## **MINUTES of EDTC 2023 ANNUAL MEETING**

## Breda, The Netherlands



**Place**: Hotel de Keyser Breda **Date**: 28-29 September 2023

#### **AGENDA**

28th Septemb	oer 2023, Thursday, Hotel de Keyser Breda	
15:45-23:00	Hytech-Pommec Visit / Dinner	Members & Guests
29th Septemb	er 2023, Friday, Hotel de Keyser Breda	
09.00-09.30	Registration	
09:30-09:35	Welcome	Chairman, Jörn Ryberg
09:35-10:00	Introductory Presentations by Host Country	Host NADO
	and Safety and Security Information	
10:00-10:15	EDTC Admin Matters, Apologies EDTC	Secretary, Akın S .Toklu
	Membership Summary	
	Treasurer Report	Treasurer, Phil Crombie
10:15-10:45	Chairman's Report	
	Summary of Actions from 2019	
10:45-11:15	COFFEE BREAK	
11:15-12:30	Work Groups Activity	All
12:30-13:30	LUNCH	
13:30-13:50	Reports from the Med. Subcommittee	Jurg Wendling
13:50-16:30	National Reports	Members
16:30-17:00	COFFEE BREAK	
17:00-17:20	Elections	All

17:20-17:50	Any Other Business, Next Meeting	All
17:50-18:00	Closing remarks	Chairman Jörn Ryberg
30 <sup>th</sup> September 2023, Saturday		
10:00-14:00	Visit to DCN	

THOSE PRESEN	т		
I HUSE PRESEN	ı		
HOST			
Robin Knook	THE NETHERLANDS		
EXECUTIVE BOARD			
Name:	Representing:	Note:	
Jörn Ryberg	SWEDEN	Chairman	
Akin Savas Toklu	TURKEY	Secretary	
Phil Crombie	UK	Treasurer	
Jean Lelievre	FRANCE	Member Executive Boar	rd
Jurg Wendling	SWITZERLAND	Member Executive Boar	rd
PARTICIPANTS	COUNTRY	PARTICIPANTS	COUNTRY
Amanda Sordes	Australia	jurg wendling	Switzerland
Roland Vanden Eede	Belgium	Maurice Schlauri	Switzerland
Tracy Childs	Belgium	Leo Lagarde	Leo Lagarde
David Parkes	Canada - DCBC	Adraen Winckers	The Netherlands
Margo Purru	Estonia	Carin Bot	The Netherlands
LELIEVRE Jean	France	Cees Noordhoek	The Netherlands
Hélène SZULC	France	Cornelis Segaar	The Netherlands
Ing. Giuseppe Petrone	Italy	Erwin Helderman	The Netherlands
Massimo Becherucci	Italy	John Smit	The Netherlands
Pasquale Longobardi	Italy	Jur van Kasteren	The Netherlands
Rolf Roessland	Norway	Marchel Werkman	The Netherlands
Ulrik Jünge	Norway	Maurice Krul	The Netherlands
Bjarte Rødne	Norway	Nico Vink	The Netherlands
Leif Morten Rasch	Norway	Pieter-Jan van Ooij	The Netherlands
Martin Heer	Norway	Robin Knook	The Netherlands
Rolf Roessland	Norway	Tjeerd v. Rees Vellinga	The Netherlands
	1	'	
Joar Gangenes	Norway	Murat Egi	Turkey
Bogdan Cristian Ion	Romania	Zubeyir Ali Uzunoglu	Turkey
Jabulile Mhlophe	South Africa	Akin Savas Toklu	Turkey
Bulelwa Huna	South Africa	Phil Crombie	United Kingdom
Nozi Maphoto	South Africa	Peter Sieniewicz	United Kingdom
Daniel Larsson	Sweden	Ali Macleod	United Kingdom
Mats Hagberg	Sweden	Peter Sieniewicz	United Kingdom
Jörn Ryberg	Sweden	Taira Caton	United Kingdom
APOLOGIES FOR ABSE	NCE		
MEMBERS	COUNTRY	MEMBERS	COUNTRY
Thomas Gaisberger	Austria	Vitalijs Zaharovs	Latvia
Hans Cuylits	Belgium	Øyvind Loennechen	Norway
Pavel Macura	Czech rep.	Jacek Kot	Poland
Mark Caney	EUF Observer	Veronika Rybárová	Slovakia
Tomi Wuorimaa	Finland	Jack Meintjes	South Africa
Eric Saint-Sulpice	France	Andreas Achermann	Switzerland
Eric Albier	France	Steve Forman	United Kingdom
Jennifer Mayer	Germany	Philip Bryson	United Kingdom
Frank Werner	Germany		

#### **WELCOME ADDRESS**

The Chairman Jörn Ryberg opened the EDTC 2023 meeting welcoming members. He thanked the host, Robin Knook and other people from NADO, for organizing the Annual Meeting in Breda and invited Robin Kook to give an introduction along with safety and security information. Robin Knook welcomed all members and guest to the meeting and gave safety information about the venue. He invited Erwin Helderman for national report for The Netherlands that included in "National Reports" title below. Akin S. Toklu, EDTC Secretary, was then invited to make his presentation on admin matters, apologies for not being participated in the meeting and EDTC Membership Summary.

#### **EDTC ADMIN MATTERS**

The Secretary, Akin S. Toklu informed members about the previous meetings noting the date and place of EDTC annual meetings. He listed the countries that are represented in EDTC but haven't organized any EDTC Annual Meetings. These countries were Finland, Germany, Latvia, Lithuania, Montenegro, Slovak Republic and Slovenia. He added that the host for EDTC 2024 Meeting will be announced during the closing remarks. Secretary noted that 25 countries and 6 organization are represented in EDTC and stated that there are 9 correspondent members. He pointed out the "members area" in the EDTC website and shared the password for entering. He asked all members to check their contact details and let him know if a revision needed. He showed the list of members who sent apologies for not being able to participate to the meeting and listed the name and countries of the participants as seen in Annex 1. He listed new EDTC members as; Allan H. E. Schütt replaced Knud-Helge Andreasen for Denmark, Jennifer Mayer replaced Claus Mayer for Germany and Rolf Røssland replaced Joar Gangenes for Norway, in industry category. Jurg Wendling reminded secretary another new member, Maurice Schlauri, for Switzerland in industry category. Secretary added his name to the list. Then secretary gave information about the number of the country represented in EDTC, the number of the members and their categories, the vacant positions for each category as seen in Annex 1. He showed the occupancy rates for four categories stating that the most occupied categories were Industry and Medicine with 80 % occupancy. He finished his report after listing the names of the members nominated for EDTC Board member election. See detail in Annex 1. He invited treasurer Phil Crombie to give a report.

Phil Crombie stated that the EDTC balance is approximately 23.700 Euros. He noted that he could accept membership fees as cash during the meeting. He explained the purpose of balance is to contribute towards host costs and to cover some strategic expenses such as inviting important guests. He reminded members to make clear their country and representative when making any bank transfers. He also reminded that additional 50 Euros should be paid if there is a guest for dinner. See Annex 2.

#### CHAIRMAN'S REPORT

The Chairman, started his report by stating that the importance of collaboration was talked before and he indicated the theme of his report as "time for unity". He listed the titles included in his report and first explained EDTC profile. He stated that EDTC is a not-for-profit organization formed 1973 and represented by 25 European (geographical) countries. He added new members from several countries joined to the organization in 2023.

He described purpose of the organization and added detail about representation. He listed the methods for reaching the aim of EDTC as independent European forum, discussions, standards and guidance. He introduced the board members and the activities and achievements of the Board during 2022 / 2023 as seen in Annex 3. He noted there is no women in the Board and stated there is room for them to welcome to the Board.

Chairman emphasized the importance of the meetings done with The Senior Labour Inspectors' Committee (SLIC) in EC and EU parliament politicians. The Chairman has given some figures regarding fatal diving accidents and added the statistics of fatal diving accidents in diving industry and governmental information are poor. He noted the data for fatal diving accidents was collected

by voluntary individuals. He regarded the fatality rate is not acceptable. Chairman has given an example for non-safe diving method, which was diving with hookah, form Greece. He also mentioned about the problem of SCUBA diving in commercial diving in Chile and Canada.

Chairman mentioned about the two inventory works done by EDTC and added that SLIC has formed a workgroup, DIVEX that will work on differences in regulations among EU countries. He showed the template of the questionnaire DIVEX prepared. and Chairman informed the members that SLIC cooperated with EDTC, and the workgroups will be formed and work on the questionnaire to help to SLIC, during EDTC meeting. He introduced the questionnaire to the members. Chairman gave the detail about the inventory previously done by EDTC and stated that the inconsistency within Europe shows the need for creating a common minimum standard. SLIC invited EDTC to their workgroup DIVEX to share EDTC's results. He stated that the chairman of the workgroup DIVEX was thankful to EDTC for sharing the results of the inventory work previously done and assisting to DIVEX.

Chairman noted that one of the jobs of EDTC trying to get politicians to be able to understand the situation. Chairman informed the members about three questions sent to EC (See Annex 3) and stated that EC had not implemented diving within EU Strategic Framework on Health and Safety at Work for the coming period, that means within seven years. He stated that "decent work" which is a fundamental requirement for diving as a profession, was included in The Sustainable Development Goals of United Nations. He added responsibility for decent work is shared by employers and employees.

He stated that while offshore Oil & Gas industry has developed significantly and been practicing safe diving, almost all fatalities within the industry comes from in-shore/near-shore sector. Much of the responsibilities are brought to the employers but also employees have the responsibility to stop working at unsafe conditions. He informed the members that EDTC Board suggested to create two different new subcommittees, one will include employers and the other will include employees, to clarify the situation and bring these to politicians.

Chairman made a self-criticism since EDTC used technical terms such as umbilical, saturation tables, wet bell etc. that cannot be understood by politicians. He suggested using very simple principals while approaching the politicians. Chairman has given the example of "drivers license" and "full drivers license" for "dive training" and "vocational training." He stated that an individual should be trained to dive in a safe manner first, then be trained to perform and conduct the actual works, in a competent and safe manner.

Chairman emphasized the importance of unity for employers and employees and has described the "principle of the house" seen in Annex 3. He stated that while the foundation of the house includes "basic certification for diving"," EU directive and basic guidance" is missing. Then code of practices is placed above the foundation, then National law & regulations comes. Chairman suggested that EDTC can go into politicians world, unite, present the demands thru the two subcommittees suggested by the Board , by using the non-profit organization as an umbrella. He asked the members if there is anyone who has different point of view other than creating subcommittee. Murat Egi mentioned about EU project funds and Erasmus program. Chairman repeated his question before he finished his report and asked again if there is any member with in the assembly do object to the idea of creating subcommittee. There was no member who had objection to the idea. Chairman finished his report. See Annex 3 for detail.

#### **WORK GROUPS ACTIVITY**

Chairman informed the members again EDTC has received the questionaries from the workgroup DIVEX in SLIC and introduced the template. Since the questions should be answered on national basis, members from each nation should come together and answer the online questionaries. Secretary showed the interfaces of the online questions and described the method. The questions are seen in Annex 4. Akin Toklu shared the link for online questionaries. Time was given to each workgroup to fill the for questionaries. Akin Toklu shared the statistics after all subgroups

answered the questionaries. Charmain stated that he will share the result with SLIC. See Annex 5 for the results.

#### REPORT FROM THE MEDICAL SUBCOMMITTEE

Jürg Wendling, the chairman of EDTC Medical Subcommittee stated that subcommittee members came together and made a meeting during the EUBS Meeting in Porto, Portuguese on 14.09.2023 with the participations of nine members and ten corresponding members and guests. He gave an update regarding the progress on revision of Fitness to Dive Manual and mentioned about final discussions on three topics. He added he is in contact with IMCA for the financial support for printing the book. He added Akin Toklu provided a proposal from a company in Turkey for publishing the book. He noted the book will be a publication of EDTC and the names Jean-Louis Méliet, Jack Meintjes and Roland vanden Eede will be added to the editors list of the first edition. He continued his report giving updates about DMAC and Diving Doctors Databank: DIVEMEDREG.ORG. He finished his report informing the members regarding the plan for the revision of EDTC-ECHM educational and training standards for diving and hyperbaric medicine 2011. See the detail in Annex 6.

#### **NATIONAL REPORTS**

#### FRANCE (Hélène SZULC)

Hélène SZULC started his report announcing the new chairman for National Union of Underwater Contractors, Arnaud LAVAL who is a commercial divers Cl II-A from the company SATIF-SA. Then she gave number about fatalities and serious accidents occurred in France between 2018 and 2023, with yearly distribution and typology as seen in Annex 7. She noted that underwater works certification became mandatory since 2020 for both public or private organizations that realizes hyperbaric works in France. She listed three commercial diving training center are functional in France, INPP, ENS and CAP-AFPA, which give two mandatory certifications; Certificat d'Aptitude à l'hyperbarie Classe II mention A and Titre Professionnel Scaphandrier des travaux publics. She informed the members regarding the events related to commercial diving in 2023. See Annex 7.

#### ITALY (Massimo Becherucci, Pasquale Longobardi)

Massimo Becherucci presented the result of analysis of operational activity of Italian scuba rescue diver (Fire Fighter) during the period of 2019-2020. He reported underwater and aquatic rescue service was given 24/7 by operational capacity up to 50 meters in air and to 80 meters in trimix, underwaters instrumental research systems, search and rescue with helicopter. Rescue service was given in caves and similar environments with scuba and surface supplied dive systems. He listed operational units as 24 Underwater and Aquatic Rescue Units (NSSA), 1 national diver training center (CAS) and 1 Central Directorate for Emergency. He noted the total number of divers was 406. He added advanced cave diving techniques, integrated underwater instrumental research (ROV, SSS, DIDSON) techniques and technical diving with scuba are used for the operation. He gave detail about scuba and surface supplied dive system units and their operational capacity as seen in Annex 8. He noted the number of total operational activities 12213 and detailed according to the place, time and yearly distribution. He showed activities on the maps geographically and gave the statistics about number of people and vehicle involved duration of the operations and incidence of the operating activity. He finished his presentation reporting only one accident during the activities, no fatality at all, and the average hours of diving per year is 8000. See the detail in Annex 8.

Pasquale Longobardi shared the historical developments and updates of working diving regulations in Italy. He started from 1959 and stated that professional diving poorly regulated until 2011. He introduced The Bill number 1161/2023 on discipline of diving and hyperbaric activities. He detailed several chapters and added that FTD exams in Italy is performed by the physicians who have been graduated from a DMAC-approved training course and meets the recommendations of the EDTC medical subcommittee. In the Caper II of The Bill, it was stated that technical committee for diving and hyperbaric activities should include medical representative

member for Italy in EDTC. He finished his report announcing the Bill will be presented to public during a diving activity fair that will be held in Bologna, on 15<sup>th</sup> October 2023. See detail in Annex 9.

#### NORWAY (Ulrik Jünge, Martin Heer, Leif Morten Rasch, Joar Gangenes and Rolf Rossland)

Ulrik Jünge stated that national report for Norway would include 5 presentations. First one will be his presentation representing Norwegian Petroleum Safety Authority, second one will be presented by Martin Heer representing Labour Inspection Authority, third one will be presented by Leif Morten Rasch representing Workers Union, and the last two will be done by Joar Gangenes and Rolf Rossland representing offshore and inshore industries. He stated that there will be animation at the end of the presentations. He added that they will make the national reports in this way since they are in close collaboration. Ulrik Jünge noted that The Petroleum Safety Authority Norway (PSA) is changing its name with effect from 1 January 2024 to the Norwegian Ocean Industry Safety Authority. He added that they are reporting to the Ministry of Petroleum and Energy instead the Ministry of Labour and Social Inclusion since May 2023. He gave detail regarding their responsibilities as seen in Annex 10. He gave information about education of divers and dive supervisors and shared statistics regarding certification numbers from NYD, HVL. He stated there was no accident, but 6 minor incidents reported during offshore diving operations including land-based facilities in 2023. He added there has been no fatality since 1987. He reported updated legislation will be at public hearing late autumn 2023 and added there was no any other changes in existing Petroleum regulations. He shared the number of diving activities in Norway under the PSA during 2022 and 2023 and result of questionnaire-based survey of divers (RNNP) which was published. The link for the report was shared in the presentation. He finished his presentation after listing ongoing projects and activities of PSA and the focused areas for the next year. See the detail in Annex 10.

Martin Heer introduced himself and noted he is representing Labour Inspection Authority (LIA) Norway that supervising inshore diving. He listed mission of the authority as increasing the health and safety level in inshore commercial diving, preventing work-related accidents and contributing a fully satisfactory standard and good practice in inshore diving. He gave information about the relevant laws and regulations. He shared the number of diving population and companies involved in inshore diving industry. He gave detail about supervision, inspection guidance and cooperation and listed the responses of LIA in case of violation. He finished his report sharing the numbers regarding fatalities, accidents and incidents in inshore diving and applications for recognition of professional qualifications (See Annex 10).

Leif Morten Rasch introduced himself and stated that diving is relatively well regulated in Norway, in terms of safety. He stated offshore divers are mainly covered by the Working Environment Act, most of them are employed on Singapore contracts without permanent employment. He added the divers are not covered by statutory insurance and social security schemes like the rest of the employees in Norway are. The situation of day-rate regime (also called 0-hour contracts) leads to a reluctance to report incidents/near misses. He noted underreporting is described in DnV-report to Equinor "Risk Assessment of Manned Underwater Operations –Report No. 2021-0163, Rev. 0". He reported the updates and planned changes in The Working Environment Act that will allow to cover all inshore divers. He drew attention to the current underreporting of near-misses and DCS in inshore diving. He shared his concerns about the low level of activity in hyperbaric medical research in Norway and internationally. He emphasized the importance of the researches on divers working environment and commented on solution of the problem. See Annex 10 for detail.

Joar Gangenes representing offshore industry stated that they were quite busy in 2023 with more than on DSV (TechnipFMC and Subsea7). He added Kobra East Gekkosubsea project will be ongoing for Aker BP and continue operation until approximately year end. He stated industry standard NORSOK U-100, standard for diving operation, is under revision and the new one will be ready in 2024, and NORSOK U-101, equipment standard for breathing capacity is planned to be changed to an ISO Standard. He reported that pneumatic chest compression device for CPR is implemented on the DSVs, "sanondaf" is used in combination with fog gun for disinfection of chambers and bells, AED can be used in saturation chambers. He finished his report giving

information about research funding and Bergen International Diving Seminar, and showed an animation regarding the activities. See Annex 10 for detail.

Rolf Rossland, representing inshore diving industry reported approximately 175 diving companies or organizations are registered to Norwegian Labor Inspection Authority. He stated in-shore operational diving activity are not registered completely. He has listed five Norwegian diving contractors created a new nationwide group within diving and shallow water services. He mentioned about Norway's most extensive pipeline project Kalstø, which included longest-running diving operation and currently requires repairs time to time, and noted there is no such a major project in near future. He stated offshore wind power activities regulated under PSA and there is no much diving activities in Norwegian projects. He added offshore fish farms is a potential area for diving operations. He finished his report mentioning Norwegian Concrete Association Publication no. 5 which was revised in 2022. See Annex 10 for detail.

#### **SWEDEN (Mats Hagberg)**

Mats Hagberg mentioned about two EDTC MED courses done in 2023. He stated medical examination of working divers are done according to EDTC standard except military divers. He noted "heart score" has an advantage for evaluating the working divers since stress ECG has low predictive value. Heart score based on age, blood pressure, blood cholesterol, weight, hereditary factors and smoking and has an advantage on prediction of cardiovascular events (infarction, stroke) next ten years. He finished his report giving an example for the evaluation with heart score. See detail in Annex 11.

#### **UK (IMCA- Peter Sieniewicz, Philip Crombie)**

Peter Sieniewicz stated that IMCA expanded list of recognised qualifications and he added IMCA has entered into recognition arrangements with Australian Diver Accreditation Scheme (ADAS), Diver Certification Board of Canada (DCBC) and Netherlands Diving Centre Certification Institute (NDC-CI). He stated ADAS offshore diving supervisor, DCBC offshore diving supervisor and NDC-CI offshore diving supervisor are certificates recognised by IMCA under the arrangement mentioned. He informed the members about Continuing Professional Development (CPD) which became mandatory in 2021. He introduced IMCA CPD application and detailed changes in IMCA International Code of Practice for Offshore Diving (IMCA D 014 Rev. 3.1). He informed participants regarding the development of the new IMO International Code of Safety for Diving Operations. He finished his report with IDRF report after two-day meeting held before EDTC Meeting. See all detail in Annex 12.

Phil Crombie gave a report on accidents and incidents, enforcement, commercial diver training and fatalities as HSE update. He listed reported accidents and incidents occurred between 01.04.2022 and 01.04.2023. He detailed: 16 HSE enforcement notices given in inland/inshore diving, 6 notices in shellfish diving and 5 notices in recreational diving at work. He gave detailed information about an enforcement and prosecution about a novice diver drowned during training. He listed 11 diving training schools by showing their localisations on the map. He showed the yearly distribution of the number of certificates issued and their breakdown according to the types. He mentioned about complaints about divers' experience for Closed Bell Course and shared the detail about it. He reported 7 fraudulent HSE Surface Supplied (Top-up) certificates were submitted to IMCA by an overseas contractor and suggested checking all UK certification with HSE. He finished his report introducing Deep project (https://www.deep.com/) and listing worldwide fatalities in 2022 and 2023, collected voluntarily by Tim ..... For detail see Annex 13.

#### THE NETHERLANDS (Erwin Helderman)

Erwin Helderman, team leader of NDC-CI and chairman of College of Experts Civil Sector, explained what "working under overpressure" includes in The Netherland, and listed as Inshore /offshore diving, shipping and salvage operations, caisson works, hyperbaric medicines, scientific diving, zoo diving and governmental diving operations such as fire departments, police etc. He explained how certification and registration processes are organized for the professions of diver, diving supervisor, dive medical attendant and diving physician. He detailed scopes of different levels of certificates including dive medical attendant and diving physician. He compared the situation before and after 2012 and detailed pro's and con's. He added currently a lot of organizations are involved with certification, training and regulations in the Netherlands. He finished his report mentioning laws and regulations and shared the schema of certification and registration process. See the detail in Annex 14.

Robin Knook chairman of NADO reported that they worked on different topics with the workgroups to solve the issues. He stated that there will be accessibility for non-EU divers to the Netherland, but after having an entry level course and or portfolio assessment. He initiated another workgroup for inshore diving safety and increasing the relationship and safety awareness between inshore clients and diving companies. He reported CE marking on Diving Equipment was another topic for another workgroup and asked Adriaen Winckers, chairman of the workgroup to give an update. He summarized the work done since January 2017, with the participation of diving contractors (Boskalis, N-Sea, Bluestream, Ardent, DCN), equipment manufacturers (IHC-Hytech, Pommec, Unique) and representatives from WOD-SOE (Dutch equivalent of IMCA D018) writing team. He detailed the reports issued in January 2020 and the progresses. Robin Knook reported that they are trying to bring diving communities under one umbrella to solve the issues better. A group like a federation that has representatives or experts from diving industries, medicals, suppliers, training schools will solve the issues easier. He invited Jur van Kasteren, diving authority from military and chairman of military Community of Diving Experts, to give his report. He informed the participants regarding alegislation issue they've encountered about decompression chambers. The military legal consuls stated that if the decompression chamber is used for surface decompression it is considered as a medical device, so the chamber should meet the requirements for medical devices (MDR). He noted the issue of regulation for decompression chamber should be solved. See Annex 14 for detail.

