.00	3.60		C	x	7	31.10.23	QA Interpretation		E. Schwab						target depth model check > 3.5m, same position as 1712		n		y	y	clear to 3.5m bg
ITP-2501		442429.800	5943158.700	533802.5581	80745.6178	-12.2	-13.3	1.1	58.1	4.6	7.70	-16.90	4.90	24.60		C	x	7	20.11.23	11:01:00	Susanne A	T. Reiche	Sobanski	18.0	3.00	0.04	1.2		y	y		y	y	SWR (steel wire rope)
ITP-2502		442710.700	5943162.400	533802.7888	80800.9069	-16.6	-21.1	4.5	70.8	5.7	2.00	-1.10	6.40	3.10		B	x	8	31.10.23	QA interpretation		E. Schwab						clear to 2m bg based on modelling		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2503		442797.400	5943163.400	533802.8552	80805.6260	-18.6	-22.1	3.5	468.1	37.4	23.20	-9.70	6.50	32.90		A	x	8	09.02.24	18:14:00	Susanne A	M. Kano	D. Panfil				2.0		n	n		y	y	object deeper than 2m below the sediment
ITP-2504a		442461.300	5943186.100	533803.4538	80747.3090	-12.5	-13.4	0.9	17.1	1.4	2.40	-3.30	3.30	5.70		C	x	7	20.11.23	17:47:00	Susanne A	T. Reiche	Sobanski	0.1	0.07	0.02	1.3		y	y	x	y	y	2 cm HE projectile
ITP-2504b		442460.200	5943186.000			-12.5	-13.4	0.9	17.1	1.4	2.40	-3.30	3.30	5.70		C	x	7	20.11.23	17:47:00	Susanne A	T. Reiche	Sobanski	20.0	0.80	0.50	1.3		y	y		y	y	scrap
ITP-2505		442674.900	5943196.300	533803.8715	80758.9355	-16.3	-18.1	1.7	16.0	1.3	2.10	-2.80	9.40	4.90		C		8																n	
ITP-2506		442601.900	5943197.400	533803.8783	80754.9608	-15.5	-15.7	0.2	72.6	5.8	26.60	-23.30	2.90	49.90		B	x	7	22.11.23	07:15:00	Susanne A	T. Reiche	Sobanski	1.0	0.80	0.02	0.2		y	y		y	y	SWR (steel wire rope)
ITP-2507		442761.500	5943200.000	533804.0253	80803.6474	-18.8	-18.8	0.0	50.8	4.1	22.30	-22.90	2.60	45.20		C	x	8	07.12.23	08:20:00	Susanne A	T. Reiche	aniak-Sk	1.0	0.80	0.02	1.1	as left survey completed on 08.12.2023	y	y		y	y	SWR (steel wire rope)
ITP-2508		442706.200	5943200.500	533804.0197	80800.6367	-16.8	-18.4	1.5	56.0	4.5	5.40	-7.20	4.80	12.60		C	x	8	01.12.23	09:20:00	HT01	D. Mirjanic		10.0	0.60	0.10	1.5		y	y		y	y	scrap
ITP-2509		442665.400	5943207.000	533804.2139	80758.4113	-16.1	-17.8	1.7	67.7	5.4	7.90	-6.20	5.00	14.10		C	x	8	01.12.23	09:00:00	HT01	D. Mirjanic		89.0	63.00	0.02	1.0		y	y		y	y	SWR (steel wire rope)
ITP-2510		442523.200	5943219.700	533804.5687	80750.6617	-15.1	-17.7	2.5	3066.2	245.3	229.40	-135.30	5.50	364.70		A	x	7	21.11.23	13:12:00	Susanne A	T. Reiche	Sobanski	1200.0	3.45	0.47	3.4		y	y		y	y	scrap
ITP-2511		442656.200	5943221.100	533804.6665	80757.9011	-16.2	-20.1	3.8	127.0	10.2	0.10	-4.70	9.80	4.80		B	x	8	01.12.23	09:00:00	HT01	D. Mirjanic		89.0	63.00	0.02	1.0		y	y		y	y	SWR (steel wire rope)
ITP-2512		442649.800	5943233.400	533805.0619	80757.5445	-16.1	-16.9	0.8	82.3	6.6	-0.40	-26.00	5.80	25.60		B	x	8	01.12.23	09:00:00	HT01	D. Mirjanic		89.0	63.00	0.02	1.0		y	y		y	y	SWR (steel wire rope)
ITP-2513		442644.800	5943241.000	533805.3059	80757.2673	-17.0	-19.1	2.1	204.3	16.3	0.50	-21.40	6.20	21.90		B	x	8	01.12.23	09:00:00	HT01	D. Mirjanic		89.0	63.00	0.02	1.0		y	y		y	y	SWR (steel wire rope)
ITP-2514		442603.200	5943244.000	533805.3865	80755.0006	-15.9	-20.0	4.1	398.2	31.9	4.40	-4.30	8.30	8.70		A	x	8	31.10.23	QA interpretation		E. Schwab						clear to 2m bg based on modelling, equal 1737		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2515		442703.300	5943248.000	533805.5554	80800.4473	-17.8	-17.8	0.0	7.5	0.6	5.00	-5.00	2.10	10.00		E		8																n	
ITP-2516		442640.800	5943249.600	533805.5825	80757.0438	-17.0	-17.1	0.0	38.3	3.1	13.00	-18.40	3.00	31.40		C		8																n	
ITP-2517		442631.800	5943264.300	533806.0546	80756.5441	-17.1	-18.2	1.0	188.3	15.1	82.90	-0.50	10.50	83.40		B	x	8	28.11.23	19:55:00	HT01	M. Kano		89.0	63.00	0.02	1.0		y	y		y	y	SWR (steel wire rope)
ITP-2518		442515.700	5943278.300	533806.4617	80750.2144	-15.1	-19.5	4.4	866.2	69.3	4.80	-3.50	13.30	8.30		A	x	7	31.10.23	QA Interpretation		E. Schwab						target depth model check > 3.5m, same as 1777		n		y	y	clear to 3.5m bg
ITP-2519		442670.400	5943285.000	533806.7396	80758.6317	-17.6	-17.6	0.0	3.4	0.3	2.80	-1.40	2.50	4.20		F		8																n	
ITP-2520		442713.100	5943322.400	533807.9665	80800.9315	-18.9	-19.6	0.7	71.5	5.7	21.60	-8.70	2.50	30.30		B	x	8	09.12.23	09:37:00	Susanne A	T. Reiche	aniak-Skorek				0.7		y	n		y	y	small objects dredged away by airlift
ITP-2521		442555.900	5943323.100	533807.9271	80752.3731	-16.2	-17.0	0.8	10.6	0.8	3.30	-1.50	3.60	4.80		D		8																n	
ITP-2522		442643.900	5943331.100	533808.2207	80757.1585	-17.8	-18.0	0.2	14.5	1.2	2.70	-6.20	3.10	8.90		D		8																n	
ITP-2523		442736.300	5943343.600	533808.6615	80802.1804	-19.1	-20.8	1.6	54.6	4.4	6.90	-3.70	4.40	10.60		C	x	8	09.12.23	10:16:00	Susanne A	T. Reiche	aniak-Sk	30.0	1.20	0.60	1.3		y	y		y	y	scrap
ITP-2524		442586.600	5943365.500	533809.3111	80754.0162	-17.4	-20.4	2.9	120.9	9.7	4.20	-5.70	6.60	9.90		B	x	8	10.02.24	06:58:00	Susanne A	M. Kano	D. Panfil				2.0		n	n		y	y	object deeper than 2m below the sediment
ITP-2525		442376.700	5943369.700	533809.3639	80742.5865	-14.3	-16.3	2.0	37.1	3.0	4.90	-1.30	4.60	6.20		C	x	7	08.11.23	08:36:00	Susanne A	M. Heinz	aniak-Sk	1.0	0.50	0.10	2.2		y	y		y	y	scrap
ITP-2526		442440.300	5943375.500	533809.5768	80746.0450	-14.8	-19.5	4.7	719.5	57.6	8.80	-8.20	8.10	17.00		A	x	7	31.10.23	QA Interpretation		E. Schwab						target depth model check > 3.5m, same as 1803		n		y	y	clear to 3.5m bg
ITP-2527		442649.900	5943398.400	533810.4005	80757.4405	-19.4	-19.4	0.0	45.6	3.7	24.60	-21.50	2.40	46.10		C		8																n	
ITP-2528		442583.500	5943411.300	533810.7917	80753.8170	-17.2	-17.9	0.7	41.5	3.3	7.80	-9.40	3.00	17.20		C		8																n	
ITP-2529		442575.200	5943417.200	533810.9793	80753.3613	-17.5	-20.3	2.8	94.6	7.6	2.50	-4.80	5.70	7.30		B	x	8	10.02.24	07:38:00	Susanne A	M. Kano	D. Panfil				2.0		n	n		y	y	object deeper than 2m below the sediment
ITP-2530		442492.100	5943418.300	533810.9820	80748.8365	-16.8	-16.8	0.0	6.2	0.5	2.90	-2.50	2.30	5.40		E		8																n	
ITP-2531		442327.300	5943422.500	533811.0527	80739.8619	-14.6	-15.0	0.4	10.5	0.8	5.30	-1.00	3.40	6.20		D		6																n	
ITP-2532		442507.500	5943429.800	533811.3602	80749.6672	-16.9	-17.2	0.3	8.4	0.7	1.00	-4.00	3.30	5.00		E		8																n	
ITP-2533		442668.700	5943431.100	533811.4659	80758.4422	-19.0	-19.0	0.0	2.4	0.2	2.00	-2.10	3.50	4.10		F		8																n	