#### **ELECTIONS**

The Secretary showed the list of the members who have right to vote, and he announced that there are three nominations for the positions of Jörn Ryberg from Sweden and Jean Lelievre from France, in EDTC Board. The nominations were Jörn Ryberg, Jean Lelievre and Rolf Roessland. They introduced themselves to the participants. Jörn Ryberg and Jean Lelievre were re-elected as EDTC Board members.

#### ANY OTHER BUSINESS, NEXT MEETING, VENUE AND DATE

Chairman announced Switzerland as the host country for EDTC 2024 and stated detail will be shared with the members when clarified.

#### **ACKNOWLEDGEMENTS & CLOSING REMARKS**

The Chairman thanked the host for organizing and all EDTC members and guests for participating at the EDTC 2023 Annual Meeting.

Compiled by Akin S. Toklu





## **EDTC Secretary Report**

Akın Savaş Toklu





YEAR	HOST	YEAR	HOST
1997	DENMARK	2011	FRANCE
1998	SWITZERLAND	2012	NORWAY
1999	ITALY	2013	TURKEY
2000	UK	2014	SPAIN
2001	BELGIUM	2015	POLAND
2002	FRANCE	2016	ESTONIA
2003	SWITZERLAND	2017	AUSTRIA
2003	AUSTRIA	2018	ROMANIA
2004	TURKEY	2019	SWEDEN
2005	BELGIUM	2020	ONLINE
2007	PORTUGAL	2021	ITALY
2008	ITALY	2022	FRANCE
2009	DENMARK	2023	THE NETHERLANDS
2010	CZECH R.	2024	?





YEAR	ноѕт	YEAR	HOST
1997	DENMARK	2011	FRANCE
1998	SWITZERLAND	2012	NORWAY
1999	ITALY	2013	TURKEY
2000	UK	2014	SPAIN
2001	BELGIUM	2015	POLAND
2002	FRANCE	2016	ESTONIA
2003	SWITZERLAND	2017	AUSTRIA
2003	AUSTRIA	2018	ROMANIA
2004	TURKEY	2019	SWEDEN
2005	BELGIUM	2020	ONLINE
2007	PORTUGAL	2021	ITALY
2008	ITALY	2022	FRANCE
2009	DENMARK	2023	THE NETHERLANDS
2010	CZECH R.	2024	?







FINLAND
GERMANY
LATVIA
LITHUANIA
MONTENEGRO
SLOVAK REPUBLIC
SLOVENIA



## **EDTC 2024 ANNUAL MEETING**









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Medical

Industry

Industry

Medical

Medical

MEETINGS

NEWSLETTERS

MEMBERS AREA



### **APOLOGIES FOR ABSENCE**

MEMBERS NAME	COUNTRY	REPRESENTING
<b>Thomas Gaisberger</b>	Austria	Government
Pavel Macura	Czech rep.	Medicine
<b>Mark Caney</b>	<b>EUF Observer</b>	Industry
Tomi Wuorimaa	Finland	Medicine
Eric Saint-Sulpice	France	Union
Eric Albier	France	Government
Jennifer Mayer	Germany	Industry
Frank Werner	Germany	Union
Philip Bryson	<b>Great Britain</b>	Medicine
Vitalijs Zaharovs	Latvia	Medicine
Øyvind Loennechen	Norway	Government
Jacek Kot	Poland	Medicine
Veronika Rybárová	Slovakia	Medicine
Jack Meintjes	South Africa	Medicine
Andreas Achermann	Switzerland	Government
Steve Forman	UK	Government



### **LIST OF PARTICIPANTS**

NAME	COUNTRY	NAME	COUNTRY
Amanda Sordes	Australia	jurg wendling	Switzerland
Roland Vanden Eede	Belgium	Maurice Schlauri	Switzerland
Tracy Childs	Belgium	Leo Lagarde	Leo Lagarde
David Parkes	Canada - DCBC	Adraen Winckers	The Netherlands
Margo Purru	Estonia	Carin Bot	The Netherlands
LELIEVRE Jean	France	Cees Noordhoek	The Netherlands
Hélène SZULC	France	Cornelis Segaar	The Netherlands
Ing. Giuseppe Petrone	Italy	Erwin Helderman	The Netherlands
Massimo Becherucci	Italy	JOHN SMIT	The Netherlands
Pasquale Longobardi	Italy	Jur van Kasteren	The Netherlands
Rolf Roessland	Norway	Marchel Werkman	The Netherlands
Ulrik Jünge	Norway	Maurice Krul	The Netherlands
Bjarte Rødne	Norway	Nico Vink	The Netherlands
Leif Morten Rasch	Norway	Pieter-Jan van Ooij	The Netherlands
Martin Heer	Norway	Robin Knook	The Netherlands
Rolf Roessland	Norway	Tjeerd van Rees Vellinga	The Netherlands
Joar Gangenes	Norway	Murat Egi	Turkey
<b>Bogdan Cristian Ion</b>	Romania	Zubeyir Ali Uzunoglu	Turkey
Jabulile Mhlophe	South Africa	Akin Savas Toklu	Turkey
Bulelwa Huna	South Africa	Phil Crombie	<b>United Kingdom</b>
Nozi Maphoto	South Africa	Peter Sieniewicz	<b>United Kingdom</b>
Daniel Larsson	Sweden	Ali Macleod	United Kingdom
Mats Hagberg	Sweden	Peter Sieniewicz	United Kingdom
Jörn Ryberg	Sweden	Taira Caton	United Kingdom



## **NEW MEMBERS**

NAME	REPRESENTING	CATEGORY
Allan H. E. Schütt (Knud-Helge Andreasen)	DENMARK	Industry
Jennifer Mayer (Claus Mayer)	GERMANY	Industry
Rolf Røssland (& Joar Gangenes)	NORWAY	Industry
Maurice Schlauri	SWITZERLAND	Industry



### **MEMBERSHIP FACTS IN NUMBERS**

The # of member countries 25
------------------------------

Expected # of members 100

Current # of members 65 (61)

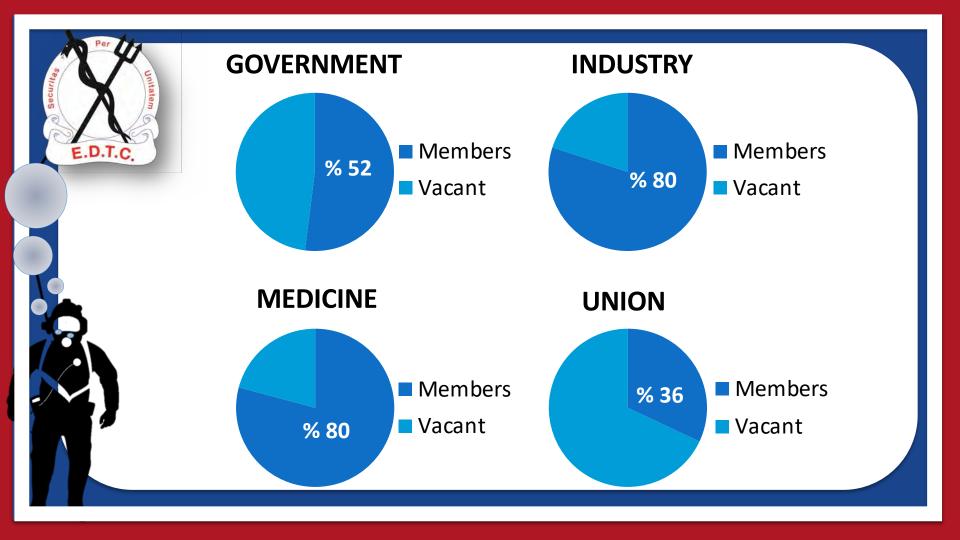
• # of vacant positions 39

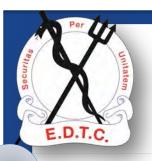
Government12

Industry5

– Medicine 5

– Union 17





# MEMBERS NOMINATED FOR EDTC BOARD MEMBER ELECTION

\_\_\_\_\_

Jörn Ryberg

Jean Lelievre

Rolf Roessland





## **PROGRAM**

### 2023 EDTC Annual Meeting

29th Septem	iber 2023, Friday	
09:30-09:35	Welcome	Chairman, Jörn Ryberg
09:35-10:00	Introductory Presentations by Host Country and Safety and Security Information	Host NADO
10:00-10:15	EDTC Admin Matters, Apologies EDTC Membership Summary Treasurer Report	Secretary, Akın S. Toklu Treasurer, Phil Crombie
10:15-10:45	Chairman's Report Summary of Actions from 2023	Chairman, Jörn Ryberg
10:45-11:15	COFFEE BREAK	
11:15-12:30	Work Groups Activity	<u>All</u>
12:30-13:30	LUNCH	



## **PROGRAM**

### 2023 EDTC Annual Meeting

29 <sup>th</sup> Septemb	er 2023, Friday	
13:30-13:50	Reports from the Med. Subcommittee	Jurg Wendling
13:50-16:30	National Reports	Members
	FRANCE	<u>Hélène SZULC</u>
	ITALY	Massimo Becherucci
	ITALY	Pasquale Longobardi
	NORWAY	Ulrik Jünge
	NORWAY	Martin Heer
	NORWAY	Rolf Roessland
	NORWAY	Joar Gangenes
	SWEDEN	<u>Mats Hagberg</u>
	THE NETHERLANDS	Robin Knook
	UNITED KINGDOM	<u>Peter Sieniewicz</u>
	UNITED KINGDOM	<u>Phil Crombie</u>
16:30-17:00	COFFEE BREAK	
17:00-17:20	Elections	<u>All</u>
17:20-17:50	Any Other Business, Next Meeting	All
17:50-18:00	Closing remarks	Chairman Jörn Ryberg



## EDTC – Treasurer's report 2023



## Balance approx €23,700

## Purpose of balance –

- Contribute towards host costs
- Strategic expenses such as inviting important guests



## Payments for 2023

- €50 per member per year
- €50 for additional dinner guests
- Please make clear country and representative when making bank transfer.

# **EDTC Annual Meeting 29 September** 2023

"Time for unity"

#### **Content**



- 1. EDTC Profile Aims & Objectives executive board
- 2. A reminder
- 3. News during 2023
- 4. Proactive
- 5. Who is responsible?
- 6. The way forward

Presented by: EDTC Chairman Jörn Ryberg

## 1. European Diving Technology Committee (EDTC)Profile

Per Unitatem E.D.T.C.

EDTC is a not-for-profit organization - formed 1973. Today EDTC has representation within 25 European (geographical) countries. This year we are greeting new members from several countries.

#### **Purpose**

Safer Commercial Diving,

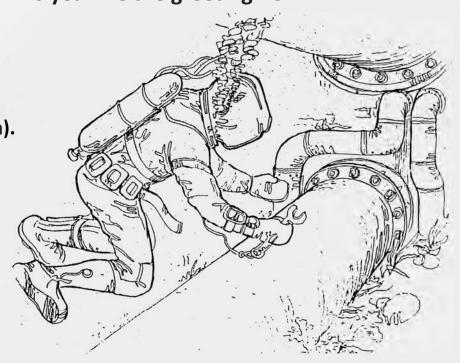
Through Unity, Strength (Securitas per unitatem).

#### Representation

- Membership entire geographical Europe,
- Medical,
- · Government,
- Industry (employers),
- Labour Unions (employees).

#### **EDTC** reach its aims by

- Independent European forum,
- Discussions,
- Standards,
- Guidance.



## 1. The executive board of 2022/2023















**Akin Toklu** 

Jean Lelievre

Jürg Wendling

Jörn Ryberg

Pasquale Longobardi

**Philip Crombie** 

## Efficient quarterly board meetings using MS Teams.

#### Fixed agenda:

- 1. Welcome and opening comments by Chairman,
- 2. Review and approval of previous Board meeting minutes,
- 3. Actions and matters outstanding since last meeting,
- 4. Economic reports,
- 5. Discussion on EDTC annual activities,
- 6. Discussion about preparing the annual meting,
- 7. Any other business,
- 8. Next meeting.

## Other board achievements during 2022 / 2023

- 1. Digital meetings with board members,
- 2. Industrial meeting cross Europe
- 3. Supporting Scientific initiative
- 4. Meeting with SLIC-DIVEX,
- 5. Meeting with French Industry Treburden,
- 6. Meeting with EU parliament politicians,
- 7. Providing information to all members.

## 2. European Commercial Diving -

A reminder why we all are doing this work

The diving industry – Expensive knowledge

## This situation is not acceptable!

Diving Industry – poor statistics of fatal accidents
Little Governmental information
Collected by voluntary individuals

- 1960 1999 815 fatal accidents occurred,
- 2000 2021 774 fatal accidents occurred.
- 2022 at least 11 fatal accidents
- 2023 registered 9 fatal accidents

The clear answer is that there is a lack of consistency over Europe. The fact that people are doing things like they are "at home" and are not aware of the common basic safety manners, is probably one of the most common reasons for the fatalities.

Behind each figure is a tragedy!

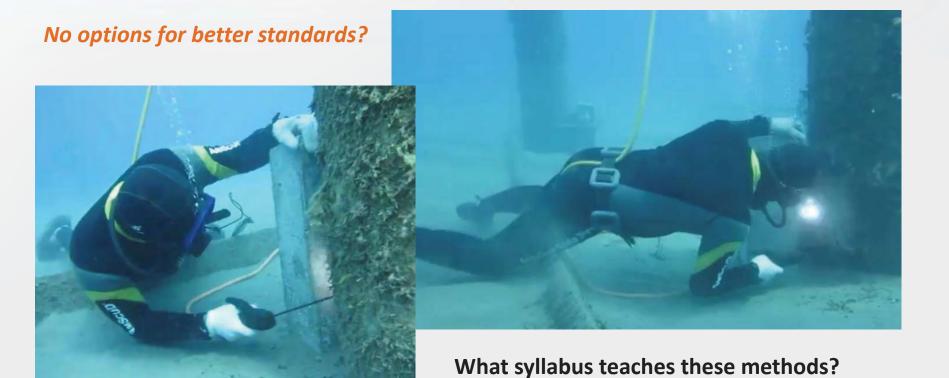


## 2. Safety at work in Europe 2023?



Implementation of modern diving regulations? – or why tragedies occur...

This work is conducted in Greece.



### 2. Not only Europe

#### a **REMINDER** why we all are doing this work



#### CHILE

44 divers have died working on Chilean salmon farms in the past 20 years. Mostly using SCUBA.

The mounting death toll, is slammed as 'unacceptable' by critics, who allege shoddy industry working practices and divers being pressured to work beyond healthy norms.

#### Local critics say reform is long overdue.

There have been **238** recorded incidents involving slight or serious injuries and deaths of divers working in the Chilean salmon industry in the past nearly 19 years.



#### **CANADA**

Several divers have died working as commercial divers between 1922 and 2022.

Some statements say more than 5 individuals per year.

Overwhelming part of these were "commercial SCUBA"

The diving inspector in British Columbia, points out that the majority of commercial SCUBA diving fatalities in his province have been recreational SCUBA divers working illegally on commercial projects.

The Canadian Standards Association's Occupational Safety Code For Diving Operations very clearly defines what is required for safe commercial SCUBA diving activity but local critics say regulations overlook inherent risks.

To discuss the use of SCUBA as a method for commercial activities is of great value.

### 3. News 2023 - SLIC - DIVEX workgroup



The background and aim of the workgroup, has been as follows;

"Diving is a <u>high-risk work activity</u>.

Divers may work in multiple EU

Member States with different
regulations of diving"

The SLIC has been co-operating with EDTC and are aware that within Europe there are huge differences and there is little or no co-ordination at EU level.

This in combination with the fact that professional divers are one of the professions within the Directive of Professional Qualifications, underlines the situation whereas there is a need to create a common basis. "

#### EDTC has pointed out:

- There are existing guidance within EDTC library,
- Try to avoid "re-inventing the wheel",
- Make cross-references between the inventories.

Member·State·Name¤	ц				
Key·aspects·of·Regulations·or· guidelines¤	National·practice·for·health·and·safety· in·occupational·diving.¶				
	Please-tick-relevant-boxes¤				
1.·Do·you·have·specific·national·Regulations- for·occupational·diving?¤	[·]·Yes·¶				
Tor-occupational-driving: x	[·]·No·¤				
$If \cdot answer \cdot \textbf{NO} \cdot to \cdot question \cdot 1, \cdot please \cdot go \cdot directly \cdot to \cdot question \cdot 22. \cdot \texttt{x}$					
2.·Who·is·responsible·for·enforcement·of·the· Regulations·for·occupational·diving?¤	[·]·Labour·Inspectorate·only¶				
	[·]·Maritime·Authority·only¶				
	[·]·Both·Labour·Inspectorate·and·Maritime·· Authority¶				
	[·]·Other:·¤				
3.·Which∙diving·locations·do·the·Regulations· apply·to?·¤	[·]·Inland··¶				
	[·]·Inshore··¶				
	[·]·Offshore¤				

For this purpose DIVEX has created a template that has been sent to SLIC members.

### 3. Inventories already done by EDTC



#### Results 2018 - 2022

- · Answers from 25 of 28 countries,
- More than 90% hit range of 12 questions,
- Still large variation all over Europe
- 44% do NOT comply with Directive 2005/36/EC

#### Why are facts important?

Facts presents the huge responsibilities that are brought to not at least the

Use Yes/No within your answers	1. Existing regulations	1. Regulated profession	1. Free movement	2. Agenda 2030 – decent work	3. Political awareness
Does your country have a regulation according to Directive 2005/36/EC?	X	X	X		
If answer to first question is NO, does your country have any regulation that states diving as a "regulated profession"?	Х	×	X		
Does your local/national situation create any obstacle for you within you profession?			X		
Does your country have any implementation of agenda 2030?				Х	Х
Can you identify that Diving as a profession influences other goals within agenda 2030?				X	
<u>Du</u> you experience any challenges or obstacles to exercise your profession within Europe	Х	X	Х		Х
Are any politicians within your country aware that diving is a profession?					X
Are any politicians within your country aware that divers are killed annually when exercising their profession?					X
Do you experience any challenges between local legislations and the overall principle of free movement?	X	X	X	X	X

employers shoulders. Facts also shows the inconsistency within Europe and the significant importance of creating a common minimum standard. SLIC (senior labour inspectors committee) has invited EDTC to their workgroup (DIVEX) during 2023 to examine the results provided by EDTC.

#### After this discussion with EDTC, the Chairman of DIVEX stated:

"thank you for your presentation, which unfortunately supports our thesis about the situation within commercial diving. Also, thanks for the offer of assistance"

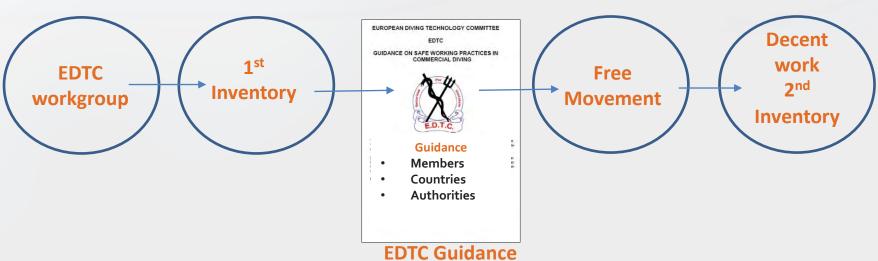
### 4. EDTC - Proactive instead of Reactive



#### Helping the politicians to understand the industry.

The free movement of workers means that nationals of any member state of the European Union can take up an employment in another member state on the same conditions as the nationals of that particular member state.

#### **EDTC process and well defined milestones**



This also creates some challenges since its not an isolated EU issue. This is due to the mobility and small fast mowing parties within the industry.



# EDTC has made EU parliament politicians aware, 3 questions have been sent to the commission:

- 1. Can the Commission state whether the zero vision also includes commercial divers in the EU?
- 2. Does it intend to submit a directive on harmonized health and safety standards for commercial divers in the EU to prevent work-related deaths in line with vision zero?
- 3. Does the Commission plan to present guidelines for vocational training and certificates for commercial diving in the EU?



European Commission, <u>has not</u> implemented diving within EU Strategic Framework on Health and Safety at Work for the coming period:

"Please note that in principle we have not foreseen at this stage to put forward specific initiatives as regards Occupational Safety and Health (OSH) related to commercial diving"



#### The 17 goals - decided by UN - a plan of action for people, planet and prosperity



#### Does agenda 2030 has any thing to do with the Diving Industry?

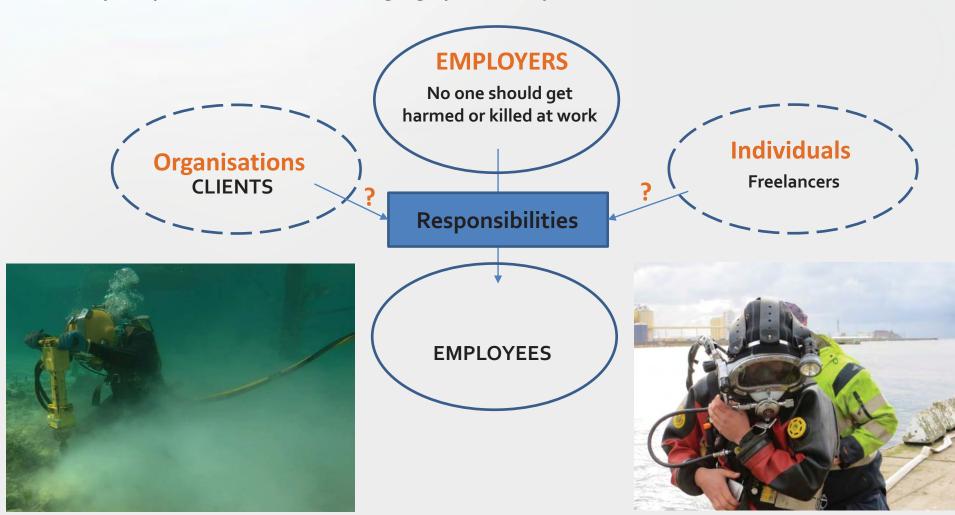
The answer YES is obvious. Further, freedom of movement for workers is a policy chapter of the "acquis communautaire" - cumulative body of European Community laws.

The goal 8 – "decent work..." is a fundamental requirement for diving as a profession.



Responsibilities according to legislation

The principles are the same all over geographical Europe





#### Offshore - Reactive to the situation

• The offshore Oil & Gas industry has developed significantly and, with safety and best practice remaining as the focus of everything that is done, its now considered as a very safe and mature undertaking.

IMCA has and still is, providing guidance and good standards for this sector.