ITP-2534		442655.700	5943433.400	533811.5352	80757.7330	-18.9	-19.5	0.6	28.9	2.3	9.00	-5.20	3.30	14.20		C		8																n	
ITP-2535		442427.600	5943436.000	533811.5292	80745.3133	-15.6	-17.4	1.7	66.3	5.3	6.90	-5.20	4.90	12.10		C	x	8	09.11.23	15:45:00	Susanne A	M. Heinz	aniak-Sk	5.0	1.20	0.20	0.5		y	y		y	y	metal bar
ITP-2536		442512.800	5943436.500	533811.5791	80749.9513	-16.8	-16.8	0.0	2.7	0.2	2.50	-2.70	1.30	5.20		F		8																n	
ITP-2537		442581.000	5943437.100	533811.6255	80753.6638	-17.4	-19.1	1.6	284.7	22.8	20.00	-31.60	4.70	51.60		B	x	8	10.12.23	11:28:00	Susanne A	T. Reiche	aniak-Sk	10.0	0.95	0.40	1.3		y	y		y	y	angle bar
ITP-2538		442332.400	5943444.600	533811.7697	80740.1248	-14.7	-18.8	4.1	5101.2	408.1	111.20	-118.30	6.80	229.50		A	x	6	11.12.23	11:03:00	Susanne A	T. Reiche	aniak-Skorek				2.0	same as 1818 11.12.2023 - After borehole detection major object detected at 3.2m.	y	n		y	y	object deeper than 2m
ITP-2539		442295.100	5943449.300	533811.9070	80738.0910	-14.6	-14.8	0.2	32.7	2.6	20.50	-5.90	3.00	26.40		C		6																n	
ITP-2540		442585.600	5943450.000	533812.0446	80753.9057	-17.6	-21.1	3.5	136.2	10.9	3.30	-4.40	7.80	7.60		B	x	8	12.02.24	09:13:00	Susanne A	M. Kano	D. Panfil				2.0		n	n		y	y	object deeper than 2m below the sediment
ITP-2541		442630.300	5943458.000	533812.3211	80756.3339	-18.6	-19.9	1.3	19.0	1.5	4.90	-1.50	5.50	6.40		C		8																n	
ITP-2542		442373.400	5943458.400	533812.2325	80742.3477	-15.0	-18.9	3.9	87.5	7.0	3.00	-1.80	7.00	4.80		B	x	7	31.10.23	QA Interpretation		E. Schwab						target depth model check > 3.5m, same as 1820		n		y	y	clear to 3.5m bg
ITP-2543		442291.900	5943460.700	533812.2746	80737.9092	-14.6	-15.4	0.8	238.1	19.0	30.90	-45.90	2.70	76.80		B	x	6	31.10.23	08:25:00	Susanne A	M. Heinz	aniak-Sk	8.0	0.42	0.10	1.2		y	y	x	y	y	10.5cm HE projectile
ITP-2544		442573.200	5943460.800	533812.3892	80753.2234	-18.1	-18.1	0.0	31.3	2.5	19.10	-16.40	2.40	35.50		C		8																n	
ITP-2545		442468.300	5943464.600	533812.4707	80747.5100	-16.9	-21.9	5.0	1361.5	108.9	4.40	-20.90	8.20	25.40		A	x	8	31.10.23	QA interpretation		E. Schwab						clear to 2m bg based on modelling		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2546		442283.500	5943465.200	533812.4168	80737.4489	-15.0	-15.1	0.0	14.3	1.1	2.60	-9.00	2.60	11.60		D		6																n	
ITP-2547		442300.900	5943479.700	533812.8929	80738.3865	-14.6	-14.7	0.1	183.1	14.6	18.60	-100.50	2.30	119.10		B	x	6	28.10.23	13:26:00	Susanne A	M. Heinz	Sobanski	8.0	0.55	0.18	1.0		y	y		y	y	tyre
ITP-2548		442560.800	5943484.000	533813.1349	80752.5329	-18.6	-18.6	0.0	17.1	1.4	39.50	-14.00	1.20	53.50		C		8																n	
ITP-2549		442418.300	5943485.300	533813.1206	80744.7741	-16.5	-18.2	1.7	351.2	28.1	71.00	-5.10	5.60	76.10		A	x	8	03.11.23	17:00:00	Susanne A	M. Heinz	aniak-Sk	100.0	1.50	0.50	1.0		y	y		y	y	scrap, boiler
ITP-2550		442551.900	5943496.900	533813.5488	80752.0398	-18.6	-19.7	1.1	50.9	4.1	8.80	-8.50	4.50	17.30		C	x	8	10.12.23	10:43:00	Susanne A	T. Reiche	aniak-Skorek				1.1		y	n		y	y	geology