#### In-shore / near-shore

By contrast, we have the near-shore/in-shore sector, which
has a much larger number of Companies and Employees
engaged in Diving activities. Unfortunately, almost all fatalities
within the industry comes from this sector.

#### Who is responsible then?

Much of the responsibilities are brought to the employers but also employees has the responsibility to stop working at unsafe conditions.

For the time being lite or no responsibility are brought towards Clients and freelancers.





### 5. The way forward - unity



#### The elements of responsibility

- 1. European political within Europe (free movement / regulated Profession)
- 2. Global Agenda 2030 "Decent work"
- 3. Industrial (employers & employees)

Through Unity, Strength (Securitas per unitatem).

EDTC subcommittees is necessary to enable change



A broaden participation to make change through unity!

#### 1. Employers

Create clarity within rules/ regulations instead of inconsistency

#### 2. Employees

Create Decent work conditions instead of inconsistency

#### 3. Political

Create new Directive on the basis given from Subcommittees

### 5. The way forward -Subcommittees



A common basic platform for whole of Europe is needed.

This is acknowledged by SLIC, EDTC, EU parliamentarians, European Workers Unions and European Employers associations.

- The facts are in place statistically proven by EDTC
- The UN goals (agenda 2030) relate to Diving as a profession
- The need of an umbrella document is met EDTC guidance

Significant principles to create a new directive are identified:

**Trained to dive** = "drivers licens" (Divers certificate) or the individual has to:



**Vocational training** = "full drivers licens" or the individual has to:

be trained to dive in a safe manner

be trained to perform and conduct the actual works, in a competent and safe manner

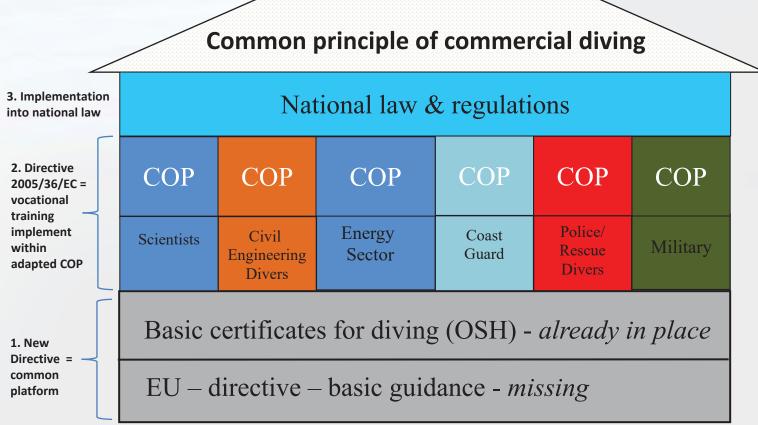
The two principles should be combined together before any individual has "full licence as a commercial diver"

THE MISSING PART IS – UNITY FOR EMPLOYERS & EMPLOYEES



## 5. The way forward – principle





A new EU
directive can
provide the
basic platform
for both
implementation
into national law
and enable
vocational
training within
the different
countries

#### The principle of "the house" fulfils the demands:

- to dive in a safe manner and
- 2) to be educated and trained to perform and conduct the actual works, in a competent and safe manner

# 5. The way forward – CODE OF PRACTICE



#### Why Code of Practice (COP)?

The possibility lies in explanations and clarifications.

#### **FACTS**

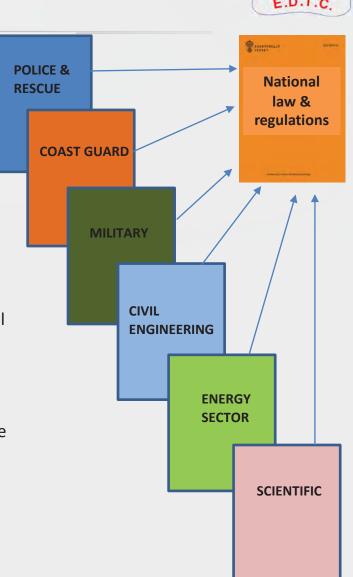
The entire industry has two basic sources of revenue; either financed through taxpayers or through market economy.

The players within the market economy are facing the fact that most all public procurements are made from the principle of "lowest price".

However, due to market competition, the players are forced into a special situation. Many regulations are as an example using the requirements of minimum dive crew. This sets the standard of pricing.

#### **Solutions through COP**

- Relevant work environment requirements that can be enabled for the entire industry to follow.
- The vocational training/professional requirements can be defined within relevant COPs.



# **Summary**

- EDTC provides an independent non-for-profit forum,
- EDTC inventories confirmed by SLIC states the facts,
- The principle of "the house" gives functional guidance,
- Subcommittees and unity are needed now.

### Any questions?

EDTC Chairman - Jörn Ryberg E: jorn.ryberg@marcon.se









# Questionnaire on occupational diving regulations &

Diving is a high-risk work activity. Divers may work in multiple EU Member States with different regulations of diving. EDTC members are kindly asked to discuss and fill out this questionnaire.

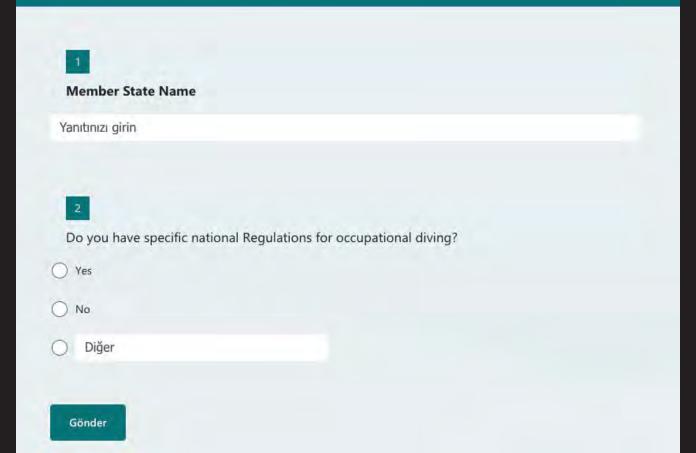
Please indicate your comments where applicable in "other" options, if each answer applies to Regulations (including law) or guidelines (including codes of practice).



# **Questionnaire on occupational diving regulations**

Diving is a high-risk work activity. Divers may work in multiple EU Member States with different regulations of diving. EDTC members are kindly asked to discuss and fill out this questionnaire.

Please indicate your comments where applicable in "other" options, if each answer applies to Regulations (including law) or guidelines (including codes of practice).



## **Member State Name**



Yanıt bekleniyor...

Yanıtlar sözcük bulutu olarak görüntülenecek

1/35





Do you have specific national Regulations for occupational diving?

Yes

Ağaç Haritası

Who is responsible for enforcement of the Regulations for occupational diving?

Labor Inspectorate only

Maritime Authority only

Both Labor Inspectorate and Maritime Authority



# Which diving locations do the Regulations apply to?

Inland

Inshore

Offshore

# Which diving activities do the Regulations apply to?

Commercial diving

Scientific diving

Archaeological diving

Search and rescue diving

Sports diving

A 1. 1. 1





# Are any groups/organisations exempt from the

Army

Police

Self-employed divers

No exemptions

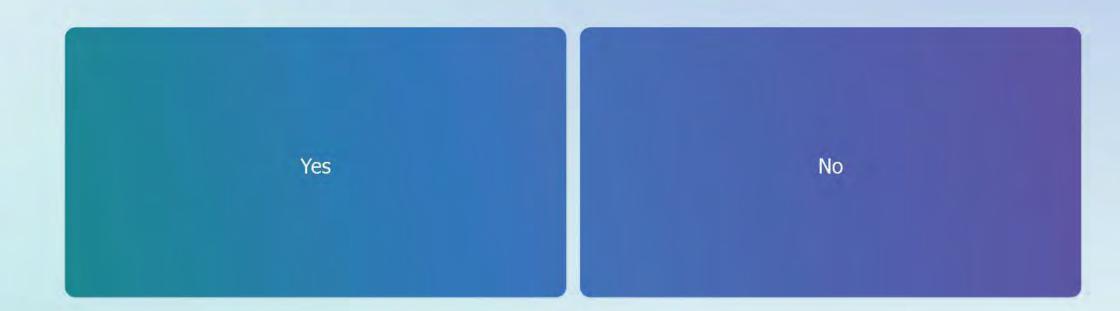


Do the Regulations require a specific dive site risk assessment?



Bar

Is there a requirement for documentation (risk assessment/dive plan) to be kept at the dive site?



Bar

# What aspects relevant to diving have to be considered in the risk assessment?

Diving method

Use of compressed air or gas mixture

Water flow

Contaminated water

Environmental conditions e.g. weather

. . . .



# What diving methods do the Regulations apply to?

**APNEA** 

SCUBA - no lifeline

SCUBA - tethered

Surface supplied

Caturation



What restrictions, if any, exist for each diving method e.g. depths, visibility, duration, weather conditions?



Yanıt bekleniyor...

Yanıtlar sözcük bulutu olarak görüntülenecek

Tüm yanıtlar

Are there minimum dive team numbers for the method of diving?





Please provide detail regarding minimum dive team numbers for the method of diving?



Yanıt bekleniyor...

Yanıtlar sözcük bulutu olarak görüntülenecek

Sonraki soru

Wordcloud Tüm yanıtlar







# Are there exemptions to the minimum dive team



# Please explain exemptions



Yanıt bekleniyor...

Yanıtlar sözcük bulutu olarak görüntülenecek





# What factors may increase the number of the diving

Diving Method

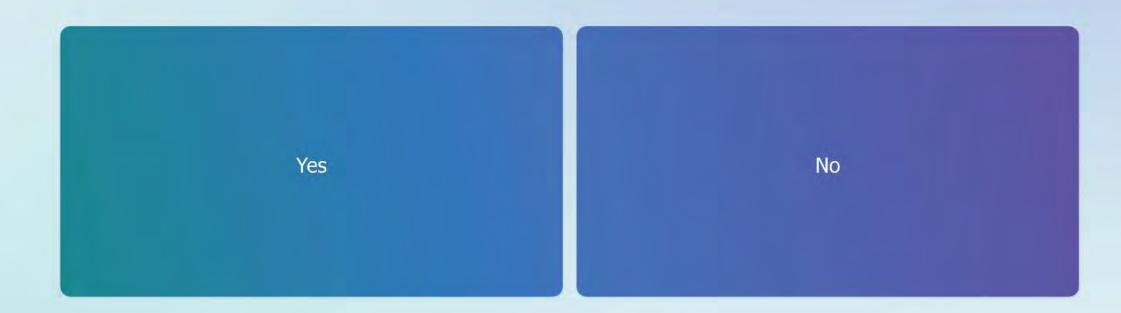
Use of heavy tools

Welding

Depths

Vicibility

Do the Regulations include requirements on the availability of compression chambers?



Bar

Are there circumstances where access to a compression chamber is needed at the dive site?



# Please explain circumstances?



Yanıt bekleniyor...

Yanıtlar sözcük bulutu olarak görüntülenecek



# Are there mandatory diver training qualifications?

Yes

Bar

Ağaç Haritası

Do more than one type of training qualification are needed for members of the diving team ?



# What type of training qualification are needed for members of the diving team ?

"How to dive safely" training

"How to make specific underwater tasks" training

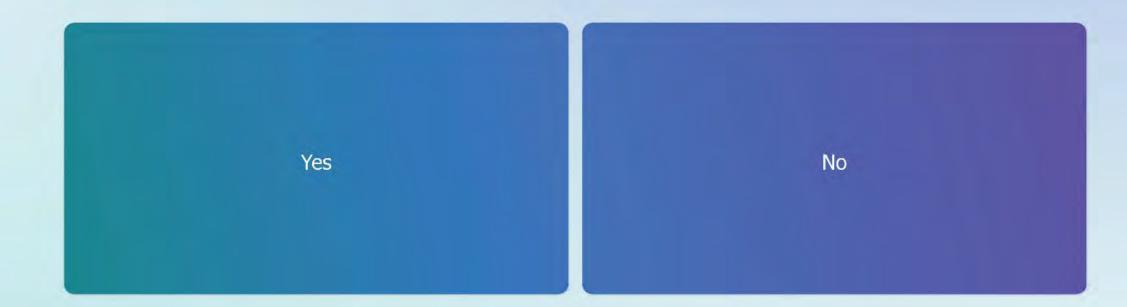
Specific training for supervisor

Specific training for standby diver

Do main training qualification for divers undergo practical training to drive emergency procedures (act as a diver, water...



### Do emergency exercises has to be managed



### For whom emergency exercises has to be managed

For divers For diving project

Bar

Do you recognise divers training qualifications from other Member States or countries?



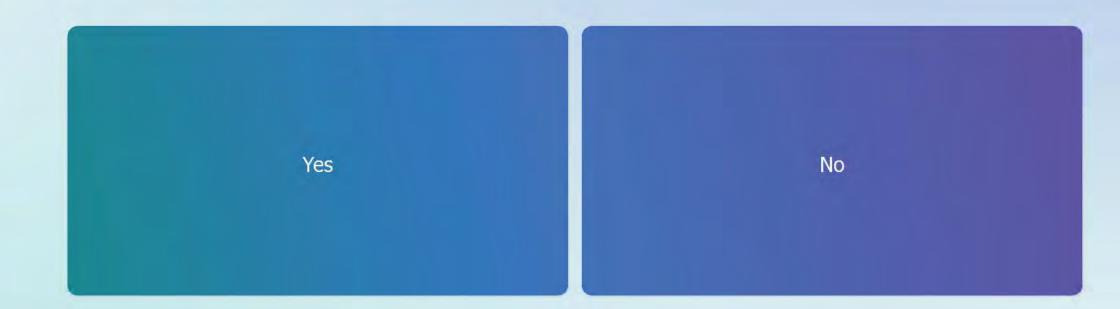
Is notification of diving operations, to the relevant authority, required?



### Are medical certificates of fitness to dive required?



Do you recognise medical certificates of fitness to dive from other Member States or countries?



Bar

### Who issues the certificates of fitness to dive?

A doctor specialising in diving or decompression illness

General doctor

Not applicable



How long are the medical certificates of fitness to dive valid for?

Maximum 1 year

Sonraki soru



List (with links) any official guidance documents relating to occupational diving in your country.



Yanıt bekleniyor...

Yanıtlar sözcük bulutu olarak görüntülenecek





List any standards related to diving recommended in your country.



Yanıt bekleniyor...

Yanıtlar sözcük bulutu olarak görüntülenecek





Contact information\* and email address of the person(s) providing answers: \* This information is required in case of answer f...



Yanıt bekleniyor...

Yanıtlar sözcük bulutu olarak görüntülenecek

Wordcloud

### Please add any additional comments here.



Yanıt bekleniyor...

Yanıtlar sözcük bulutu olarak görüntülenecek

35/35





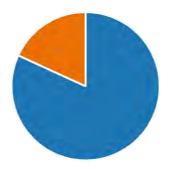
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#### 1. Member State Name

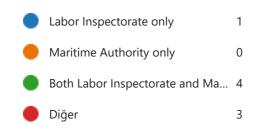
11 Yanıtlar Son Yanıtlar
"Turkey"
"massimo becherucci"
"Spain "

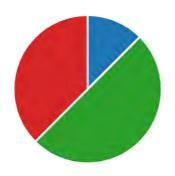
2. Do you have specific national Regulations for occupational diving?





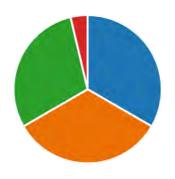
3. Who is responsible for enforcement of the Regulations for occupational diving?



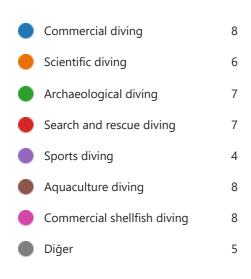


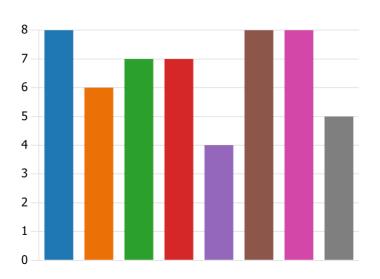
#### 4. Which diving locations do the Regulations apply to?



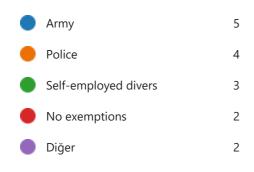


#### 5. Which diving activities do the Regulations apply to?





#### 6. Are any groups/organisations exempt from the Regulations?





7. Do the Regulations require a <u>specific dive site</u> risk assessment?

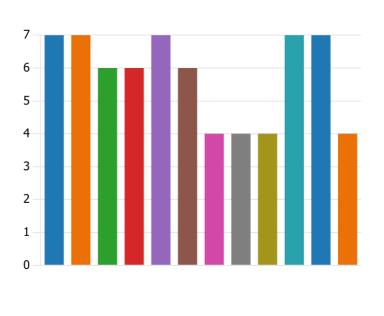


8. Is there a requirement for documentation (risk assessment/dive plan) to be kept at the dive site?

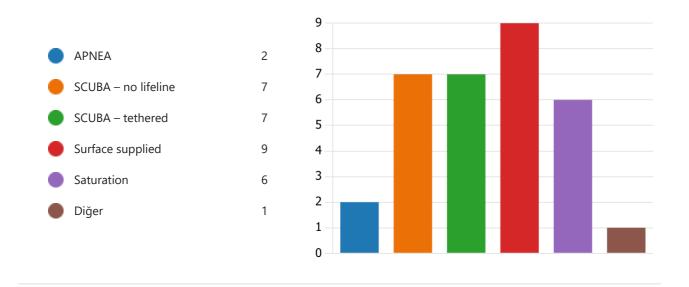


9. What aspects relevant to diving have to be considered in the risk assessment?

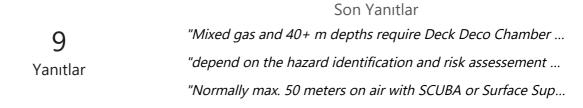




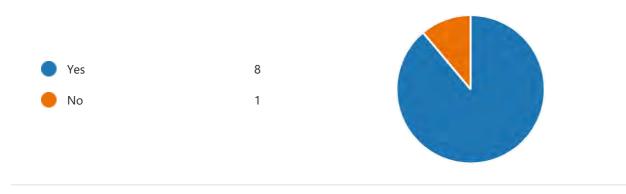
10. What diving methods do the Regulations apply to?



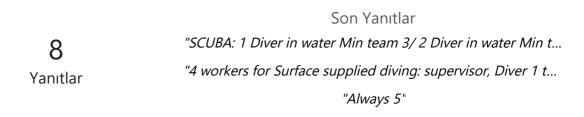
11. What restrictions, if any, exist for each diving method e.g. depths, visibility, duration, weather conditions?



12. Are there minimum dive team numbers for the method of diving?



13. Please provide detail regarding minimum dive team numbers for the method of diving?



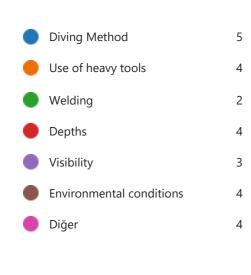
#### 14. Are there exemptions to the minimum dive team numbers?

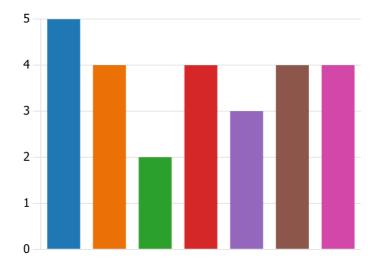


#### 15. Please explain exemptions

2 Yanıtlar Son Yanıtlar
"Shallow waters with good visibility in ports, exception com...

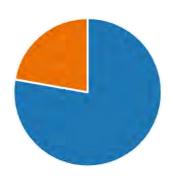
#### 16. What factors may increase the number of the diving team?





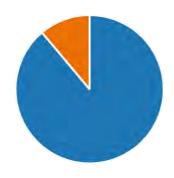
17. Do the Regulations include requirements on the availability of compression chambers?





18. Are there circumstances where access to a compression chamber is needed at the dive site?

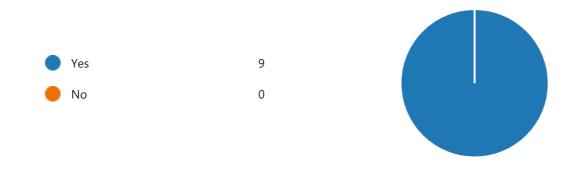




19. Please explain circumstances?

7 Yanıtlar Son Yanıtlar
"Deeper than 40 m OR mix gas"
"Over 30 meters depth is mandatory at dive site"

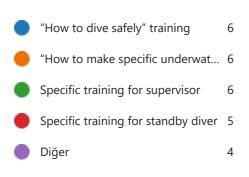
20. Are there mandatory diver training qualifications?



21. Do more than one type of training qualification are needed for members of the diving team ?

Yes 0 No 0

22. What type of training qualification are needed for members of the diving team?





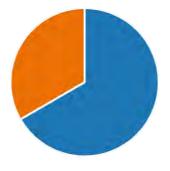
23. Do main training qualification for divers undergo practical training to drive emergency procedures (act as a diver, water standby diver, surface standby diver or other member of the surface team) ?





24. Do emergency exercises has to be managed occasionally?

YesNo3



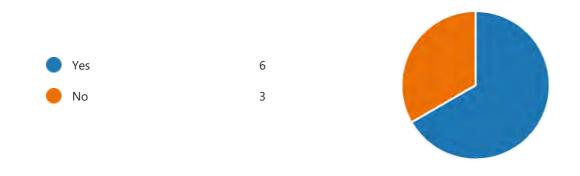
25. For whom emergency exercises has to be managed



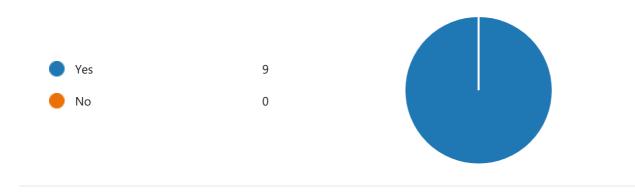
26. Do you recognise divers training qualifications from other Member States or countries?



27. Is notification of diving operations, to the relevant authority, required?



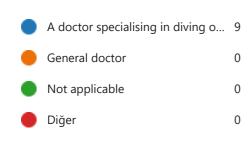
28. Are medical certificates of fitness to dive required?



29. Do you recognise medical certificates of fitness to dive from other Member States or countries?

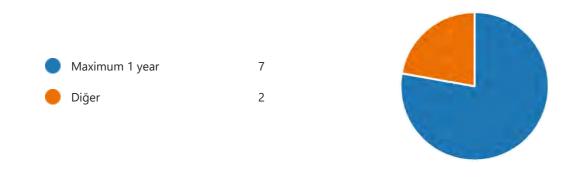


30. Who issues the certificates of fitness to dive?





31. How long are the medical certificates of fitness to dive valid for?



32. List (with links) any official guidance documents relating to occupational diving in your country.

Son Yanıtlar

10

"https://www.mevzuat.gov.tr/mevzuat?MevzuatNo=5689&...

"See Italian national report (Longobardi)"

"https://www.boe.es/diario\_boe/txt.php?id=BOE-A-2018-12...

33. List any standards related to diving recommended in your country.

9 Yanıtlar Son Yanıtlar

"https://www.mevzuat.gov.tr/mevzuat?MevzuatNo=5689&...

"See Italian national report (Longobardi)"

34. Contact information\* and email address of the person(s) providing answers:

\* This information is required in case of answer follow up.

Son Yanıtlar

10 Yanıtlar "murat.egi@gmail.com ali@deepoffshore.com"
"massimo.becherucci@vigilfuoco.it Massimo Becherucci"
"Arturo Villazón, +34 666370132 avillazon@tecnosub.net"

35. Please add any additional comments here.

3

Yanıtlar

Son Yanıtlar

#### **European Diving Technology Committee**

Chairman Medical Subcommittee Dr. med. Jürg Wendling Seevorstadt 67, CH - 2502 BIEL/BIENNE Tel. +41 32 322 38 38

e-mail: mail@wendling.ch



#### **MINUTES MEDICAL SUBCOMMITTEE MEETING - Porto, 14.09.2023**

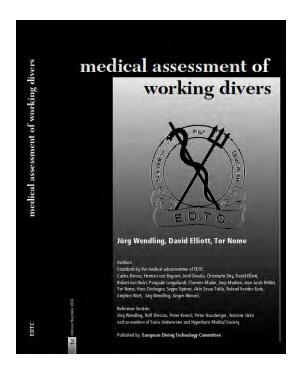
**Present**: Mats Hagberg, Bogdan Cristian Ion, Carla d'Espinay Amaro, Feiko De Jong (replacing Peter van Ooij), Pasquale Longobardi, Willi Welslau, Roswitha Prohaska, Anne Räisänen-Sokolowski, Jürg Wendling

**Corresponding members and guests**: Martin Sayer, François Burman, Jean-Eric Blatteau, Ron Linden (replacing Ken LeDez), Barbara Vela, Rienk Rienks, Christian Wölfel, John Peters, Ken LeDez (online), Steve Forman (online).

- 1) Introduction, Welcome
- 2) Fitness to dive manual: Endorsement of reference sections and forms

1.	Foreword	5
2.	The principles of assessment	7
	Forms for examination of divers (EDTC Standard template)	12
3.	General guidelines - assessment of organ systems	17
4.	Reference section	35
	Otorhinolaryngology	37
	Respiratory system	61
	Heart and circulation	
	Nervous system	
	Psychiatry	
	Internal organs	
	Musculoskeletal system	
	Performance, lifestyle and temporary contraindications	147
	refromance, mestyle and temporary contramoreations	
5.	Occupational hazards and work specific risks	177
6.	Appendix	181
	Appendix A: Reliable tests of physical fitness	183
	Appendix B: Checklist for resumption of work under pressure	
	after DCI or diving emergency	999
	Appendix C: Referral for specialist advice	999
	Referral for specialist advice ENT	999
	Appendix D: Guidelines for medical training in diving	
	(and hyperbaric) medicine EDTC/ECHM	187
7.	Literature	203
8.	Index	207

9. National references of authorities and scientific societies



213

JW mentions that in the final phase 3 hot topics are **still in final discussions**:

- a) ENT (Contraindications). In the past stapes-surgery was a clear contraindication, because it was a pioneering surgery with a lot of complications and dramatic reduction in quality of life if something happened. In the meantime, these interventions are standardised and performed by trained specialists and the mechanics are such that the properly positioned prostheses cannot move enough inwards to touch the backwall in case of a barotrauma, thus impossible to do damage to the inner ear and thus no reason for a contraindication. The ENT specialists subgroup is actually finding the right words to put that in the reference section. It will be published at Hymepro soon.
- b) Resume diving after DCI guidelines: We traditionally cited the DMAC limits and recommendations for that purpose. During discussions it came up that in many cases, especially inland and Scuba diving, these delays are too short, not so much for the healing time but for the work-up needed to clear the case. We therefore redesigned this subchapter in order to describe what the consensus group found and, in a second paragraph, citing the DMAC guidance.
- c) Fitness to dive after pain-only bends: We took note of the important findings of a study performed at Toulon by the French research group, who found out that a considerable number of bends victims also develop bone oedema as a possible pre-stage of bone necrosis. Between these cases a certain number develops bone necrosis. This is a reason to do a screening by MRI one month after the accident and maybe more later if there are signs of early DON. Accordingly, the authors proposed to prolong the delay for resume diving to at least one month, as opposed to the DMAC recommendation (one week). Many contributors of the Hymepro-group however found that to impose such a long waiting period and furthermore to perform MRI for every case of bends was beyond reasonable risk management. JW therefore proposed to create a new page in the musculoskeletal chapter of the reference section with a title "Musculoskeletal DCS" bends.

#### d) General discussion:

- Ken wished that we should clearly state that there is no place for X-rays anymore, but low-dose CT and MRI are the modern tools to be prescribed on indication.
- Willi proposed to change the title of the "Long Covid" page into "Post infection conditions", as other viral infections may result in the same chronic fatigue syndrome, which has been pathophysiologically described in the meantime.
- Ken and Roswitha mention that not only divers and tunnel workers should be considered, but also inside-tenders (and doctors) of clinical hyperbaric treatment chambers

**Finalizing the manual:** There is actually a search for a printing office.

We are in contact with IMCA for financial support of printing.

It will be a publication of EDTC. Editors are those from the first edition + Jean-Louis Méliet, Jack Meintjes, Roland vanden Eede.

PDF Edition? It has been asked several times whether there will be an downloadable digital version. We are looking for possibilities to offer a PDF version. The group clearly agreed for this procedure, it was said also that the price must be the same as for the print edition for not biasing the decision to the printed one.

<u>In summary</u>: The participants agree with all these proposals and congratulate for the successful international cooperation of so many competent experts.

#### 3) Informations from DMAC (EDTCmed is permanently represented at DMAC, as well as vice-versa):

- New chairman: Olav Eftedal handed over chairmanship to Peter van Ooij, due to a change in his professional engagement.
- Proposal of an IMCA/DMAC "Diving Medical Knowledge Test" for diving physicians Level 1 and 2D. This could be a copy/paste of a well-established and perfectly working testing procedure for diving supervisors developed by IMCA. The question pool and validations procedures however will have to be prepared by DMAC with EDTC and IDMEB contribution.
  - <u>Discussion</u>: A validated test representing an international agreed standard will be a welcomed help for course providers, not only as a substitute of an own product, but also for preparing the curriculum. Pasquale says that translation into current languages should be available, as not all divers/hyperbaric workers are fluent in English. This arises a debate. English has become the internationally agreed language in offshore work and diving teams with mixed languages. In contrast to this, there are companies from Italy and other countries with all employees speaking a non-English language. We agree that for theory lectures (+ tests) translations are helpful, but also that communication problems are a major risk factor for safety of hyperbaric operations. This will be taken up in the manual chapter 5 "Occupational hazards and work specific risks".
- Revision of DMAC Guidance 13 (return to diving): The recently published version has been implemented in our guidance chapter and is already known by our members. It has been published in November 2022.
- **New guidance DMAC 35 on Pulmonary Oxygen Toxicity Calculation:** JW described why and how this guidance was designed and published. The detailed history is explained within the introduction of the guidance note. In the future, oxygen toxicity risk will be better calculated by the new score (ESOT) than by the former UPTD. The arguments and the definition of the new score has been published in UHM recently.

#### 4) Diving doctors databank: DIVEMEDREG.ORG

#### 5) Revision of EDTC-ECHM educational and training standards for diving and hyperbaric medicine 2011

One year ago, ECHM asked our group to cooperate for the future revision of these standards. They are well accepted and still working fine, however finetuning will certainly be needed after 13 years. Thus, a workgroup chaired by Peter Germonpré will start from now on and hopefully present a proposal for acceptance in one year, as agreed with the President of ECHM Jacek Kot. JW mentions that the "Training Objectives" (annex of the standard) shall get reduced versions representing the scope of a Level 1 and 2 course.

CH-Bienne, 22.09.2023

for the minutes record Jürg Wendling



SYNDICAT
NATIONAL des
ENTREPRENEURS de
TRAVAUX
IMMERGÉS





### EDTC 2023 Meeting Breda, The Netherlands, 28-30 September 2023

National Report Industry

### New Chairman

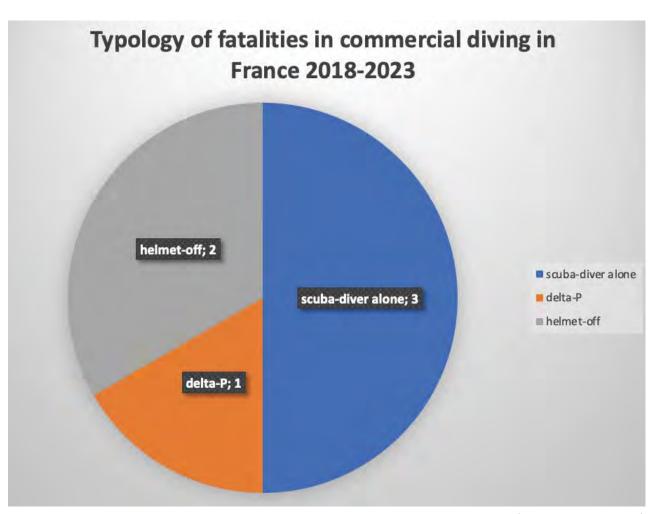
### **Arnaud LAVAL**

Commercial divers Cl II-A Company : SATIF-SA



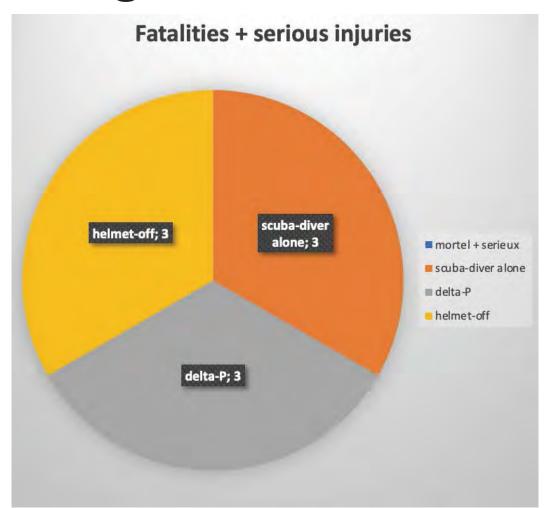
EDTC Breda 2023-France Industry National Report

### Fatalities commercial diving France 2018-2023



Year	Fatalities	
2018	4	
2019	0	
2020	1	
2021	0	
2022	1	
2023 (sept)	0*	

# Fatalities + serious accidents commercial diving France 2018-2023



Year	Fatalities	Serious accidents*	Total
2018	4	1	5
2019	0	0	0
2020	1	0	0
2021	0	0	0
2022	1	2	3
2023 (sept)	0	1	1

<sup>\*</sup>serious accidents: data non available ...

### Underwater works certification

- Mandatory since 2020 from any organisms (public or private) that realizes hyperbaric works in France
- More than 185 companies in « Mention A » (commercial diving)



### Commercial divers training

#### • 3 diving centers :

INPP, ENS, CAP-AFPA

#### • 2 mandatory certifications :

Certificat d'Aptitude à l'hyperbarie Classe II mention A (min. 8 weeks)

+

Titre Professionnel Scaphandrier des travaux publics

3 technical modules 13 weeks full time up to 2 years in work-study program

= Total min 21 weeks



### 2023 Events



### JOURNÉE TECHNIQUE EUROPÉENNE DE L'HYPERBARIE

29 JUIN 2023

## OPPBTP











### 2023 events



### Challenges for the next years

- 4 or more divers in most inshore works
- Safety recommandations published with the public prevention organizations and Ministry of Labour
- ?? Creation of an independent hyperbaric center of expertise ??



Notre partenariat avec l'OPPBTP se renforce avec Cédric PARODI et Paul Duphil. Nous allons bientôt faire paraître des fiches de bonnes pratiques, pragmatiques et exhaustives, basées sur des cas très concrets qui mettent en péril la vie de nos scaphandriers.

La première fiche "DELTA P" est en cours de finition et paraîtra très prochaînement

Ces fiches seront destinées à toutes les entreprises de TSM et nous avons la volonté féroce de les adjoindre dans un futur proche en annexes à notre réglementation hyperbare afin que l'ensemble de nos donneurs d'ordre puissent respecter les règles de sécurité auxquelles nous faisons référence.

Pour cela, nous comptons sur notre collaboration avec la Carsat Sud-Est représentée par Jean-Claude STEFANI et le Ministère du Travail avec Jean Galvé de Rochemonteix et Caroline Genon.

En attendant voici un premier mémo à partager sans modération à toutes les entreprises et donneurs d'ordre en lien avec les travaux subaquatiques : LES 12 ACTIONS DE PRÉVENTION EN TRAVAUX IMMERGÉS

See translation







EDTC Breda 2023

**Italy National Report** 

**Massimo Becherucci** 









2019 - 2020 - 2021 - 2022

report.dipvvf.it







#### Guaranteed underwater and aquatic rescue service 24/7:

operational capacity up to 50 meters in air and 80 meters in trimix



SAR with helicopter

Rescue cave and similar environments



- Self Contained Underwater Breathing Apparatus
- Surface supplay and controlled dive system













#### Guaranteed underwater and aquatic rescue service 24/7:

#### Operational responce:

24 Underwater and Aquatic Rescue Units (NSSA)

1 national diver training center (CAS) - Roma

1 Central Directorate for Emergency, aquatic risks contrast, nautical service and diver service - Roma

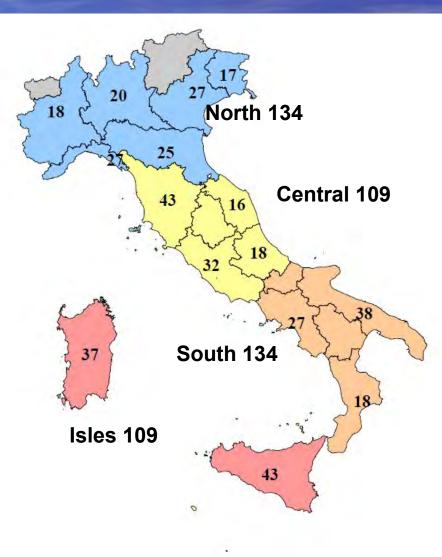






Real total force: 406 divers

Theoretical total force: 531 divers







#### Operational Model (all Underwater and Aquatic Rescue Units):

- SCUBA
- ordinary level cave diving
- Surface supplay dive system
- helicopter operations



#### Task Force (only a few Underwater and Aquatic Rescue Units):

- advanced cave diving
- integrated underwater instrumental research (ROV SSS DIDSON)
- technical SCUBA (trimix)











2019 - 2020 - 2021 - 2022



# **Operational Model**

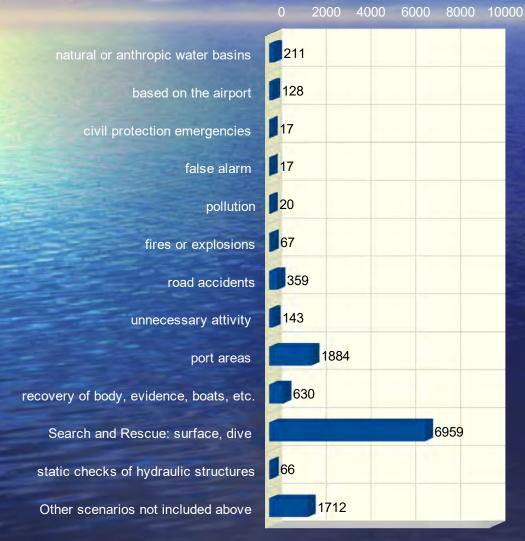
	Unit	operational capacity				
SCUBA	2 divers	SAR Elicopter	surface rescue	Ordinary dive up to 10 m	Rescue dive up to 50 m	
	3 divers or 2 divers + surface conductor	SAR Elicopter	surface rescue	Ordinary dive up to 30 m	Rescue dive up to 50 m	
	4 divers or 3 divers + surface conductor	SAR Elicopter	surface rescue	Ordinary dive up to 50 m	Rescue dive up to 50 m	
SCUBA/ Surface supplay dive system	5 divers or 4 divers + surface conductor	SAR Elicopter	surface rescue	Ordinary dive up to 50 m	Rescue dive up to 50 m	

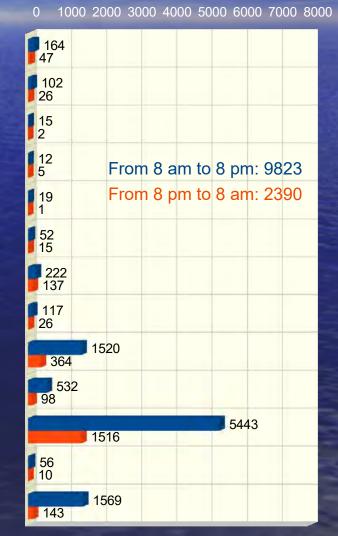


2019 - 2020 - 2021 - 2022



# total operational activities: 12213











# total operational activities: 12213

	2019		2020		2021		2022	
	From 8am to 8pm	From 8pm to 8am	From 8am to 8pm	From 8pm to 8am	From 8am to 8pm	From 8pm to 8am	From 8am to 8pm	From 8pm to 8am
	2774	726	2487	569	2435	549	2127	546
ă	79,26%	20,74%	81,38%	18,62%	81,60%	18,40%	79,57%	20,43%
	3500		3056		2984		2673	
	10010							
	12213							



2019 - 2020 - 2021 - 2022



## activity areas

#### geolocation map









2019 - 2020 - 2021 - 2022



#### Activity areas from 8:00 AM 8:00 PM

## geolocation map

# incidence map







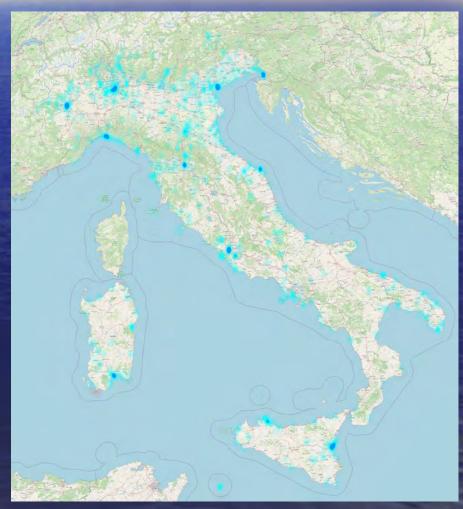
2019 - 2020 - 2021 - 2022



## Activity areas from 8:00 PM 8:00 AM

geolocation map

incidence map







# employment of men and vehicles

operational activities	12213
Total men employed	45841
Total vehicles employed	15891
men employed for each operational activity	3,8
vehicles employed for each operational activity	1,3





#### **Duration of the operational activity**







# incidence of the operating activity on the population

	NORTH	CENTER	SOUTH	ISLANDS		
population	26.547.000	13.398.015	12.083.617	6.640.000		
number of operational activities	6.563	2.572	1.370	1.708		
population/ operational activities	1 /4029	1/5181	1/8820	1/3887		
total	12213					





underwater accidents of fire brigade divers in the years 2019 – 2022:

1

no-fatal diving accident

Hours of diving per year: 8000

Divers: 406





# Thanks for the attention







# EDTC Assembly Breda September 29, 2023

# Working diving regulations in Italy The Bill number 1161/2023



# Pasquale Longobardi MD

Sant'Anna School of Advanced Studies (SSSA) Pisa (I) - Affiliate Researcher

AA Mistral Foundation- President

Italian Diving and Hyperbaric Medical Sociey – Vice President

Hyperbaric Centre, Ravenna (I) - Medical Director

direzione@iperbaricoravenna.it









400

The Chamber of Deputies



200

The Senate of the Republic

# **Italian Parliament**









# Diving regulations in Italy

1959

The Presidential Law Decree (D.P.R.) dated April 9, 1959 n. 128 n. 886 to regulate drilling, research and processing activities of hydrocarbon in National waters and in the continental platform

1979

The Presidential Law Decree (D.P.R.) dated May 24, 1979 n. 886 "Integration and adjustment to police rules set for mines and pits",

2010

UNI 11366 norm: Health and safety in diving and hyperbaric professional activities- Operative procedures"

2012

The Presidential Law Decree (D.P.R.) dated January 24, 2012 n. 1\*
"Urgent regulations for concurrence, development of infrastructure and competitiveness"

<sup>\*</sup> Published on the Official Gazette n. 19 dated January 24th 2012, supplement n. 18)







# The Presidential Law Decree (D.P.R.) January 24, 2012 n. 1

Art. 16 "Development of strategic National energy and mines assets", comma 2

"Activities listed in the Art. 53 of the D.P.R. dated May 24th 1979 n. 886 must be conducted according to the rules in force and to the operational guidelines as indicated in the UNI 11366 norm: Health and safety in diving and hyperbaric professional activities- Operative procedures".







# **UNI – Italian National Standards Body**



ITALIAN STANDARD Health and safety in diving and hyperbaric professional activities Operative procedures

**UNI 11366** 

JUNE 2010

The standard defines criteria and methods for commercial diving and hyperbaric professional activities, gears and equipment features and professional requirements of the people involved, to assure safety and health of the workers during their activities.









# The Bill number 1,161



May 18, 2023

Discipline of diving and hyperbaric activities.

Atti Parlamentari

- 1 -

Camera dei Deputati

XIX LEGISLATURA — DISEGNI DI LEGGE E RELAZIONI — DOCUMENTI

CAMERA DEI DEPUTATI N. 1161

Disciplina delle attività subacquee e iperbariche

CANGIANO, AMICH, ANTONIOZZI, BENVENUTI GOSTOLI, CERRETO, CIABURRO, COLOMBO, FRIJIA, LAMPIS, LONGI, MAIORANO, MAR-CHETTO ALIPRANDI, PADOVANI, SCHIANO DI VISCONTI, ZURZOLO







# The structure of the Bill

- Chapter (Capo) I: Subject, purpose, scope.
- Chapter (Capo) II: Diving and hyperbaric work, carried out by divers and hyperbaric operators, by Diving Contractors and hyperbaric work companies
- Chapter (Capo) III: Diving activities to training people for the diving excursions, the study of the environment, the video and photographic filming, as well as any other working assistance to the person who dives in his own leisure time.







f) sana e robusta costituzione fisica, esente da difetti dell'apparato cardio-vascolare e otorino-laringoiatrico nonché da alterazioni del sistema neurologico e psichico, accertata da un medico del Ministero della salute in servizio presso gli uffici di sanità marittima, aerea e di frontiera (USMAF) o presso i servizi territoriali per l'assistenza sanitaria al personale navigante (SASN), da un medico di un centro o di un servizio di medicina iperbarica delle aziende sanitarie locali, delle aziende ospedaliere o delle strutture universitarie provviste delle necessarie autorizzazioni regionali per la specifica attività, da un ufficiale medico appartenente alle Forze armate che abbia conseguito l'abilitazione o la specializzazione in medicina subacquea ovvero da un medico specialista in medicina del nuoto e delle attività subacquee o da un medico diplomato con master universitario di II livello in medicina subacquea e iperbarica, entrambi in possesso anche di una certificazione di livello IID riconosciuta dal Diving Medical Advisory Committee (DMAC) e dal sottocomitato medico dello European Diving Technology Committee (EDTC) e convenzionati o accreditati presso il Servizio sanitario nazionale; i medici cui alla presente lettera sono di seguito denominati « medici subacquei »;

# European Diving Technology Committee

Chapter II, article 6, comma f

Medical fitness to diving (FTD) may be issued by a physician who has been graduated from a DMAC-approved training course and who meets the recommendations of the EDTC medical subcommittee









- Il Comitato di cui al comma 1 è composto da:
- a) due rappresentanti del Ministero delle infrastrutture e dei trasporti;
- b) un rappresentante del Ministero del lavoro e delle politiche sociali;
- c) un rappresentante del Ministero della salute;
- d) un rappresentante dell'Istituto nazionale per l'assicurazione contro gli infortuni sul lavoro (INAIL);
- e) un rappresentante della Conferenza permanente per i rapporti tra lo Stato, le regioni e le province autonome di Trento e di Bolzano;
- f) quattro rappresentanti delle organizzazioni sindacali dei lavoratori e dei datori di lavoro maggiormente rappresentative a livello nazionale del settore subacqueo e iperbarico;
- g) tre rappresentanti delle organizzazioni didattiche italiane maggiormente rappresentative e diffuse nel territorio nazionale in campo subacqueo e iperbarico;
- h) il rappresentante medico per l'Italia nell'EDTC.