ITP-2551		442606.800	5943507.300	533813.9069	80755.0217	-18.1	-19.5	1.4	308.0	24.6	35.50	-37.70	4.20	73.30		A	x	8	14.12.23	07:52:00	Susanne A	T. Reiche	Sobanski	20.0	1.20	0.11	2.3		y	y		y	y	scrap
ITP-2552		442567.200	5943531.000	533814.6581	80752.8501	-19.3	-23.9	4.6	952.2	76.2	34.00	0.80	9.50	33.20		A	x	8	31.10.23	QA interpretation		E. Schwab						clear to 2m bg based on modelling		n		y	y	target model well below 2m, clear to 2m below ground
ITP-2553		442602.100	5943539.100	533814.9340	80754.7447	-18.7	-19.5	0.8	15.1	1.2	3.50	-3.00	3.80	6.50		C		8																n	
ITP-2554		442558.800	5943543.000	533815.0430	80752.3848	-19.2	-21.1	1.9	161.0	12.9	14.00	-11.70	4.80	25.60		B	x	8	12.12.23	06:52:00	Susanne A	T. Reiche	aniak-Skorek				1.9		y	n		y	y	geology
ITP-2555		442606.400	5943552.300	533815.3627	80754.9701	-19.5	-19.5	0.0	108.3	8.7	41.90	-58.30	2.50	100.20		B	x	8	08.12.23	13:58:00	Susanne A	T. Reiche	aniak-Sk	5.0	0.40	0.20	0.4		y	y		y	y	scrap
ITP-2556		442468.300	5943557.600	533815.4796	80747.4481	-17.4	-21.3	3.9	4865.5	389.2	75.30	-57.40	10.20	132.70		A	x	8	07.12.23	14:15:00	HT01	D. Mirjanic				0.10	3.3		y	n		y	y	SWR (steel wire rope)
ITP-2557		442589.200	5943558.600	533815.5598	80754.0295	-19.5	-19.8	0.4	22.7	1.8	8.30	-6.60	3.70	14.90		C		8																n	
ITP-2558		442524.900	5943559.100	533815.5506	80750.5285	-18.9	-20.1	1.2	34.3	2.7	6.70	-4.00	4.30	10.70		C		8																n	
ITP-2559		442545.600	5943564.300	533815.7270	80751.6520	-18.9	-20.7	1.9	214.1	17.1	14.80	-28.20	5.50	42.90		B	x	8	12.12.23	06:10:00	Susanne A	T. Reiche	aniak-Sk	6.0	5.00	0.03	1.9		y	y		y	y	SWR (steel wire rope)
ITP-2560a		442538.900	5943581.200	533816.2711	80751.2760	-19.3	-22.3	3.1	363.1	29.1	0.40	-22.70	7.10	23.10		A	x	8	18.12.23	11:15:00	Susanne A	T. Reiche	Sobanski	25.0	6.00	0.03	1.3	As-left survey completed on 02.02.2024.	y	y		y	y	SWR (steel wire rope)
ITP-2561		442229.100	5943589.300	533816.4104	80734.4043	-14.1	-15.2	1.1	19.0	1.5	4.30	-1.60	3.90	5.90		C		6																n	
ITP-2562		442523.600	5943593.300	533816.6566	80750.4350	-19.2	-19.7	0.5	38.9	3.1	20.50	-5.90	4.20	26.30		C		8																n	
ITP-2563		442528.700	5943608.100	533817.1374	80750.7028	-19.2	-20.7	1.5	33.1	2.7	1.40	-4.60	4.90	6.00		C		8																n	
ITP-2564		442360.900	5943619.500	533817.4399	80741.5597	-16.8	-18.9	2.0	264.6	21.2	26.80	-15.60	4.80	42.40		B	x	8	05.11.23	17:36:00	Susanne A	M. Heinz	aniak-Sk	30.0	1.60	0.12	1.5		y	y		y	y	metal pipe
ITP-2565		442545.500	5943620.000	533817.5291	80751.6095	-19.4	-19.4	0.0	7.4	0.6	3.50	-3.10	2.80	6.50		E		8																n	
ITP-2566		442384.100	5943624.200	533817.6011	80742.8196	-17.1	-17.5	0.4	9.1	0.7	5.80	-1.70	5.30	7.50		E		8																n	
ITP-2567		442271.700	5943633.500	533817.8574	80736.6940	-15.1	-17.5	2.4	62.4	5.0	7.50	-3.90	4.40	11.40		C	x	8	11.12.23	11:48:00	Susanne A	T. Reiche	aniak-Sk	20.0	1.80	0.10	0.5		y	y		y	y	metal pipe
ITP-2568		442271.900	5943640.300	533818.0775	80736.7004	-15.5	-17.1	1.6	28.2	2.3	4.40	-1.90	6.40	6.30		C		8																n	

SeaTerra Geophysics & EOD Services GmbH

UXO / Metal Detection - Survey Result - Target List