# Chapter II, Article 12, Comma 5. Technical committee for diving and hyperbaric activities.

The Committee includes:

(h) the Medical representative for Italy in the EDTC.







On Saturday, October 15, 2023 at 3PM in Bologna, during a diving activities fair (where 40 thousand people attend), the Bill will be presented to the public.





Sabato 15 ottobre Ore 15.00 Stand Fias (F28-E27)

Adolfo Magrin
Presidente Aisi
Associazioni Imprese Subacquee italiane

Modera:
Giovanni Esentato
Giornalista
Segretario AISI

Presentazione della proposta di legge 1161

"Disciplina delle Attività Subacquee"

# **Lorenzo Crevellin**

Assosub

Associazione Produttori e Operatori della Subacquea

## CONCLUDE:

On. Gimmi Cangiano

Deputato

Primo Firmatario PDL 1161







# **Diving Doctors Italy**

On site and 24-hour
Telephone Medical Support
and Service for Tunnelling
and Working Diving

Contact: Gian Luca Baroni E-mail: baroni.g@libero.it M +39-335-7016831





# **Enjoy the EDTC Assembly**

# EDTC Meeting – 29.09.23 Breda, NL

#### **Table of Contents:**

- 1. Authority / Medical update:
  - Norwegian Petroleum Safety Authority (PSA)
  - Norwegian Labour Inspection Authority (NLIA)
- 2. Workers Union update
- 3. Norway Offshore Industry update
- 4. Norway Inshore Industry update



# EDTC Meeting – 29.09.23 Breda, NL

#### List of representatives – Norway:

- Joar Gangenes Industry (offshore)
- Rolf Røssland Industry (inshore)
- Leif Morten Rasch Workers Union (IE)
- Martin Heer Medical
- Ulrik Jünge Government
- Bjarte Rødne IDRCF



# Norway – PSA Update

# Petroleum Safety Authority --> Ocean Industry Safety Authority from 01.01.24

We are since May 2023 reporting to the Ministry of Petroleum and Energy.

> Transfer from the Ministry of Labour and Social Inclusion

All petroleum activities in addition to:

- Land based petroleum facilities
- Mineral recovery from the seabed
- Renewable energy production offshore
- Carbon transport & storage





# Norway General Update

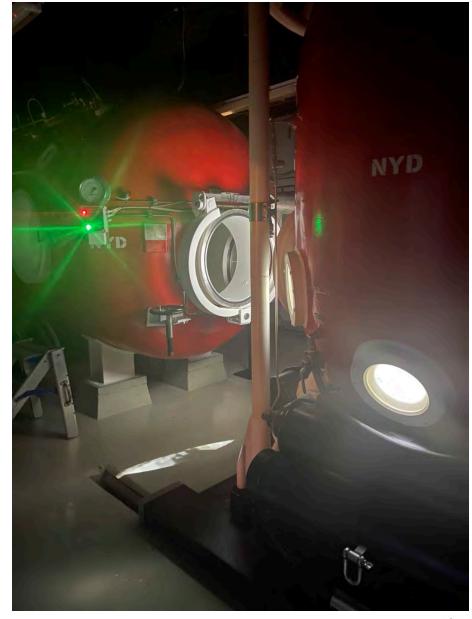
**Education of Divers & Dive Supervisors** 



# Norwegian diver training - NYD

## Statistics regarding certification numbers

- 171 PSA Class 1 Offshore air divers
- 8 PSA Class 2 closed bell divers graduating
  - 5 weeks training at NYD and INPP, in addition to 1 week online learning. DMT included
- 10 closed bell divers re-certified under Dutch certification scheme (For Boskalis)
- 52 air diving supervisors, which includes first aid as required in NORSOK U103, and NORSOK Leadership as required in NORSOK U100
- 18 air diving supervisor refresher training
- 36 underwater welders qualified to ISO 15618-1:2016
- 8 divers trained in new Norwegian industry standard for underwater concrete work
- 70 divers in non-offshore related courses (SAR, scientific etc.)
- 10.500 training dives conducted in total

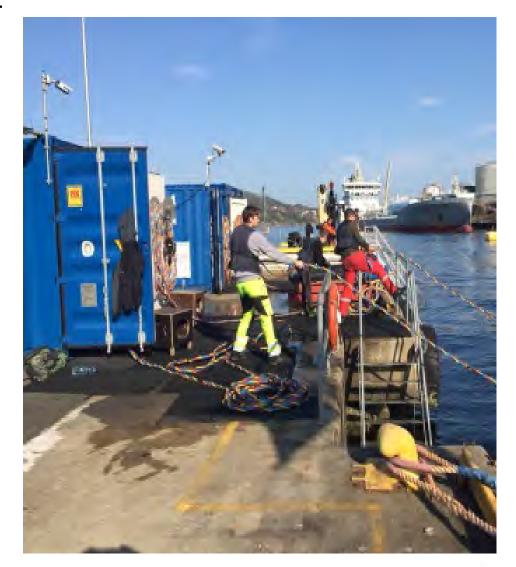




# Norwegian diver training - HVL

# Statistics regarding certification numbers

- 19 students 1 year vocational education
- 5 Rescue (2 weeks)
- 13 Rescue Dive Supervisors
- 8 rescue Dive supervisors (Refresher)
- 14 Dive Supervisors
- 9 Dive Supervisor (refresher)
- 9 First aid & Medical U-103
- 8 Diving Awareness course
- 20 rescue personnel Bristow





# Norway – PSA Update

#### Incidents & Accidents offshore under the PSA jurisdiction:

No accidents during offshore diving operations in 2023 (including land-based facilities)

6 minor incidents / first aid treatments since last EDTC meeting – No further actions

- > Ear infections
- ➤ Minor 1<sup>st</sup> aid treatments

Other: Routine maintenance on SPHL Mechanical failure:

Malfunctioning Digital Diesel Control unit





# Norway – PSA Update

#### **Regulations:**

- Renewable energy public hearing late autumn 2023
- No other changes in existing Petroleum regulations. (see below)

#### Petroleum related offshore

Petroleum Safety Authority Norway

Previously The Norwegian Petroleum

Directorate

#### **Petroleum related inshore**

Petroleum Safety Authority Norway

Previously The Norwegian Petroleum

Directorate

#### **Petroleum related offshore**

The Activities Regulation Section XIX, § 93 Manned underwater operations

§ 93 Manned underwater operations

#### **Petroleum related inshore**

Technical and Operational Regulation, Chapter VII Planning, operation and control during activities, § 63

§ 63 Diving operations



# Norway – PSA Update

# Diving Activity 2022-2023 under the PSA:

### Diving activity in Norway:

### 2022

- A total of 295 sat. & 30 surface supplied diving days in 2022 offshore
- A total of 83 surface supplied diving days at land-based facilities

### 2023

- 199 diving days in the 1st half of 2023 (sat & surface supplied)
- RNNP survey report on diving from 2022 published https://www.ptil.no/en/technical-competence/rnnp/rnnp-2022/rnnp-2022-questionnaire-survey-of-divers/https://www.ptil.no/en/technical-competence/rnnp/about-rnnp/

### Forecast 2024

Expect approx. the same level of diving activity following year





# Norway – PSA Update

## **PSA General Activity 2023:**

### Ongoing projects & activities

- Project for comparison of saturation procedures
- Pilot project national diving activity- & exposure register
- Pilot design study of app for divers' self-evaluation of fitness and health after diving
- County Governor of Rogaland recruitment of hyperbaric medical doctor

### Focus areas for next year

- Offshore wind: New regulation
- Continuation of ongoing projects
- > R&D







# National report

**EDTC 2023** 

Labour inspection authority Norway



# Inshore commercial diving

### Mission:

- > Increase the health and safety level in inshore commercial diving
- > Prevent work-related accidents
- > Contribute to a fully satisfactory standard and good practice in inshore diving

# Laws and regulations:

- ➤ Working Environment Act,
- ➤ Specialised regulations in the *Regulations concerning the performance of work chapter 26*Health and safety during work under water or under increased ambient pressure
  - Implemented several changes in the regulations in 2019 and 2020

# **Supervisory authority**

> the Norwegian Labour Inspection Authority (LIA)



# Inshore commercial diving – the population

### **Approx. 1300 commercial divers**

### **Sectors**:

➤ Construction diving:	250
➤ Fish farming:	400
> Rescue divers (fire brigades and the Norw. Society for Sea Rescue)	500
➤ Scientific divers og media/UWF:	100
➤ Instructors/guides of recreational diving	50

# > Approx. 180 registered diving companies

> Diving companies, including freelancers, are required to register at the LIA and renew the registration every 5 year.



# Supervision and guidance

### The LIA diving supervising group

- ➤ 6 inspectors, 2 specialized legal advisors
- ➤ Guidance and cooperation with safety representatives, trade unions, industry organisations, diving schools, authorities and professional diving organisations.

### > Supervision and inspection

- Oversees that diving companies, freelancers and diving contractors comply with the requirements of the working environment act and appropriate regulations, incl. the diving regulations
- ➤ Internal control audits reviews of enterprises' internal control systems
- ➤ Inspections check whether diving companies and contractors meet legal requirements and the enterprises' internal control systems function satisfactory
- > 158 audits and inspections during the period of 2016 2022
- > Violations of requirements in statues or regulations found in 63 percent of the inspections
- > 6 out of 10 inspected diving companies were required to implement measures to improve health and safety
- > Types of violations:
  - ✓ Unsatisfactory planning and risk assessment of diving operations, lack of safety and emergency procedures and lack of emergency response plan and the necessary training and exercise in the emergency plan, lack of necessary diving team and qualifications



# Concequences of violations

### Responses and enforcements by the LIA

- > Orders to correct the situation within a time limit
- > Coercive fines or violation fees in cases of serious violations
- > Shutdown of operations in cases of immident danger to the employees's life and health
- > Reports to the police

### **Investigating accidents**

> All serious and life-threatening accidents involving diving operations are investigated.



# Accidents/incidents in inshore commercial diving

# Commercial Diving is considered to be a high hazard activity

- ➤ 9 occupational diving fatalities in the period of 2004 2016
  - ✓ 5 in construction diving
  - ✓ 3 in shellfish diving
  - ✓ 1 in fish farming
- ➤ Several reports of major accidents and decompression sickness 2017 2022:
  - > Reported accidents: 13
    - ➤ Underlying causes: related to physical work load and repetitive diving for several consecutive days, lack of necessary familiarization and practice for unexperienced diver, lack of necessary planning and risk assessment of diving operation and lack of appropriate safety procedures, diving equipment failures.
  - > Reports from medical personnel of decompression sickness: 16
  - ➤ Information of several serious incidents that are not reported and not handled satisfactory by the company,



# Recognition of professional qualifications - 2022

- 30 applications
  - ➤ 12 requiring aptitude tests
  - ≥20 approvals
  - ≥ 10 refusals

- > UK
- **≻**Spain
- **≻** Netherlands
- **≻**Sweden
- **→** Portugal
- **≻**Israel
- **≻** Denmark
- > France
- **≻** Australia
- ➤ New Zealand
- > USA
- ➤ South Afrika
- **≻**Germany





# INDUSTRI ENERGI

UNION REPORT from Norway - EDTC 2023





# Lack of permanent employment and underreporting

- Diving is relatively well regulated in Norway, from a safety perspective.

\_

- Offshore, divers are mainly covered by the Working Environment Act, but with elements of maritime legislation. Most divers are employed on Singapore contracts, with no permanent employment. The divers are also not covered by statutory insurance and social security schemes like the rest of the employees in Norway are. The dayrate regime, also called O-hour contracts, leads to a reluctance to report incidents/near misses. Underreporting is described in DnV-report to Equinor "Risk Assessment of Manned Underwater Operations Report No. 2021-0163, Rev. 0
- The Working Environment Act has now been tightened, so that permanent employment shall prevail among the majority of the workforce
- We need better reporting routines, which divers can trust. This applies to diving both offshore and inshore. We at Industri Energi perceive this to be an international challenge.

-



# Lack of regulation for scallop divers

- The Working Environment Act has been adopted for all inshore diving in Norway. We expect the law to come into force from the New Year. This means that some of the diving that has taken place from a boat, and which was previously under jurisdiction of the Norwegian Maritime Authority, is now under jurisdiction of the Norwegian Labour Inspection Authority. Some accidents at work inshore, with fatal outcomes, that are outside the Petroleum Safety Authority's jurisdiction, are not investigated because neither the Labour Inspection Authority nor the Norwegian Maritime Authority have the legal authority to investigate the accidents at present. This is especially true for the scallop divers.
- It is important that the clients become more responsible for inshore diving operations than is the case today.
- We find that there is considerable underreporting of near-misses inshore. We also have indications that some cases of decompression sickness in inshore diving are not reported, and this diving is carried out outside the Petroleum Safety Authority's jurisdiction.



More hyperbaric medical research and research on the working environment.

Good dialogue with the authorities is important.

- We are concerned about the low level of activity in hyperbaric medical research in Norway and internationally. For the sake of the divers, it is extremely important that research related to the divers working environment is carried out. Not the least, research on the psychosocial working environment and mental health is important. Independent research on the effects of different diving tables (both surface oriented and saturation) seems to be a desire of divers.
- We have a good dialogue with the authorities in Norway and hope to solve several of the divers' challenges in the coming years.

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# Norway – Offshore Industry Update

## **General Activity in Norway 2023:**

- This year has been busy and kept more than 1 DSV operational this year (combination between TechnipFMC and Subsea7)
- Kobra East Gekko subsea development for AkerBP ongoing and continue operation until approximately year end.
- Focus areas for next year will be continue the good reporting statistics and the cooperation between different stakeholders.



# Norway – Offshore Industry Update

Combination of animation and video



# Norway – Offshore Industry Update

### **Industry Standards**

NORSOK U-100, under revision (Diving Operations) and plan is that new revision will be ready in 2024

- Restructuring of the Standard with similar split as IOGP Diving standard
- Specific requirement for Operators Representative onboard
- More detail requirement for Health section.

NORSOK U-101 is planned to be changed to an ISO Standard (Equipment standard for breathing capacity)

• The process towards ISO is ongoing, but depending on time for review will determine when it will be issued

### General

- <u>Heart starter for saturation diving</u> implemented on the DSVs
- Sanondaf used in combination with Fog gun for disinfection of chambers and bells
- Defib unit which can be used in saturation chambers
- Research funding ongoing in Offshore Norway where we look into funding Diving research capacity at Medical Universities (MSc, PhD, Post-Doc) for next 3 years as first step and during these 3 years work on future research capacity for next 15-20 years
- Bergen International Diving Seminar 7-8 November 2023.



# Norway – Inshore Industry Update

## **General Activity in Norway 2023:**

- Approx 175 registered Diving companies/organizations registered with the Norwegian Labor Inspection Authority.
- Not a complete national register over in-shore operational diving activity.
- Five Norwegian Diving Contractors create a new, nationwide group within diving and shallow water services.
   (Dykkerteknikk AS, IMC Diving AS, EB Marine AS, Anleggsdykk AS, and Olav Erik Hagen AS)
- Kalstø Norway's most extensive and longest-running diving operation is now history. (Installation 1982 1983. Then repair jobs until today)
- No known major diving projects (like Kalstø installation) planned for in the near future.



# Norway – Inshore Industry Update

# **General Activity in Norway 2023:**

### Offshore Wind

- Regulated under PSA
- Not much diving activities in Norwegian projects

### Offshore fish farms

Potential area for diving operations.









# Norway – Inshore Industry Update

### Other:

- Revised edition (2022) of the Norwegian Concrete Association Publication no. 5 "Performance of concrete work in water"
  - New in the 2022 revision Appendix B "Rehabilitation of concrete in water"
  - New Competence requirements for Dive supervisors and Divers.
  - Recognized by The Norwegian Public Roads Administration



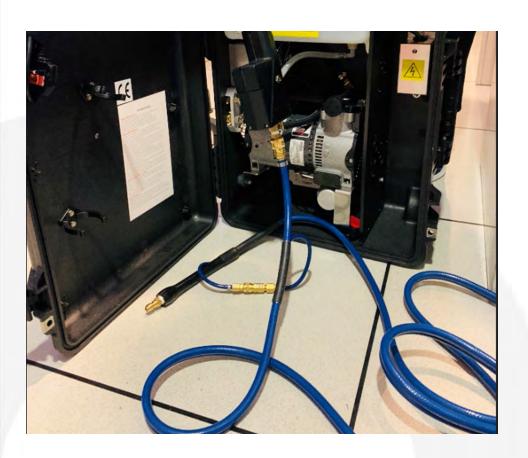












### 3.2 OVERVIEW OF COMPLETE ASSEMBLY

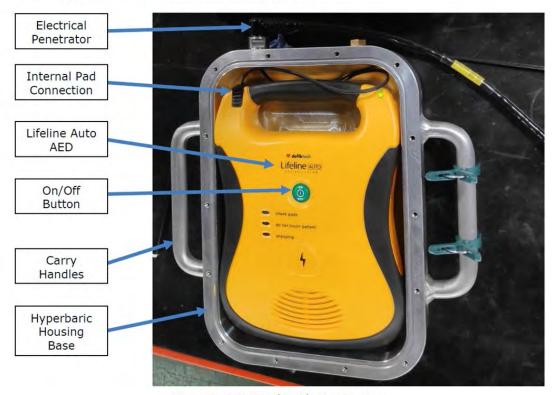


Figure 4 - AED Fitted Inside Housing Base



# Swedish report 29 Sept 2023 Breda

# **EDTC Courses**

# **New EDTC FTD Heart score!**



# Swedish report Sept 29 2023 Breda

Courses: 2023- EDTC MED x 2 one Swedish Defense, one University

Swedish law: Medical examination of working divers should be done according to EDTC protocols (except military divers)



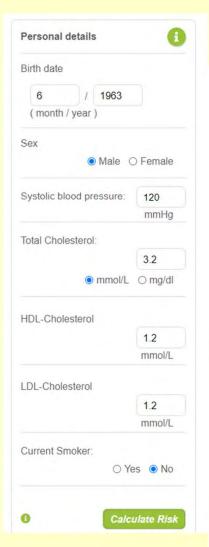
# **Heart score >40yrs?**

**Problem**: Stress ECG low prediction of cardiovascular events

**Heart score**: (European Heart score 2021) Based on age blood pressure, blood cholesterol, weight, hereditary factors, smoking

Predicts cardiovascular events (infarction, stroke) next 10-years

Advantage: Preventive (weight, diet, blood pressure)



# Example Heart score 2

### Your results

### Examination date:

28 September 2023

Age: 60 (6/1963)

Systolic blood pressure:

120 mmHa

HDL-Cholesterol: 1.2 mmol/L

Current Smoker: No

Sex: Male

Total Cholesterol: 3.2 mmol/L

LDL-Cholesterol: 1.2 mmol/L

### Your results

Examination date:

28 September 2023

Age: 100 (6/1923)

Systolic blood pressure:

120 mmHg

HDL-Cholesterol: 1.2 mmol/L

LDL-Cholesterol: 1.2 mmol/L

Sex: Male

Current Smoker: Yes



Your 10-year risk of fatal and non-fatal CVD events is \*:

5%



For a person of your age. the Guidelines recommend a 10-year CVD risk:

< 5%



Your 10-year risk of fatal and non-fatal CVD events is \*:

37%



For a person of your age. the Guidelines recommend a 10-year CVD risk:

Total Cholesterol: 3.2 mmol/L

< 7.5%



Healthy Lifestyle Advice: 150 - 300 min/week of moderate intensity or 75 - 150 min/ week of vigorous intensity aerobic physical activity, or an



Prevention goals

Stop smoking and

lifectule ontimization



**University of Gothenburg** 

EDTC Sept 29 2023 Mats Hagberg MED Sweden 4

# **Threshold**

>10%

Medication: blood pressure

Diet: kolesterol

Further cardiovascular exminations (e.g. stress ecg)

NO smoking





# **EDTC**

**Breda, The Netherlands** 

Peter Sieniewicz

29 September 2023





- 1. IMCA Expands list a recognised qualifications
- 2. IMCA Diving CPD Scheme
- 3. Amendments to IMCA Offshore Diving COP D 014
- 4. Development of the new IMO International Code of Safety for Diving Operations
- 5. IDRCF *Update*



# IMCA Expands list of recognised qualifications



# **Diver and Diving Supervisor Certification**

### **Information Note**

No. 1394 – Revised August 2023

- 2.2 Comparable Certificates
- IMCA has entered into recognition arrangements with the following organisations:
- Australian Diver Accreditation Scheme (ADAS)
- Diver Certification Board of Canada (DCBC)
- Netherlands Diving Centre Certification Institute (NDC-CI).
- Under these arrangements, the following certificates are recognised by IMCA as being appropriate for diving supervisors for the purposes of compliance with IMCA guidance:
- ADAS offshore diving supervisor
- DCBC offshore diving supervisor
- NDC-CI offshore diving supervisor (category B4 surface demand equipment to 50 metres including wet bell).
- 2.3 Continuing Professional Development (CPD)
- In 2021 IMCA introduced a mandatory diving supervisor CPD scheme. In order to be considered 'in-date' by IMCA, all diving supervisors who wish to maintain the validity of their IMCA recognised certificates are required to undertake appropriate CPD in accordance with the requirements of the IMCA Diving CPD scheme, and to satisfy IMCA that this has been done. Details on the scheme are available at www.imca-int.com/cpd.
- The IMCA Diving CPD App provides a platform to facilitate this. App registration is open to all IMCA certified diving supervisors, and registrations are also accepted from ADAS, DCBC, and NDC-CI certified diving supervisors. Users can share their progress and CPD status via the app.