Attachment No.:
File: 2023-035_Master Target List_v4_20240216
Proj. Manager: Edgar Schwab
Date: 16.02.2024

Client: IMDC, Van Immerseelstraat 66, 2018 Antwerp, Belgium
Location: South of Hooksiel
Project description: TES-WHV-VGN-FSRU Phase 1A – UXO Survey
Project name: 2023_035-D-NS-W-S-IMDC-Hooksiel-FSRU-2w
Survey area:

MAG Munitions Category		Statistics
A	(>300kg)	191
B	(70.1kg - 300kg)	327
C	(15.1kg-70kg)	673
D	(10.0kg-15kg)	192
E	(5kg - 9.9kg)	210
F	(<5kg)	159
Sum		1752

Model Depth	Statistics	in Percent
0 - 0.05 m	425	24.3%
> 0.05 m - 0.5 m	304	17.4%
> 0.5 m - 1.0 m	308	17.6%
> 1.0 m - 1.5 m	255	14.6%
> 1.5 m - 2.0 m	161	9.2%
> 2.0 m - 2.5 m	87	5.0%
≥ 2.5 m	212	12.1%
Sum	1752	100.0%

	total		finsihed	open	
	45	Prio1:	45	0	targets piling area
	56	Prio 2:	56	0	bearthing zone
	393	Prio 3.1:	393	0	dredge area target depth SKN <=15.5
	47	Prio 3.2:	47	0	barge area
	59	Prio 3.3:	59	0	dredge area safety zone
	229	Prio 4:	229	0	pipe routes
	31	Prio 5:	31	0	outside
>50 kg	43	Prio 6:	43	0	post dredge survey to max depth 2m
>10 kg	74	Prio 7:	74	0	not dredged survey
>50 kg	72	Prio 8:	72	0	outside 15m water line / WSA to max depth 2m
	1049		1049	0	

Clear Status:

y	UXO clear
n	ferrous target / not clear
n	confirmed UXO not clear
w	target not cleared but below depth threshold
y	target not cleared above depth threshold

M ITP	SSS Contact	UTM zone 32N/ETRS 89		WGS84		SKN water	target	model		magn.	max	min	dist	p-p	ITP	munition	in/out	Priotity	date	time of	vessel	EOD	GEO	weigHT0	length	width/	depth	TR	found	salvage	UXO	clear	clear	inspection results
No.	No.	East	North	Latitude	Longitude	depth	depth SKN	depth b. g.	weigt	moment			max-min	max-min	notes	category	scope	area	inspection	clearance						diameter	b. ground	comment					QA	
		(mE)	(mN)	(deg, min,sec)		(m)	(m)	(m)	(kg)	(Am²)	(nT)	(nT)	(m)	(nT)	ST-Project No.		(in=x)							(kg)	(m)	(m)	(m)		(y/n)	(y/n)	(X)	(y,n, w)	(y/n)	
ITP-2569		442451.200	5943652.400	533818.5401	80746.4540	-18.7	-20.8	2.1	70.8	5.7	6.40	-3.80	3.70	10.20		B	x	8	16.12.23	21:38:00	Susanne A	T. Reiche	s. Sobanski					2.0		y	n		y	y	target dredged to 2m depth, signal and target deeper >2m
ITP-2570		442502.400	5943653.500	533818.5960	80749.2407	-19.1	-19.2	0.0	9.9	0.8	6.00	-2.80	2.10	8.80		E		8															n	
ITP-2571		442480.500	5943690.800	533819.7941	80748.0236	-19.3	-19.8	0.5	22.8	1.8	4.70	-5.80	3.30	10.50		C		8															n	
ITP-2572		442452.000	5943697.600	533820.0029	80746.4674	-19.1	-20.5	1.3	37.0	3.0	7.70	-2.20	3.90	9.90		C		8															n	
ITP-2573		442317.200	5943718.600	533820.6289	80739.1144	-16.9	-17.1	0.3	23.2	1.9	9.50	-7.30	4.20	16.80		C		8															n	
ITP-2574		442371.500	5943722.800	533820.7863	80742.0679	-18.2	-20.4	2.1	810.8	64.9	32.70	-74.30	4.40	107.00		A	x	8	30.11.23	15:15:00	Susanne A	M. Heinz	aniak-Sk	40.0	6.00	0.05	2.2		y	y		y	y	metal pipe
ITP-2575		442261.200	5943744.000	533821.4285	80736.0485	-16.5	-17.4	0.9	9.5	0.8	1.80	-1.40	3.70	3.20		E		8															n	
ITP-2576		442438.700	5943745.400	533821.5441	80745.7115	-19.2	-19.6	0.4	20.7	1.7	1.00	-8.00	3.20	8.90		C		8															n	