© IMCA 2024



# IMCA Diving CPD Scheme

# Extension of Diving Supervisor CPD Scheme to Trainees





- IMCA has made the necessary amendments to allow CPD registration for trainee diving supervisors.
- New trainees will be provided with six months access for free, to encourage their participation.
- Information Note published.





### **Extension of the IMCA Diving Supervisor CPD Scheme to Trainees**

In April 2020 IMCA launched its diving supervisor continuing professional development (CPD) scheme and app. Since then, the scheme has been highly acclaimed by supervisors, contractors and clients and has proven to be an effective tool for keeping supervisors up to date with the latest information and recent changes in IMCA guidance. To date, 97 CPD modules have been created and tested by industry experts.

IMCA is pleased to announce that the scheme has now been extended to trainee air and bell diving supervisors. Enrolment on the scheme is not mandatory for trainees. However, IMCA encourages trainees to join the scheme to keep them informed and up to date as they embark on this safety-critical career. Enrolment also prepares them for when they qualify as diving supervisors, at which point enrolment and successful completion of the latest units is then mandatory for their certificate to remain in-date.

### **Trainee Enrolment**

Providers of approved training courses are required to submit trainee data to IMCA within five working days of course completion and it should be live in the IMCA system shortly thereafter. This has been a requirement since Jamury 2023, but providers have also been invited to submit data covering the past three years.

Trainees wishing to access the diving supervisor CPD app are automatically sent details on the CPD scheme and how to register by email. To confirm registration and enable IMCA's monitoring and quality control processes to be undertaken, trainees (for 2023 onwards) must complete a short online course evaluation survey. Once this is completed, they will automatically be invited to enrol for access to the CPD app via a restricted link. Verification of eligibility is based on trainee data held by IMCA, so trainees may need to contact their provider if the data is not yet in the IMCA system.

Trainee diving supervisors are permitted free access to the app for a period of six months. From 1 July 2023 this will be six months from the last day of the training course. Those who attended courses prior to this but are still holding a valid certificate will be given free access until the end of 2023. After this time an annual fee of £100 (GBP) will apply, in line with the annual revalidation fee for IMCA diving supervisor certification.

### **Verification and Progress Sharing**

Members are strongly encouraged to use the IMCA verification portal at www.imca-int.com/verify to ensure that the certificates presented to them are genuine and that CPD, where required, is in-date. For trainees, certificates issued by providers of IMCA-approved courses can now be verified via this portal in addition to all IMCA-issued certificates.

As CPD is not mandatory for trainees, CPD progress is not included in the verification results. However, users of the system can share their progress directly via the CPD app where appropriate.

For more information, please contact ac@imca-int.com.

### **Related Guidance**

IMCA D 013 IMCA offshore diving supervisor and life support technician certification schemes.

© IMCA 2024

# Expansion Diving CPD app to offshore diver training instructors





- IMCA has now also made the necessary amendments to allow CPD registration for instructors teaching on IMCA recognised offshore dive training courses
- IDRCF Members will be required to provide a list of training schools and forward the registration documentation to them
- Information Note 1394.





### Availability of Diving CPD for Diver Training Instructors

IMCA is expanding the availability of its popular Diving CPD app to offshore diver training instructors at schools providing IMCA-recognised offshore diver certification. This will be available through members of International Diving Regulators & Certifiers Forum (IDRCF) and other certifying bodies recognised by IMCA (as set out in the latest revision of information note 1394).

IDRCF members and other certifying bodies will be provided with nomination forms for circulation to their schools and will be required to provide IMCA with a list of these schools. Schools offering these certificates will then be able to nominate their offshore training instructors/supervisors for access to the app.

Once verified, those individuals will be registered by IMCA and sent a link to complete the registration process via the IMCA website, where they will be required to pay a discounted annual fee of £50. On payment, access to the app will be provided to the diver training instructor.

Should a school cease to be approved or become unable to deliver offshore diver training programmes, the IDRCF member (or other certifying body) will be required to notify IMCA. Should an instructor cease working for a school offering IMCA-recognised offshore diver certification, that school will be required to notify IMCA. IMCA reserves the right to withdraw access for individual instructors or schools for non-performance in accordance with IMCA bye-laws.

Diver training instructors will not appear in search results of the IMCA verification portal (www.imca-int.com/verify). Instructors will be able to share their CPD registration and progress via the app.

Direct online registration will not be available - all registrations must be via the above nomination process.

For more information, please contact Peter.Sienieiwicz@imca-int.con

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# Changes to IMCA Diving COP D 014

# IMCA D 014 Rev. 3.1 IMCA Intl COP for Offshore Diving



#### 1.4 Work Covered by the Code

This code is intended to provide advice and guidance in respect of all offshore diving operations carried out anywhere in the world.

IMCA defines offshore diving operations as underwater works that are carried out by divers in support of the construction and maintenance requirements of the offshore oil & gas and renewable/alternative energy industries at sea:

- outside the territorial waters of a country (normally 12 nautical miles or 22.2 kilometres from the low water line); or
- inside territorial waters (within the 12 nautical mile limit);
- where closed bell or saturation diving techniques are used (both within and outside the 12 nautical mile limit);
- where diving takes place from vessels maintaining station by the use of dynamic positioning.

This will include all diving operations undertaken in connection with offshore installations, wells and pipeline works, floating production systems, loading buoys, and renewable energy structures, e.g., wind farms.

This code does not cover commercial diving operations carried out in support of underwater ship husbandry; salvage works; inland/inshore civil engineering or harbour works; or in any case where operations are not conducted from an offshore structure, vessel or floating structure normally associated with offshore oil & gas or renewable/alternative energy industry activities.

# IMCA D 014 Rev. 3.1 IMCA Intl COP for Offshore Diving



#### 7.5 Communications

Effective communications are essential to ensure that all personnel directly involved in operations are made fully aware of the work being undertaken and that during operations all parties are kept aware of the status of any unusual situation.

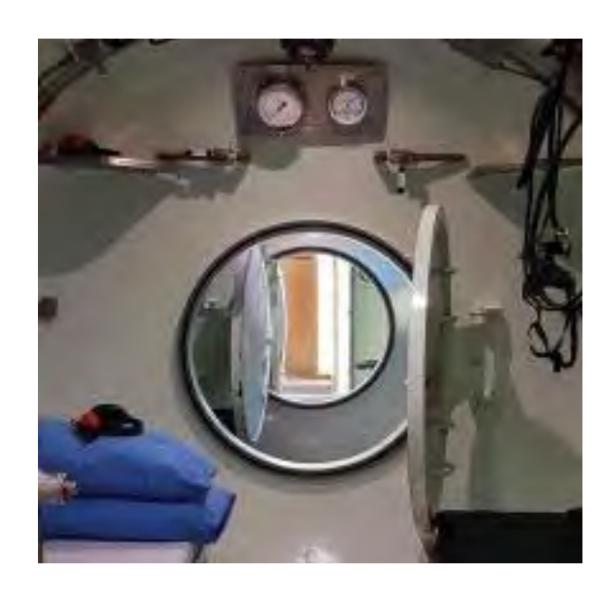
Communications between the diving team and any other relevant personnel (such as marine crew, DP operators, crane drivers) are important to safe and efficient operation (*Ref. IMCA M 103, IMCA M 205, IMCA D 023, IMCA D 024, IMCA D 037, IMCA D 040, IMCA D 053*).

On a DP diving support vessel/floating structure, in addition to the primary and secondary means of voice contact between the bridge and diving supervisor, there also needs to be a set of DP alarms in the diving control centre. There should be direct communications between the dive supervisor and the DP desk without having to go through a third party e.g. a shift supervisor or foreman who is on the bridge.

# IMCA D 014 Section 4.14 - Therapeutic Recompression / Compression Chamber



- Where surface-supplied diving operations are conducted inside territorial waters (normally 12 nautical miles or 22.2 km from the low water line) in less than 10 m (33 ft) of seawater, the therapeutic recompression chamber may be made available at a suitable onshore location
- In such circumstances a risk assessment should be conducted to ensure:





- 1. The travelling time to the chamber location is as short as reasonably practicable. Under no circumstances should the travelling time be more than 2 hours from the dive site. Transit times should be established/confirmed by physical (not just desktop) trials;
- 2. Any reasonably foreseeable time delays that may occur are taken into account e.g., delays due to changes in weather conditions, currents and tides; traffic congestion etc.;
- 3. The therapeutic recompression facility will be available and fit for use at all times during the course of the diving project;
- 4. The therapeutic recompression facility will always be appropriately manned by competent persons should it become necessary to use the therapeutic recompression facility during the course of the diving project;
- 5. Sufficient oxygen is available for the duration of the transfer of an injured diver to the designated recompression facility (Ref. IMCA D 050). Oxygen should be provided by means of a suitable oxygen administration set.





Development of the new IMO International Code of Safety for Diving Operations



# Development of the new IMO International Code of Safety for Diving Operations

• Also includes merging IMO Resolution A.692(17) *Guidelines and Specifications* for Hyperbaric Evacuation Systems(the IMO HES Guidelines) into the new Diving Code.





# Khoosha1

- 6 sat divers killed in sinking.
- Vessel fitted with a temporary saturation diving system and project equipment.
- Vessel was overloaded & unstable.
- Capsized in rough weather in Arabian Gulf and sank very rapidly.
- 13 fatalities, including the divers.



© IMCA 2024 15



# 2023 Diving Code –Key Improvements

- Will apply to all ships-carrying diving systems irrespective of type (fixed or temporary, surface supplied or saturation).
- For the first time the surveyor will be able to
- Check the suitability of all diving systems irrespective of type.
- Check the suitability of the ship to act as a Diving Platform.
- Check that suitable arrangements are in place for evacuation of the divers from the ship and all the way to a place of safety.
- Check that the ship's safety management system for compliance with the ISM Code includes diving operations and is aligned with the diving organisation's safety management system.

# Other Checks



- The "other integration checks" set out in the New Code will cover appropriate integration of the diving system with vessel services e.g. power, water, air, hydraulics etc.;
- the suitability of the vessel to act as a diving platform;
- the means whereby appropriate risk control arrangements for diving operations are integrated into the vessel ISM system, including suitable arrangements for the emergency evacuation of divers.
- for the first time, the Diving Unit surveyor will have a full scope of work to complete for all types of diving system –surface and saturation, fixed and temporary.



Upon finding a suitable diving platform, the current Pt II is forwarded to the Diving Unit's RO



PT II sub-part support certificate





Diving Unit surveyor accepts PT II on behalf of the Administration. The DU surveyor checks diving system installation and performs all the other integration checks set out in the new Code.



Diving unit surveyor signs PT I and so issues the DUSC, which is the "trading certificate"



# IDRCF Update



# IDRCF Report

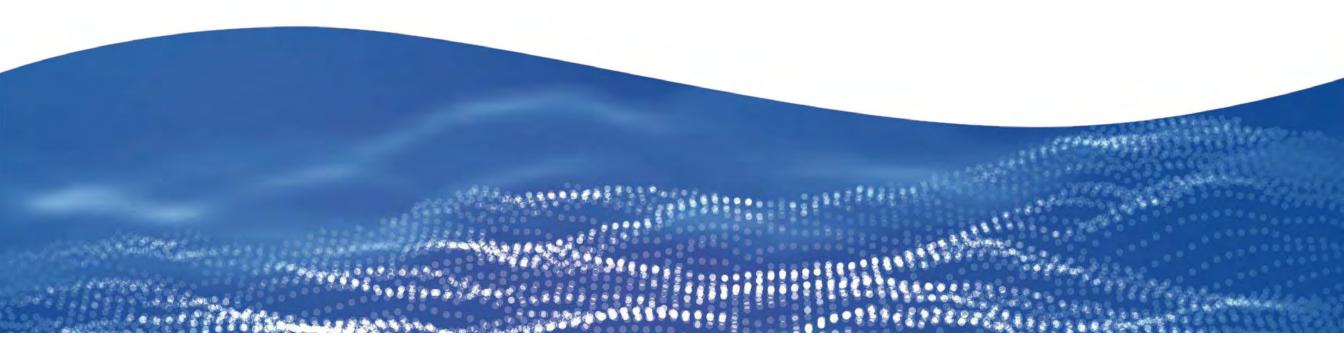
- 2-day meeting
- Walk through and discussed the revisions to date of the proposed changes to the IDRCF Bell diver training standard
- Reviewed and agreed the revised Terms of Reference for IDRCF
- Brought all present up to date with changes to the various training standards and numbers of students training in the past year as the countries and schools emerge from the COVID period.
- Agreed to start work on an SDDE minimum offshore diver training standard to be recognised by all for the purposes of training and for mutual recognition.



## **International Marine Contractors Association**

Improving performance in the marine contracting industry

www.imca-int.com





# **EDTC**

**HSE Update** 

Breda 2023



- Accidents and Incidents
- Enforcement
- Commercial diver training-
- Worldwide fatalities



#### Reported Accidents and Incidents (01.04.22 to 01.04.23)

#### Offshore:

#### 4 dangerous occurrences

Helment leak
Cobra HP gauge leak
Bell not coming into cursor correctly
Loss of DP

1 "over 7-day injury"

Injured hand during lifting operations

Inland/Inshore:

1 fatality

Diver crushed during dismantlement of suspended wreck

2 dangerous occurrences

AGA exhaust came loose – rapid ascent from 19m Cylinder valve assembly blew off

1 "over 7-day injury"

Sliced hand on the surface cutting a cable tie.



#### Reported Accidents and Incidents (01.04.22 to 01.04.23)

Police
 1 dangerous occurrence

AGA exhaust valve fell off.

Scientific/Arch
 1 dangerous occurrence

Excessive lube on twinsets blocking filter

Shellfish1 fatality

Electrofishing – unknown, but equipment poor

Recreational at work1 fatality

PADI AOW course – student medical issue

Media
 No incidents

Military
 No incidents





- failure to report a Dangerous Occurrence
- Inadequate control of welding fumes
- Insufficient emergency Oxygen
- No project plan (swimming pool work)
- Insufficient emergency Oxygen; no means of diver recovery (x2)
- No project plan; team size of 2! (x2)
- Fatality Planning of dive, insufficient risk assessment (x2)
- Fatality Planning and coordination of safety
- Supervisor not qualified, no planned maintenance, no risk assessment (x3)
- No operations log, SCUBA used under moving floor of swimming pool (x2)





- Fatality Team size delay in recover of diver
- Fatality No lifeline or 2-way communications
- Fatality Safety management of diving
- No medical for shellfish diver x3 individual notices.



#### **HSE Enforcement Notices – Recreational diving at work**

- Fatality Team size
- Fatality Emergency recovery equipment
- Fatality Lack of diver medicals
- Fatality Lack of risk assessment

No medical for at work instructor

#### **Enforcement – Prosecution – Jan 2023**



An instructor has been sentenced after a novice diver drowned during a training session.

The Health and Safety Executive (HSE) said Lance Palmer was responsible for "multiple failings" following the death of Roger Clarke in Stoney Cove, Leicestershire, in June 2018.

Mr Clarke's wife says she now fears water following her husband's death.

Palmer was ordered to pay £3,085, including a victim surcharge of £85, and carry out 50 hours of unpaid work.

The HSE said Mr Clarke, 55, from Stafford, took part in the dive that was planned, managed and supervised by Palmer.

The father-of-two had enrolled on an entry-level Technical Diving International (TDI) Closed Circuit Rebreather Course, the HSE said.

It said its investigation found Palmer was responsible for multiple failings, including:

- Not adequately maintaining and checking students' breathing apparatus
- Failing to remain in close enough proximity to monitor his student, which meant he did not notice the audible and visual alarms sounding on breathing apparatus
- Contravening rules for exceeding maximum diving depths on repeat dives
- Failing to have an adequately-qualified rescue diver in the water with him and the student





# **Diver Training: Schools**



The Professional Diving A	Academy (Dund	oon) TU	J, SS, SCUB <i>i</i>	Α

Commercial Diver Training (Fowey)

TU, SS, SCUBA

Police Scotland Police SS, SCUBA

Northumbria Police (NEW) Police SS, SCUBA

Plymouth University SCUBA

TH Diving Services (Plymouth) SCUBA

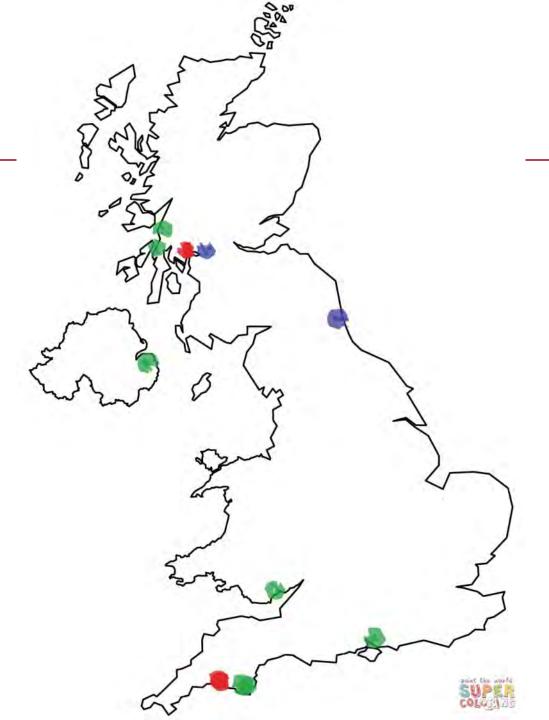
DV Diving (N.I.) SCUBA

Tritonia Scientific Ltd (Dunstaffanage) SCUBA

Puffin (Oban) SCUBA

Andark (Southampton) SCUBA

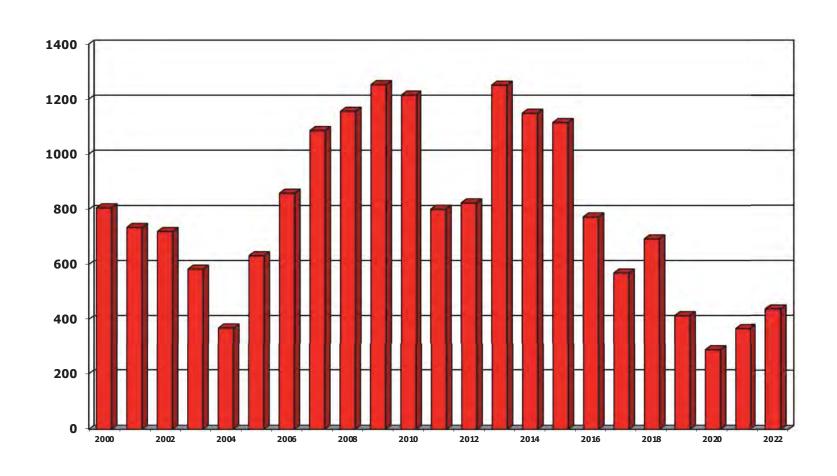
Bristol Channel Diving Services (Cardiff) SCUBA







### Number of certificates issued - 2022: 438



#### **Certificate breakdown**







#### Complaint about divers' experience for Closed Bell Course

- IDRCF Closed Bell competencies require that since qualifying as an an offshore surface supplied diver that they have
- a) At least 100 dives using SSBA, and
- b) At least 100 hours of bottom time.

The above dives and bottom time are to include 20 dives over 15 metres.

The above dives and bottom time are not to include any dive time undertaken at a depth of less than 6 metres.

- HSE received a complaint that there were two divers with closed bell qualifications who didn't have this prior experience.
- INPP in Marseille and CDA in Australia both provided assistance to HSE, as to what had been submitted. One diver had gone to each school.

# Diver 1 (who went to INPP)



- Claimed to have lost his logbook.
- I requested details of all contractors he had worked for since qualifying (June 2019).
- Took statements from dive contractors and recreated his diving history.
- 28 dives over 6m and only 1 over 15m.
- Worked with police as fraud involved.





- Requested log book for the 20 dives deeper than 15m.
- Received logbook scans for all 20 dives.
- Verified 10 of these with offshore contractor all accurate.
- Verified 10 inland dives with another contractor they "no longer had records, but could remember the diver working for them".



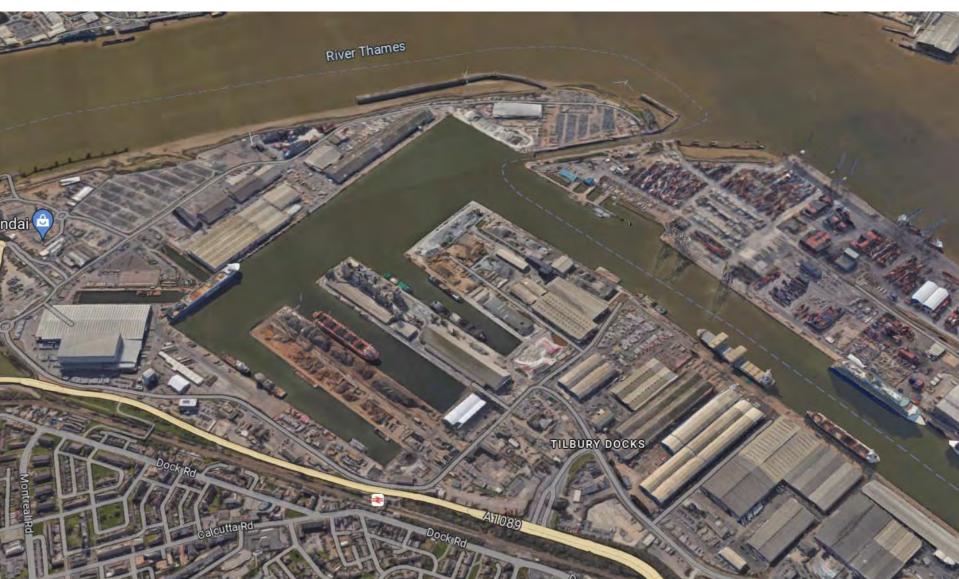
# Checked logs again.....

Dive	1	2	3	4	5	6	7	8	9	10
LS	10:30	09:30	09:40	10:20	09:45	08:20	09:05	08:30	10:40	12:10
ВТ	60	30	25	18	31	50	35	40	40	20
AS	11:32	10:00	10:05	10:38	10:16	09:10	09:40	09:10	11:00	12:30
LS	06:43	06:37	05:11	06:40	07:07	04:38	06:59	08:39	08:04	09:52
ВТ	55	57	53	134	55	112	57	56	59	60
AS	07:39	07:36	06:04	08:56	08:02	06:30	07:56	09:56	09:01	10:54









# And...



- Statement from Harbour master no diving on those dates
- Tide tables v depths didn't coincide
- Worked with police as fraud involved by both diver and "supervisor".

### **Outcome**

Divernet » Scuba News » Health & Safety

Commercial divers convicted for fraud



- Both divers the supervisor involved were interviewed "under caution" by police and HSE.
- All admitted "fraud by false representation" and received police cautions (1<sup>st</sup> offence, cooperation etc.).
- Firearms licence revoked for one diver.
- Other diver lost his job.
- Criminal records for all 3.
- ADAS and INPP revoked diver certificates.
- HSE and Police gained significant publicity re. case.

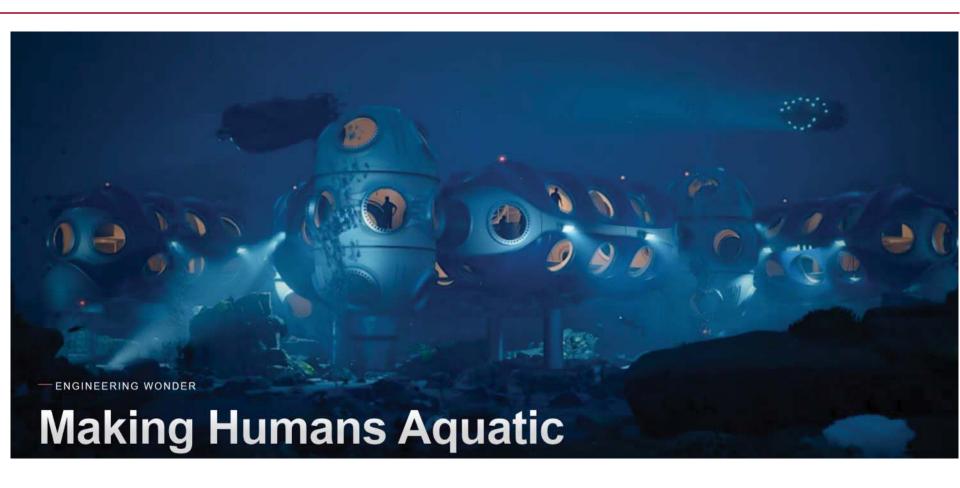
## **Certificate fraud**



- IMCA checked diver certs with HSE.
- 7 fraudulent HSE Surface Supplied (Top-up) certificates were submitted to IMCA by an overseas contractor.
- Please check all UK certs with HSE
- email: <u>diving@hse.gov.uk</u> with a scan of the cert.

## **Diver training - The future??** Deep.com

















#### **Worldwide Fatalities 2022**



- Sri Lanka Crocodile attack
- Chile SCUBA fish farm nets
- Chile SCUBA fish farm
- USA SCUBA cave
- Trinidad and Tobago 4 divers SCUBA pipeline Differential pressure
- France SS medical issue
- Panama NK Hull cleaning
- USA NK Canal dredging trench wall collapse no standby diver
- USA SCUBA Electrocution? Solo dive under barge. Alcohol?
- Australia SCUBA drug smuggling
- UK SS Crushed during wreck dismantling
- USA SCUBA removing weeds, failed to surface
- Malaysia Offshore diver dragged to 55m by failed rigging
- USA SCUBA police diver training
- Chile SCUBA fish farm
- Holland SCUBA instructor killed by ejected pillar valve
- Canada SCUBA sucked into sluice gate that was being investigated Differential pressure
- Holland NK –Arnhem sluice complex Differential pressure
- Kuwait NK Doha power plant diver drowned
- UK SCUBA electrofishing
- UK SCUBA recreational under instruction

#### **Worldwide Fatalities 2023**



- USA SS storm drain work no details
- Venezuala SCUBA trapped by a bilge pump Differential pressure
- Guam SCUBA Rebreather telecoms contract work, diver missing
- Panama SCUBA Hull cleaning sea intake entrapment Differential pressure
- USA SCUBA vehicle recovery under ice freeflow at 29m
- Greece NK Vessel husbandry sucked into cooling water inlet Differential pressure
- Taiwan Hull cleaning seawater inlet Differential pressure?
- South Africa SS Vessel husbandry umbilical trapped in brush cart band mask removed
- UAE SCUBA Vessel husbandry no lifeline/comms failed to surface.

#### **Questions?**











### Welcome to Breda

The Netherlands



# From Certification to Registration

Netherlands: Working under overpressure

#### **Erwin Helderman**

- Teamleader NDC-CI
  - Chairman College of experts Civil sector
    - Representative civil sector development of the registration scheme's Representative civil sector in Central Exam Committee

#### Working under overpressure includes:

- Inshore
- Offshore
- Shipping
- Salvage
- Caisson labor
- Hyperbaric medicine

- Governmental
  - Fire department
  - Police
  - Customs
  - Defence
  - Archaeology
- Scientific diving
- Zoo divers

#### From Certification to Registration

And how this is organised

- Situation pre 2012
- Organisation in the certification era (pro's and con's)
- Planned organisation in the registration era (pro's and con's)
- Future

#### With scheme's regulated professions

- Diver
- Diving supervisor
- Dive medical attendant
- Diving physician

#### Scopes

### Diver and Diving supervisor Certification

- A1 -SCUBA 9 m
- A2 -SCUBA 15 m
- A3 -SCUBA 30 m
- B0 -SSE 9 m
- B1 -SSE 15 m
- B2 -SSE 30 m
- B3 -SSE 50 ex. wetbell
- B4 -50 m inc. wetbell
- C -Closed bell

### **Diver and Diving supervisor Registration**

• A9 -SCUBA 9 m

A15 OLV\* -SCUBA/OLV 15 m

• A30 -SCUBA 30 m

• B30 -SSE 30 m inshore

• B50R -SSE 50 m

• B50 -SSE 50 m inc. wetbell

• C -Closed bell

\*OLV =SCUBA equiped with air supply from surface.

Not a replacement for surface supplied, and not to be used in construction conditions and off-shore.

#### Scopes

#### **Dive medical attendant**

- Dive medical attendant B1 (diver first aid)
- carrying out medical supervision during diving work in Diver scopes A9, A15 and A15OLV within the limits of no-deco diving times;
- Dive medical attendant B2 (formerly MAD-A)

Carrying out medical supervision during diving work in Diver scopes A30 and categories B and C.

#### **Diving Physician**

- A only performs reexaminations.
- B performs initial examinations and re-examinations.

## From certification to Registration Situation pre 2012

- One central organisation resposible for the training and certification of all qualification regarding to working under overpressure.
- This organisation was appointed bij SZW (government).
- Name was internationally recogniced and known.
- This organisation was NDC.







#### From certification to Registration

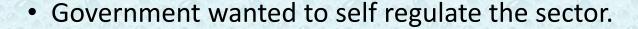
Organisation in the certification era (pro's and con's)

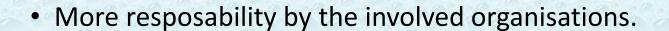


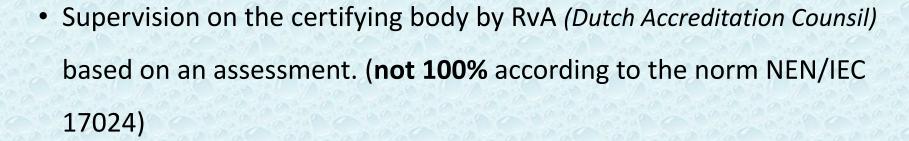


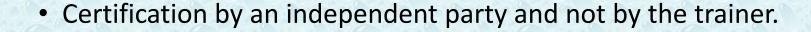


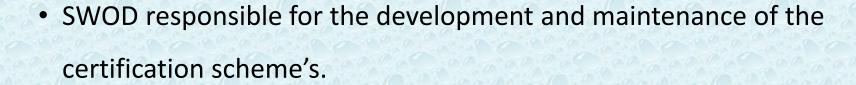






















A lot of organisations are now involved with certification, training and regulations in the Netherlands



#### From certification to Registration

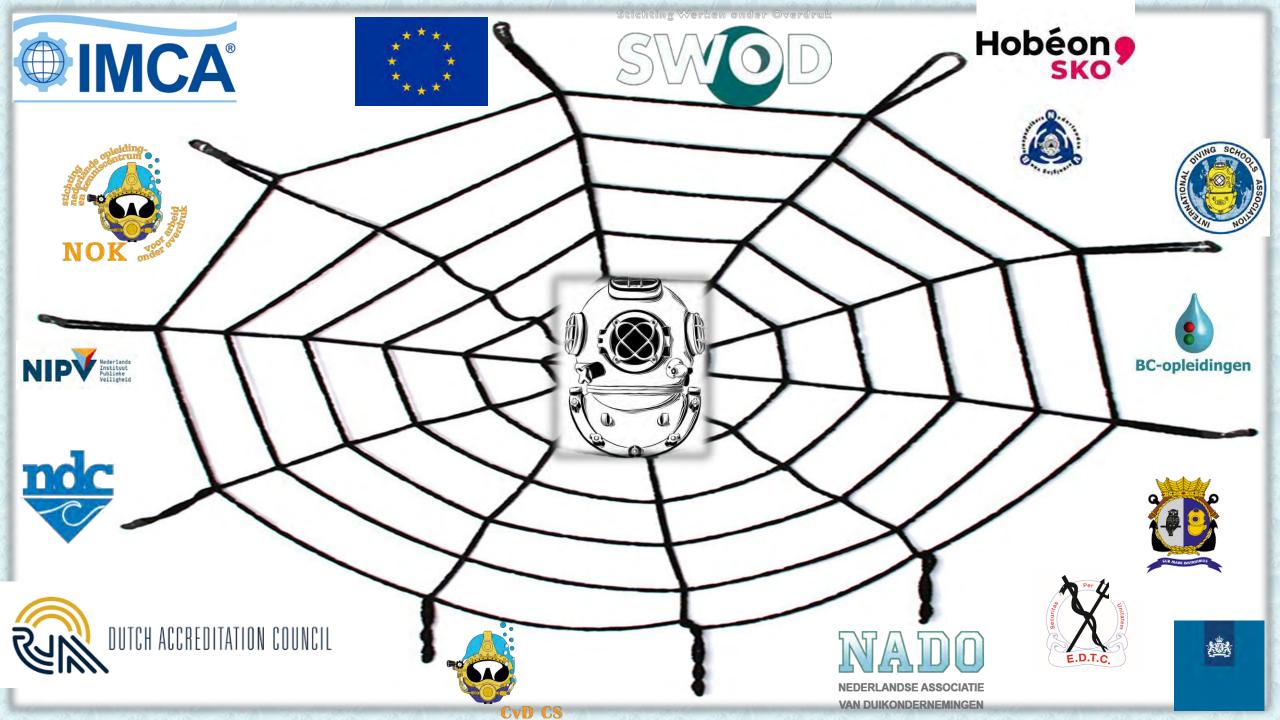
Organisation in the certification era (pro's and con's)

#### Pro's

- Training and certification seperate and impartial
- A Strict NORM for certification body's
- Joint certification scheme (Civil Defence Fire department)

#### Con's

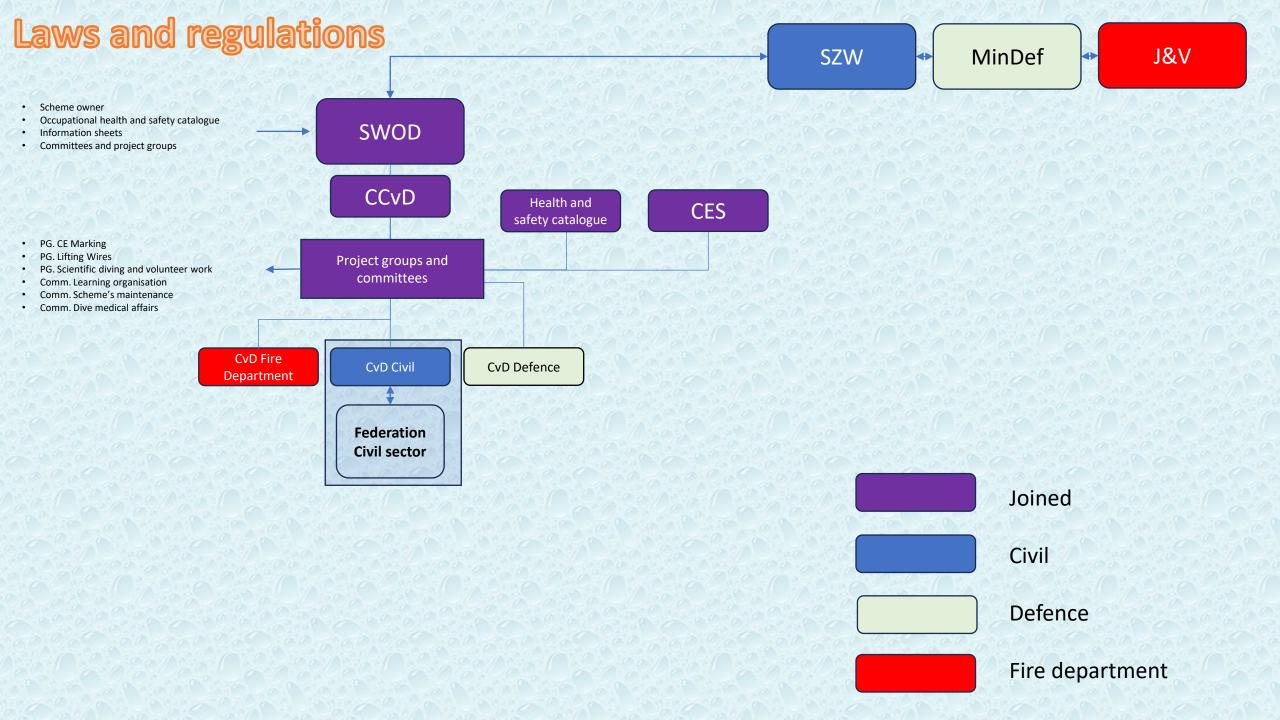
- More involved organisations
- Supervision on the certifying body by RvA (Dutch Accreditation Counsil) based on formal errors
- Results of the audits are very variable and depending on professional knowledge of the available auditor
- Disproportionate supervision
- No flexibility in criteria, assessments and evaluations of the documents
- Organisations competed with each other instead of working together
- National focus instead of international

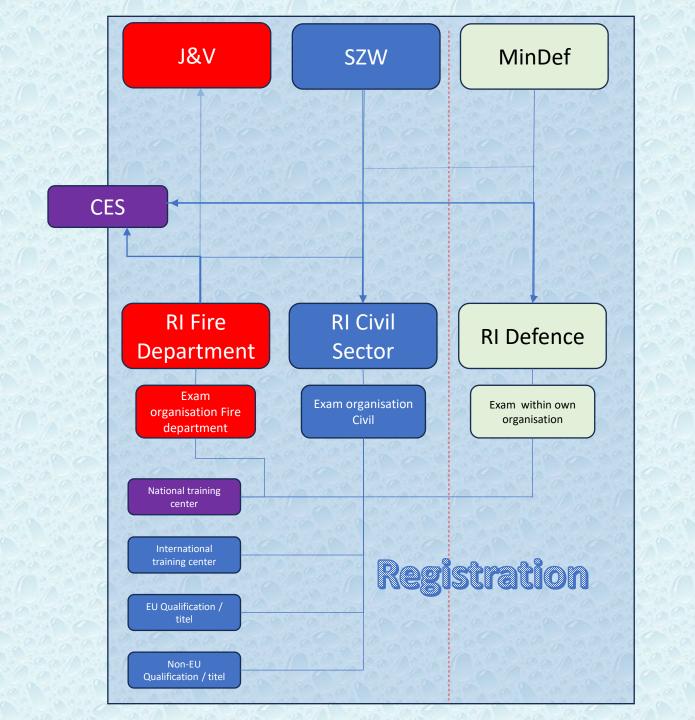


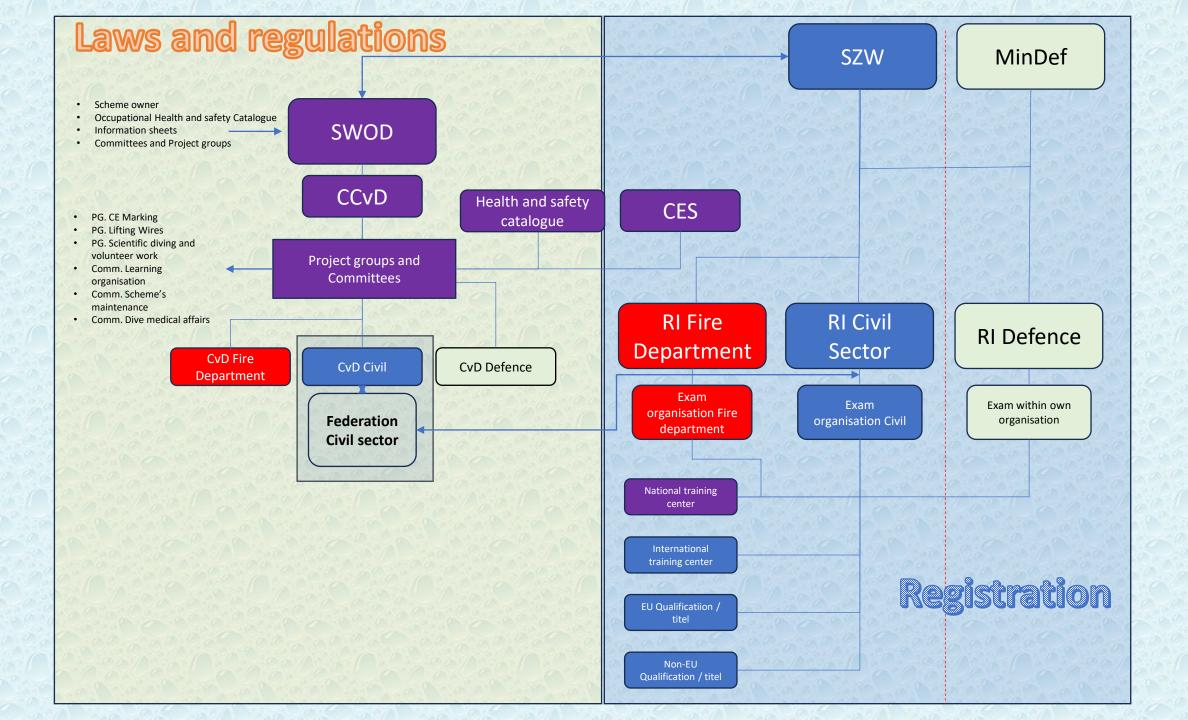
#### From certification to Registration

Planned organisation in the registration era (pro's and con's)

- Less involved organisations
- No competition between organisations (within the registration proces)
- One organisation responsable and appointed by the government (Registration body)
- Clear point of contact national/ and international
- Criteria for registation according to international standards
- Better communication within the EU (recognition of EU professional qualifications)
- Better communication in relation to mutual recognition







### From certification to Registration Future

- Future-proof system for qualifying and registering personal working in the Dutch sector.
- Adaptable to the new state of technology and practice
- Equivalent to the international standard

Collaboration in the harmonization of this international standard



### National Report

The Netherlands



# Accessibility for Non-EU Divers



# Workgroup Inshore Diver Safety



# Workgroup CE on Diving Equipment



#### NADO AD-HOC WORKGROUP CE-MARKING

- Started Januari 2017
- Participants:
  - Diving contractors: Boskalis, N-Sea, Bluestream, Ardent, DCN
  - Equipment manufacturers: IHC-Hytech, Pommec, Unique
  - Representatives from WOD-SOE writing team
- Report issued January 2020 with 4 sub-reports:
  - I CE Review and Evaluation of a Deck Decompression Chamber
  - II CE Review and Evaluation of a Launch and Recovery System
  - III CE Review and Evaluation of a Dive Control Panel
  - IV Safety Statistics Overview as per IMCA Safety Flashes



#### SITUATION REPORTED

- Very limited range of products with CE marking
- No harminized Standard for complete diving system
- Equipment (LARS, panel, etc.) built, tested and maintained based on WOD-SOE, IMCA, Class
- WOD-SOE, IMCA, Class guidance is continuously maintained and kept up to date
- Knowledge about CE regulations among experts and certification institutions is fragmented



#### CONCLUSION NADO WORKGROUP

- If the Dutch diving industry applies (or must apply) the legislation regarding CE in full, it will face major technical implementation problems because
  - the CE marking requirements must be applied in addition to the existing standards and guidelines (WOD-SOE / IMCA / Classification by NoBos such as DNV GL and LR), and
  - there is no European harmonized Standard for a complete diving system.
- This entails high costs, deteriorates the competitive position internationally (free trade) and does not demonstrably increase safety, while these are the two important objectives of the European CE regulations.



- After issue report by NADO it was decided in 2021 to establish a
   Project Group (PG) under SWOD as CE problems also are affecting the
   other segments in the Dutch Diving Industry (Defence and Public
   Services / Fire Brigades).
- August 2023: final report issued "Application of Commodities Act Decrees when using diving equipment and systems".



- CE marking is currently only applied to a limited extent in the diving industry due to limited availability of products with CE marking and due to standards and guidelines that do not always correspond well with practice.
  - This is also the case elsewhere in Europe.
- At the same time, work is not unsafe because other industry standards are used (WOD-SOE / Class / IMCA).



- The PG has therefore focused on describing current practice compared to the requirements of the Commodities Act that can lead to CE marking.
- In addition, an explanation has been given about how this can be dealt with in the future, and when purchasing new equipment.
- The civil sector can work according to the principle of 'comply or explain', while other public sectors (fire brigades and defense) do not have this option, and only can 'comply'.



- Although there is understanding for the situation, the Dutch authorities have little room to 'normalize' current practice.
- What was noted: The upcoming IMO Diving Code "International Code of Safety for Diving Operations" could result in a further mist regarding the application of CE Marking for diving equipment that is used offshore.
- The PG advised to raise the issue of CE to an European level through the European Diving Technology Committee (EDTC).



# Workgroup Sports Diving and volunteers



## Forming a Federation



## DCC as Medical Device

- 1. Problem
- 2. Current situation
- 3. Dual use
- 4. EUDAMED
- 5. Quick fix
- 6. Risk for public health or patient safety or health





## **EDTC**

### **Breda, The Netherlands**

Peter Sieniewicz

29 September 2023





- 1. IMCA Expands list a recognised qualifications
- 2. IMCA Diving CPD Scheme
- 3. Amendments to IMCA Offshore Diving COP D 014
- 4. Development of the new IMO International Code of Safety for Diving Operations
- 5. IDRCF *Update*



# IMCA Expands list of recognised qualifications



## **Diver and Diving Supervisor Certification**

### **Information Note**

No. 1394 – Revised August 2023

- 2.2 Comparable Certificates
- IMCA has entered into recognition arrangements with the following organisations:
- Australian Diver Accreditation Scheme (ADAS)
- Diver Certification Board of Canada (DCBC)
- Netherlands Diving Centre Certification Institute (NDC-CI).
- Under these arrangements, the following certificates are recognised by IMCA as being appropriate for diving supervisors for the purposes of compliance with IMCA guidance:
- ADAS offshore diving supervisor
- DCBC offshore diving supervisor
- NDC-CI offshore diving supervisor (category B4 surface demand equipment to 50 metres including wet bell).
- 2.3 Continuing Professional Development (CPD)
- In 2021 IMCA introduced a mandatory diving supervisor CPD scheme. In order to be considered 'in-date' by IMCA, all diving supervisors who wish to maintain the validity of their IMCA recognised certificates are required to undertake appropriate CPD in accordance with the requirements of the IMCA Diving CPD scheme, and to satisfy IMCA that this has been done. Details on the scheme are available at www.imca-int.com/cpd.
- The IMCA Diving CPD App provides a platform to facilitate this. App registration is open to all IMCA certified diving supervisors, and registrations are also accepted from ADAS, DCBC, and NDC-CI certified diving supervisors. Users can share their progress and CPD status via the app.