ITP-2577		442408.600	5943747.200	533821.5905	80744.0715	-19.0	-19.1	0.1	13.3	1.1	8.50	-2.60	2.30	11.10		D		8															n	
ITP-2578		442386.000	5943750.000	533821.6721	80742.8392	-18.6	-19.4	0.8	17.7	1.4	6.70	-1.60	4.40	8.30		C		8															n	
ITP-2579		442355.800	5943750.500	533821.6763	80741.1946	-18.3	-18.3	0.0	2.0	0.2	1.60	-6.10	1.30	7.70		F		8															n	
ITP-2580		442454.300	5943756.500	533821.9095	80746.5534	-19.3	-19.9	0.5	61.0	4.9	3.00	-20.40	3.30	23.40		C	x	8	03.12.23	17:12:00	Susanne A	T. Reiche	aniak-Sk	3.0	0.35	0.10	0.5		y	y		y	y	scrap
ITP-2581		442432.100	5943763.600	533822.1304	80745.3400	-19.3	-19.3	0.0	10.4	0.8	5.50	-6.40	2.40	11.90		D		8															n	
ITP-2582		442357.600	5943766.600	533822.1979	80741.2819	-18.4	-19.0	0.6	19.4	1.6	2.40	-6.60	4.20	8.90		C		8															n	
ITP-2583		442363.900	5943785.600	533822.8152	80741.6122	-18.5	-20.3	1.8	126.0	10.1	12.80	-10.60	3.90	23.40		B	x	8	11.11.23	11:51:00	Susanne A	T. Reiche	aniak-Sk	3.0	0.85	0.04	2.2		y	y		y	y	Steel wire rope
ITP-2584		442346.400	5943800.200	533823.2806	80740.6497	-18.5	-20.1	1.6	197.5	15.8	20.60	-19.60	4.10	40.30		B	x	8	28.11.23	19:41:00	Susanne A	M. Heinz	. Sobans	4.0	1.20	0.04	1.8		y	y		y	y	SWR (steel wire rope)
ITP-2585		442446.500	5943803.600	533823.4303	80746.0974	-19.4	-19.5	0.1	8.9	0.7	3.40	-2.90	3.70	6.20		E		8															n	
ITP-2586		442406.700	5943808.400	533823.5698	80743.9272	-19.3	-20.3	1.0	40.6	3.3	13.90	-2.60	4.80	16.40		C		8															n	
ITP-2587		442410.200	5943857.100	533825.1469	80744.0853	-19.8	-23.5	3.7	3201.6	256.1	-1.90	-159.40	16.00	157.60		A	x	8	14.02.24	10:35:00	Susanne A	M. Kano	D. Panfil	10.0	3.00	0.04	1.2	As left survey still pending. Completed on 15.02.2024	y			y	y	SWR (steel wire rope)
ITP-2588		442297.100	5943859.600	533825.1829	80737.9259	-18.5	-21.2	2.6	212.7	17.0	11.60	-9.80	6.90	21.50		B	x	8	03.12.23	16:32:00	Susanne A	T. Reiche	aniak-Skorek				2.6		y	n		y	y	geology
ITP-2589		442389.300	5943889.100	533826.1739	80742.9261	-19.5	-20.7	1.2	25.2	2.0	4.50	-3.10	3.40	7.60		C		8															n	
ITP-2590		441706.400	5942012.500	533725.1849	80707.0107	-4.8	-8.3	3.5	688.8	55.1	8.40	-15.10	14.40	23.60		A	x	4	29.10.23	06:15:00	Susanne A	M. Heinz	. Sobanski				3.5		y	n		y	y	Target dredged to 3.5m depth, signal and target deeper >3.5m
ITP-2591		441712.800	5942046.500	533726.2876	80707.3361	-5.0	-6.9	1.9	176.0	14.1	14.60	-13.70	6.20	28.30		B	x	4	26.10.23	11:58:00	Susanne A	M. Heinz	. Sobanski				3.5		y	n		y	y	Target dredged to 3.5m depth, signal and target deeper >3.5m
ITP-2592		441822.100	5942077.400	533727.3311	80713.2639	-5.9	-7.6	1.7	146.3	11.7	13.40	-11.50	9.90	24.90		B	x	4	27.10.23	19:15:00	Susanne A	M. Heinz	. Sobanski				3.5		y	n		y	y	Target dredged to 3.5m depth, small object dredged away
ITP-2593		441846.400	5942081.900	533727.4864	80714.5834	-5.8	-8.5	2.7	99.9	8.0	4.30	-4.70	8.20	9.10		B	x	4	28.10.23	07:29:00	Susanne A	M. Heinz	. Sobans	0.2	0.10	0.06	3.5		y	y		y	y	layer of the slag
ITP-2594		441879.300	5942135.100	533729.2208	80716.3382	-6.4	-6.4	0.0	12.9	1.0	49.50	-21.90	1.30	71.40		D	x	4	24.10.23	15:17:00	HT08	K. Orth	). Mikute	4.0	1.00	0.10	0.5		y	y		y	y	hose
ITP-2595		442082.200	5942381.400	533737.2707	80727.2162	-8.2	-10.8	2.6	32.3	2.6	8.90	-2.70	5.70	11.50		C	x	4	24.10.23	14:44:00	HT08	K. Orth	). Mikute	8.0	2.50	0.03	2.5		y	y		y	y	SWR (steel wire rope)
ITP-2596		440940.300	5942445.700	533738.8919	80625.0206	-0.4	-3.1	2.7	147.1	11.8	13.10	-10.80	5.20	24.00		B	x	4	01.11.23	15:15:00	HT08	M. Kano	). Mikute	320.0	49.00	0.05	3.2		y	y		y	y	SWR (steel wire rope)
ITP-2597		440944.800	5942464.000	533739.4858	80625.2530	-0.4	-3.5	3.1	700.0	56.0	13.70	-11.10	12.70	24.80		A	x	4	22.11.23	18:00:00	HT01	M. Kano					3.0	Steel wire rope not possible to recover	y	n		y	y	SWR (steel wire rope)
ITP-2598		440961.200	5942500.300	533740.6670	80626.1208	-0.6	-3.2	2.6	94.1	7.5	4.10	-5.50	7.40	9.60		B	x	4	22.11.23	19:00:30	HT01	M. Kano					3.0	Steel wire rope not possible to recover	y	n		y	y	SWR (steel wire rope)
ITP-2599		441037.500	5942525.600	533741.5165	80630.2566	-0.9	-2.7	0.0	6.8	0.5	17.40	-2.20	2.70	19.60		E		4															n	
ITP-2600		441085.000	5942568.900	533742.9367	80632.8125	-1.0	-2.1	1.1	7.0	0.6	4.20	-4.90	2.30	9.10		E		4															n	
ITP-2601		441177.400	5942572.000	533743.0744	80637.8397	-1.1	-5.0	3.9	442.0	35.4	8.20	-9.80	10.50	18.00		A	x	4	09.11.23	QA interpretation		E. Schwab						QA clear, target >3.5m bg		n		y	y	QA clear, target >3.5m bg
ITP-2602		441512.100	5942712.300	533747.7487	80655.9627	-9.0	-10.3	1.4	34.1	2.7	6.30	-7.50	4.10	13.80		C	x	4	25.10.23	15:52:00	HT08	K. Orth	). Mikute	2.0	0.20	0.05	1.4		y	y		y	y	bolt
ITP-2603		441432.900	5942734.700	533748.4416	80651.6365	-9.3	-9.3	0.0	67.9	5.4	161.30	-93.20	2.00	254.50		C	x	4	25.10.23	16:28:00	HT08	K. Orth	). Mikute	5.0	1.60	0.03	1.6		y	y		y	y	SWR (steel wire rope)
ITP-2604		441396.700	5942737.100	533748.5047	80649.6644	-9.3	-11.0	1.7	72.5	5.8	11.30	-38.70	3.30	50.00		C	x	4	25.10.23	17:03:00	HT08	K. Orth	). Mikute	15.0	1.00	0.04	1.7		y	y		y	y	metal pipe
ITP-2605		441485.800	5942756.900	533749.1812	80654.5009	-9.2	-9.2	0.0	24.7	2.0	25.50	-36.40	1.90	62.00		C	x	4	25.10.23	15:29:00	HT08	K. Orth	). Mikute	1.0	0.35	0.02	1.2		y	y		y	y	metal bar
ITP-2606		441605.300	5942786.900	533750.1999	80700.9853	-10.4	-11.7	1.3	16.1	1.3	7.10	-10.90	4.50	18.00		C	x	4	18.10.23	09:30:00	HT08	K. Orth	). Mikuteit				3.5		n	n		y	y	no signal found - cleared up to 3.5 m below surface
ITP-2607		441718.300	5942852.000	533752.3515	80707.0924	-9.4	-10.5	1.2	26.6	2.1	10.60	-7.00	9.60	17.60		C	x	4	23.10.23	14:03:00	HT08	K. Orth	). Mikute	1500.0	1.10	1.00	2.5		y	y		y	y	anchor stone
ITP-2608		441771.400	5942876.700	533753.1719	80709.9662	-7.2	-9.3	2.0	154.3	12.3	8.20	-20.10	4.70	28.30		B	x	4	18.10.23	10:30:00	HT08	K. Orth	). Mikuteit				3.5		n	n		y	y	no signal found - cleared up to 3.5 m below surface
ITP-2609		441707.700	5942882.900	533753.3470	80706.4945	-9.4	-10.7	1.3	17.5	1.4	9.70	-8.10	2.50	17.80		C	x	4	23.10.23	12:58:00	HT08	K. Orth	). Mikute	8.0	0.60	0.15	2.2		y	y		y	y	ratchet tensioner
ITP-2610		441625.290	5942419.020	533738.3052	80702.3219	-9.6	-9.9	0.3	19.8	1.6	30.79	-12.84	1.50	43.63		C	x	4	02.02.24	17:28:00	Susanne A	M. Kano	G. Maric				0.3		y	n		y	y	geology
ITP-2611		441738.500	5942457.210	533739.5863	80708.4580	-10.3	-10.3	0.0	7.0	0.6	35.16	-20.34	1.73	55.50		E		4			Susanne A												n	
ITP-2612		441795.180	5942489.380	533740.6498	80711.5214	-11.0	-11.0	0.0	803.3	64.3	961.04	-2175.07	1.81	3136.11		A	x	4	04.02.24	11:38:00	Susanne A	M. Kano	G. Maric	67.0	1.00	1.00	1.5		y	y		y	y	tyre
ITP-2613		441869.610	5942566.500	533743.1748	80715.5207	-8.9	-9.1	0.2	137.9	11.0	1871.19	-1241.09	0.82	3112.27		B	x	4	04.02.24	12:15:00	Susanne A	M. Kano	G. Maric	12.0	1.00	0.06	0.3		y	y		y	y	metal pipe
ITP-2614		441921.550	5942581.180	533743.6705	80718.3380	-9.6	-9.8	0.2	115.1	9.2	192.62	-151.13	1.97	343.75		B	x	4	08.02.24	11:58:00	Susanne A	M. Kano	D. Panfil	4.0	1.40	0.04	0.2		y	y		y	y	SWR (steel wire rope)
ITP-2615		441931.400	5942559.230	533742.9642	80718.8889	-8.7	-8.8	0.1	357.9	28.6	295.80	-1267.84	1.56	1563.64		A	x	4	08.02.24	11:05:00	Susanne A	M. Kano	D. Panfil	16.0	2.40	0.04	0.2		y	y		y	y	SWR (steel wire rope)
ITP-2616		441931.460	5942561.020	533743.0222	80718.8910	-9.0	-9.2	0.2	44.8	3.6	321.98	-1145.17	0.63	1467.14		C	x	4	08.02.24	11:15:00	Susanne A	M. Kano	D. Panfil	16.0	2.40	0.04	0.2		y	y		y	y	SWR (steel wire rope)
ITP-2617		441637.170	5942456.370	533739.5185	80702.9433	-7.6	-8.4	0.8	196.2	15.7	110.90	-103.10	2.22	214.03		B	x	4	04.02.24	06:27:00	Susanne A	M. Kano	G. Maric	27.0	1.00	0.10	1.2		y	y		y	y	metal pipe
ITP-2618		441847.170	5942573.100	533743.3793	80714.2949	-9.4	-9.6	0.2	8.8	0.7	78.10	-37.80	1.61	115.92		E		4															n	
ITP-2619		441973.820	5942613.660	533744.7422	80721.1613	-11.0	-11.0	0.0	31.8	2.5	39.67	-153.95	1.26	193.62		C	x	4	11.02.24	07:48:00	Susanne A	M. Kano	D. Panfil				2.2		y	n		y	y	small strongly magnetic object dragded away by the airlift
ITP-2620		441981.410	5942646.300	533745.8013	80721.5525	-7.7	-7.7	0.0	11.4	0.9	34.71	-34.37	1.34	69.08		D	x	4	11.02.24	13:54:00	Susanne A	M. Kano	D. Panfil	1.0	0.30	0.05	0.0		y	y		y	y	scrap
ITP-2621		441999.250	5942645.290	533745.7758	80722.5243	-7.9	-10.7	2.8	253.3	20.3	34.71	-14.09	4.84	48.80		B	x	4	11.02.24	14:28:00	Susanne A	M. Kano	D. Panfil				2.4		y	n		y	y	geology
ITP-2622		442044.190	5942684.330	533747.0568	80724.9442	-8.1	-10.1	2.0	83.0	6.6	13.23	-13.35	3.84	26.58		B	x	4	12.02.24	14:44:00	Susanne A	M. Kano	D. Panfil				1.5		y	n		y	y	geology
ITP-2623		442089.350	5942706.650	533747.7970	80727.3874	-10.4	-11.2	0.8	87.6	7.0	49.01	-47.09	2.66	96.09		B	x	4	12.02.24	15:21:00	Susanne A	M. Kano	D. Panfil				0.8		y	n		y	y	geology
ITP-2624		442107.420	5942654.520	533746.1175	80728.4059	-11.6	-11.6	0.0	40.5	3.2	43.43	-86.51	1.52	129.94		C	x	4	13.02.24	15:15:00	Susanne A	M. Kano	D. Panfil	60.0	1.12	0.20	0.5		y	y		y	y	tyre
ITP-2625		442221.200	5942690.220	533747.3178	80734.5753	-9.4	-10.3	0.9	61.0	4.9	12.72	-37.45	3.27	50.17		C	x	4	14.02.24	16:00:00	Susanne A	M. Kano	D. Panfil				0.8		y	n		y	y	geology
ITP-2626		442105.930	5942679.370	533746.9209	80728.3082	-13.6	-14.4	0.8	26.4	2.1	21.81	-11.18	3.14	32.99		C	x	4	13.02.24	15:51:00	Susanne A	M. Kano	D. Panfil	68.0	1.00	0.30	0.5		y	y		y	y	tyre