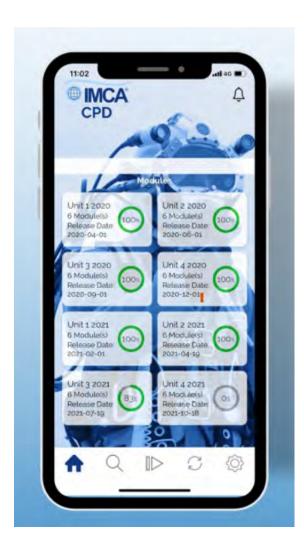
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## IMCA Diving CPD Scheme

## Extension of Diving Supervisor CPD Scheme to Trainees





- IMCA has made the necessary amendments to allow CPD registration for trainee diving supervisors.
- New trainees will be provided with six months access for free, to encourage their participation.
- Information Note published.





### **Extension of the IMCA Diving Supervisor CPD Scheme to Trainees**

In April 2020 IMCA launched its diving supervisor continuing professional development (CPD) scheme and app. Since then, the scheme has been highly acclaimed by supervisors, contractors and clients and has proven to be an effective tool for keeping supervisors up to date with the latest information and recent changes in IMCA guidance. To date, 97 CPD modules have been created and tested by industry experts.

IMCA is pleased to announce that the scheme has now been extended to trainee air and bell diving supervisors. Enrolment on the scheme is not mandatory for trainees. However, IMCA encourages trainees to join the scheme to keep them informed and up to date as they embark on this safety-critical career. Enrolment also prepares them for when they qualify as diving supervisors, at which point enrolment and successful completion of the latest units is then mandatory for their certificate to remain in-date.

#### Trainee Enrolmen

Providers of approved training courses are required to submit trainee data to IMCA within five working days of course completion and it should be live in the IMCA system shortly thereafter. This has been a requirement since January 2023, but providers have also been invited to submit data covering the past three years.

Trainees wishing to access the diving supervisor CPD app are automatically sent details on the CPD scheme and how to register by email. To confirm registration and enable IMCA's monitoring and quality control processes to be undertaken, trainees (for 2023 onwards) must complete a short online course evaluation survey. Once this is completed, they will automatically be invited to enrol for access to the CPD app via a restricted link. Verification of eligibility is based on trainee data held by IMCA, so trainees may need to contact their provider if the data is not yet in the IMCA system.

Trainee diving supervisors are permitted free access to the app for a period of six months. From 1 July 2023 this will be six months from the last day of the training course. Those who attended courses prior to this but are still holding a valid certificate will be given free access until the end of 2023. After this time an annual fee of £100 (GBP) will apply, in line with the annual revalidation fee for IMCA diving supervisor certification.

#### **Verification and Progress Sharing**

Members are strongly encouraged to use the IMCA verification portal at www.imca-int.com/verify to ensure that the certificates presented to them are genuine and that CPD, where required, is in-date. For trainees, certificates issued by providers of IMCA-approved courses can now be verified via this portal in addition to all IMCA-issued certificates.

As CPD is not mandatory for trainees, CPD progress is not included in the verification results. However, users of the system can share their progress directly via the CPD app where appropriate.

For more information, please contact ac@imca-int.com.

#### Related Guidance

IMCA D 013 IMCA offshore diving supervisor and life support technician certification schemes.

# Expansion Diving CPD app to offshore diver training instructors





- IMCA has now also made the necessary amendments to allow CPD registration for instructors teaching on IMCA recognised offshore dive training courses
- IDRCF Members will be required to provide a list of training schools and forward the registration documentation to them
- Information Note 1394.





#### Availability of Diving CPD for Diver Training Instructors

IMCA is expanding the availability of its popular Diving CPD app to offshore diver training instructors at schools providing IMCA-recognised offshore diver certification. This will be available through members of International Diving Regulators & Certifiers Forum (IDRCF) and other certifying bodies recognised by IMCA (as set out in the latest revision of information page 1394).

IDRCF members and other certifying bodies will be provided with nomination forms for circulation to their schools and will be required to provide IMCA with a list of these schools. Schools offering these certificates will then be able to nominate their offshore training instructors/supervisors for access to the app.

Once verified, those individuals will be registered by IMCA and sent a link to complete the registration process via the IMCA website, where they will be required to pay a discounted annual fee of £50. On payment, access to the app will be provided to the diver training instructor.

Should a school cease to be approved or become unable to deliver offshore diver training programmes, the IDRCE member (or other certifying body) will be required to notify IMCA. Should an instructor cease working for a school offering IMCA-recognised offshore diver certification, that school will be required to notify IMCA. IMCA reserves the right to withdraw access for individual instructors or schools for non-performance in accordance with IMCA hee-laws.

Diver training instructors will not appear in search results of the IMCA verification portal (www.imca-int.com/verify). Instructors will be able to share their CPD registration and progress via the app.

Direct online registration will not be available - all registrations must be via the above nomination process

For more information, please contact Peter.Sienieiwicz@imca-int.con



# Changes to IMCA Diving COP D 014

## IMCA D 014 Rev. 3.1 IMCA Intl COP for Offshore Diving



### 1.4 Work Covered by the Code

This code is intended to provide advice and guidance in respect of all offshore diving operations carried out anywhere in the world.

IMCA defines offshore diving operations as underwater works that are carried out by divers in support of the construction and maintenance requirements of the offshore oil & gas and renewable/alternative energy industries at sea:

- outside the territorial waters of a country (normally 12 nautical miles or 22.2 kilometres from the low water line); or
- inside territorial waters (within the 12 nautical mile limit);
- where closed bell or saturation diving techniques are used (both within and outside the 12 nautical mile limit);
- where diving takes place from vessels maintaining station by the use of dynamic positioning.

This will include all diving operations undertaken in connection with offshore installations, wells and pipeline works, floating production systems, loading buoys, and renewable energy structures, e.g., wind farms.

This code does not cover commercial diving operations carried out in support of underwater ship husbandry; salvage works; inland/inshore civil engineering or harbour works; or in any case where operations are not conducted from an offshore structure, vessel or floating structure normally associated with offshore oil & gas or renewable/alternative energy industry activities.

## IMCA D 014 Rev. 3.1 IMCA Intl COP for Offshore Diving



### 7.5 Communications

Effective communications are essential to ensure that all personnel directly involved in operations are made fully aware of the work being undertaken and that during operations all parties are kept aware of the status of any unusual situation.

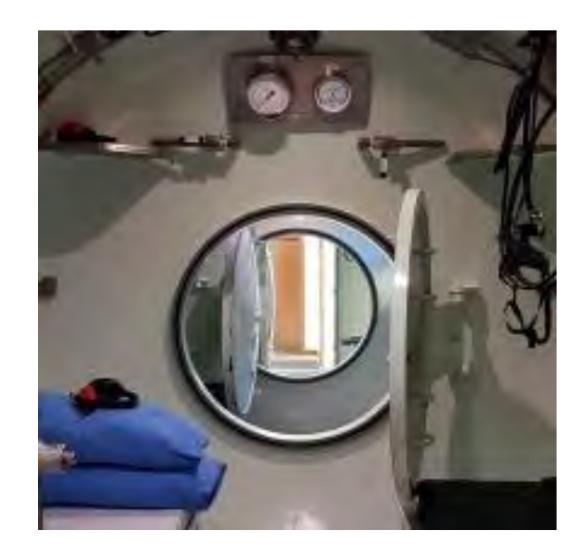
Communications between the diving team and any other relevant personnel (such as marine crew, DP operators, crane drivers) are important to safe and efficient operation (*Ref. IMCA M 103, IMCA M 205, IMCA D 023, IMCA D 024, IMCA D 037, IMCA D 040, IMCA D 053*).

On a DP diving support vessel/floating structure, in addition to the primary and secondary means of voice contact between the bridge and diving supervisor, there also needs to be a set of DP alarms in the diving control centre. There should be direct communications between the dive supervisor and the DP desk without having to go through a third party e.g. a shift supervisor or foreman who is on the bridge.

# IMCA D 014 Section 4.14 - Therapeutic Recompression / Compression Chamber



- Where surface-supplied diving operations are conducted inside territorial waters (normally 12 nautical miles or 22.2 km from the low water line) in less than 10 m (33 ft) of seawater, the therapeutic recompression chamber may be made available at a suitable onshore location
- In such circumstances a risk assessment should be conducted to ensure:





- 1. The travelling time to the chamber location is as short as reasonably practicable. Under no circumstances should the travelling time be more than 2 hours from the dive site. Transit times should be established/confirmed by physical (not just desktop) trials;
- 2. Any reasonably foreseeable time delays that may occur are taken into account e.g., delays due to changes in weather conditions, currents and tides; traffic congestion etc.;
- 3. The therapeutic recompression facility will be available and fit for use at all times during the course of the diving project;
- 4. The therapeutic recompression facility will always be appropriately manned by competent persons should it become necessary to use the therapeutic recompression facility during the course of the diving project;
- 5. Sufficient oxygen is available for the duration of the transfer of an injured diver to the designated recompression facility (Ref. IMCA D 050). Oxygen should be provided by means of a suitable oxygen administration set.





Development of the new IMO International Code of Safety for Diving Operations



# Development of the new IMO International Code of Safety for Diving Operations

• Also includes merging IMO Resolution A.692(17) *Guidelines and Specifications* for *Hyperbaric Evacuation Systems*(the IMO HES Guidelines) into the new Diving Code.

## Why?



## Khoosha1

- 6 sat divers killed in sinking.
- Vessel fitted with a temporary saturation diving system and project equipment.
- Vessel was overloaded & unstable.
- Capsized in rough weather in Arabian Gulf and sank very rapidly.
- 13 fatalities, including the divers.



© IMCA 2024



## 2023 Diving Code –Key Improvements

- Will apply to all ships-carrying diving systems irrespective of type (fixed or temporary, surface supplied or saturation).
- For the first time the surveyor will be able to
- Check the suitability of all diving systems irrespective of type.
- Check the suitability of the ship to act as a Diving Platform.
- Check that suitable arrangements are in place for evacuation of the divers from the ship and all the way to a place of safety.
- Check that the ship's safety management system for compliance with the ISM Code includes diving operations and is aligned with the diving organisation's safety management system.

## Other Checks



- The "other integration checks" set out in the New Code will cover appropriate integration of the diving system with vessel services e.g. power, water, air, hydraulics etc.;
- the suitability of the vessel to act as a diving platform;
- the means whereby appropriate risk control arrangements for diving operations are integrated into the vessel ISM system, including suitable arrangements for the emergency evacuation of divers.
- for the first time, the Diving Unit surveyor will have a full scope of work to complete for all types of diving system –surface and saturation, fixed and temporary.



Upon finding a suitable diving platform, the current Pt II is forwarded to the Diving Unit's RO



PT II sub-part support certificate





Diving Unit surveyor accepts PT II on behalf of the Administration. The DU surveyor checks diving system installation and performs all the other integration checks set out in the new Code.



Diving unit surveyor signs PT I and so issues the DUSC, which is the "trading certificate"

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## **IDRCF Update**



## IDRCF Report

- 2-day meeting
- Walk through and discussed the revisions to date of the proposed changes to the IDRCF Bell diver training standard
- Reviewed and agreed the revised Terms of Reference for IDRCF
- Brought all present up to date with changes to the various training standards and numbers of students training in the past year as the countries and schools emerge from the COVID period.
- Agreed to start work on an SDDE minimum offshore diver training standard to be recognised by all for the purposes of training and for mutual recognition.



### **International Marine Contractors Association**

Improving performance in the marine contracting industry

www.imca-int.com





## **EDTC**

**HSE Update** 

Breda 2023



- Accidents and Incidents
- - Enforcement
- Commercial diver training-
- Worldwide fatalities



### Reported Accidents and Incidents (01.04.22 to 01.04.23)

### Offshore:

### 4 dangerous occurrences

Helment leak
Cobra HP gauge leak
Bell not coming into cursor correctly
Loss of DP

1 "over 7-day injury"

Injured hand during lifting operations

Inland/Inshore:

1 fatality

Diver crushed during dismantlement of suspended wreck

2 dangerous occurrences

AGA exhaust came loose – rapid ascent from 19m Cylinder valve assembly blew off

1 "over 7-day injury"

Sliced hand on the surface cutting a cable tie.



### Reported Accidents and Incidents (01.04.22 to 01.04.23)

Police 1 dangerous occurrence

AGA exhaust valve fell off.

Scientific/Arch
 1 dangerous occurrence

Excessive lube on twinsets blocking filter

Shellfish1 fatality

Electrofishing – unknown, but equipment poor

Recreational at work
 1 fatality

PADI AOW course - student medical issue

Media
 No incidents

Military
 No incidents





- failure to report a Dangerous Occurrence
- Inadequate control of welding fumes
- Insufficient emergency Oxygen
- No project plan (swimming pool work)
- Insufficient emergency Oxygen; no means of diver recovery (x2)
- No project plan; team size of 2! (x2)
- Fatality Planning of dive, insufficient risk assessment (x2)
- Fatality Planning and coordination of safety
- Supervisor not qualified, no planned maintenance, no risk assessment (x3)
- No operations log, SCUBA used under moving floor of swimming pool (x2)





- Fatality Team size delay in recover of diver
- Fatality No lifeline or 2-way communications
- Fatality Safety management of diving
- No medical for shellfish diver x3 individual notices.



### **HSE Enforcement Notices – Recreational diving at work**

- Fatality Team size
- Fatality Emergency recovery equipment
- Fatality Lack of diver medicals
- Fatality Lack of risk assessment

No medical for at work instructor

### **Enforcement – Prosecution – Jan 2023**



An instructor has been sentenced after a novice diver drowned during a training session.

The Health and Safety Executive (HSE) said Lance Palmer was responsible for "multiple failings" following the death of Roger Clarke in Stoney Cove, Leicestershire, in June 2018.

Mr Clarke's wife says she now fears water following her husband's death.

Palmer was ordered to pay £3,085, including a victim surcharge of £85, and carry out 50 hours of unpaid work.

The HSE said Mr Clarke, 55, from Stafford, took part in the dive that was planned, managed and supervised by Palmer.

The father-of-two had enrolled on an entry-level Technical Diving International (TDI) Closed Circuit Rebreather Course, the HSE said.

It said its investigation found Palmer was responsible for multiple failings, including:

- Not adequately maintaining and checking students' breathing apparatus
- Failing to remain in close enough proximity to monitor his student, which meant he did not notice the audible and visual alarms sounding on breathing apparatus
- Contravening rules for exceeding maximum diving depths on repeat dives
- Failing to have an adequately-qualified rescue diver in the water with him and the student







The Professional D	Diving Academy	(Dunoon) Tl	J. SS	, SCUBA
		( =	,	,

Commercial Diver Training (Fowey)

TU, SS, SCUBA

Police Scotland Police SS, SCUBA

Northumbria Police (NEW) Police SS, SCUBA

Plymouth University SCUBA

TH Diving Services (Plymouth) SCUBA

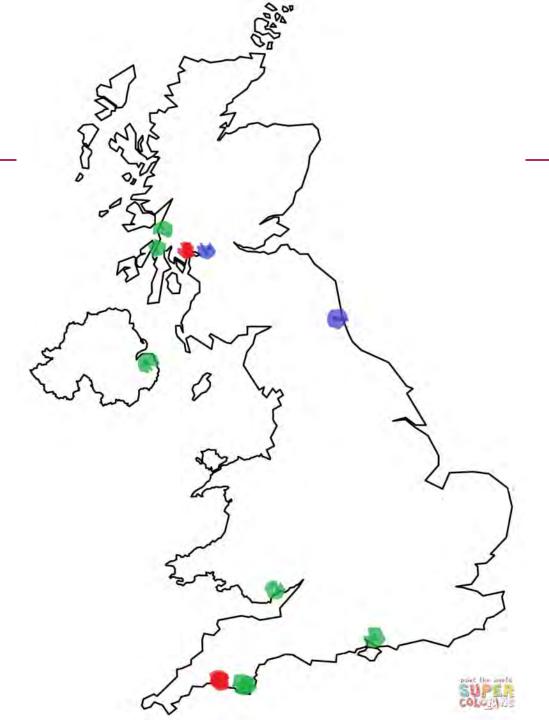
DV Diving (N.I.) SCUBA

Tritonia Scientific Ltd (Dunstaffanage) SCUBA

Puffin (Oban) SCUBA

Andark (Southampton) SCUBA

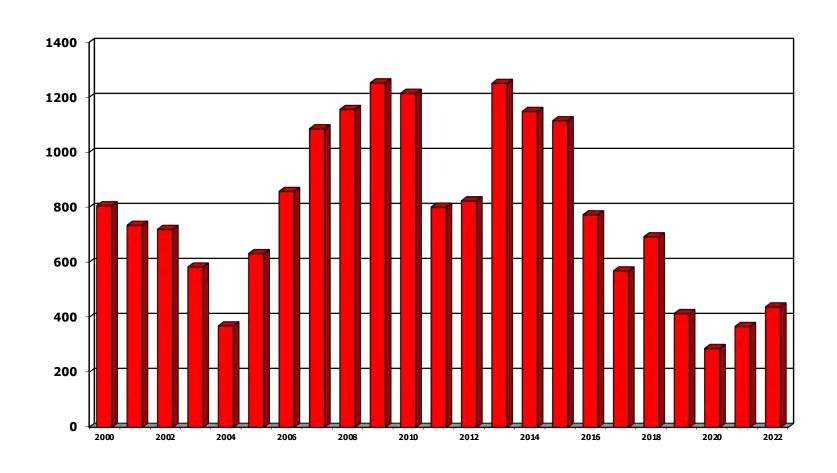
Bristol Channel Diving Services (Cardiff) SCUBA





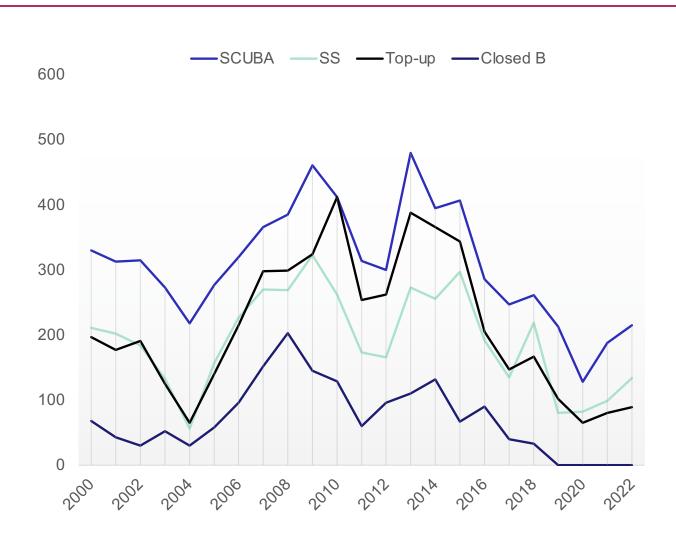


### Number of certificates issued – 2022: 438



### **Certificate breakdown**







### Complaint about divers' experience for Closed Bell Course

- IDRCF Closed Bell competencies require that since qualifying as an an offshore surface supplied diver that they have
- a) At least 100 dives using SSBA, and
- b) At least 100 hours of bottom time.

The above dives and bottom time are to include 20 dives over 15 metres.

The above dives and bottom time are not to include any dive time undertaken at a depth of less than 6 metres.

- HSE received a complaint that there were two divers with closed bell qualifications who didn't have this prior experience.
- INPP in Marseille and CDA in Australia both provided assistance to HSE, as to what had been submitted. One diver had gone to each school.

# Diver 1 (who went to INPP)



- Claimed to have lost his logbook.
- I requested details of all contractors he had worked for since qualifying (June 2019).
- Took statements from dive contractors and recreated his diving history.
- 28 dives over 6m and only 1 over 15m.
- Worked with police as fraud involved.





- Requested log book for the 20 dives deeper than 15m.
- Received logbook scans for all 20 dives.
- Verified 10 of these with offshore contractor all accurate.
- Verified 10 inland dives with another contractor they "no longer had records, but could remember the diver working for them".



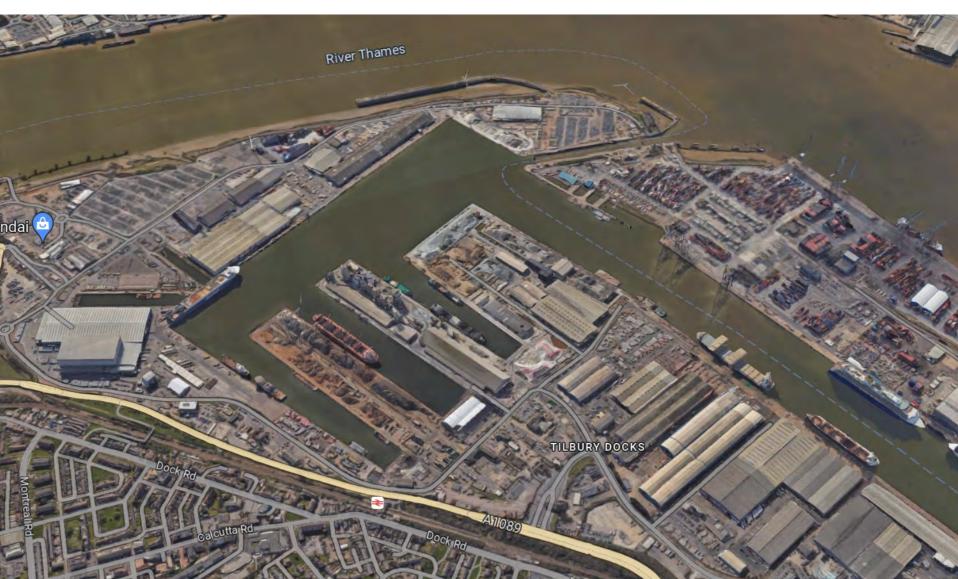
# Checked logs again.....

Dive	1	2	3	4	5	6	7	8	9	10
LS	10:30	09:30	09:40	10:20	09:45	08:20	09:05	08:30	10:40	12:10
ВТ	60	30	25	18	31	50	35	40	40	20
AS	11:32	10:00	10:05	10:38	10:16	09:10	09:40	09:10	11:00	12:30
LS	06:43	06:37	05:11	06:40	07:07	04:38	06:59	08:39	08:04	09:52
ВТ	55	57	53	134	55	112	57	56	59	60
AS	07:39	07:36	06:04	08:56	08:02	06:30	07:56	09:56	09:01	10:54









# And...



- Statement from Harbour master no diving on those dates
- Tide tables v depths didn't coincide
- Worked with police as fraud involved by both diver and "supervisor".



#### **Outcome**

Character C | 1 1 202

Commercial divers convicted for fraud



- Both divers the supervisor involved were interviewed "under caution" by police and HSE.
- All admitted "fraud by false representation" and received police cautions (1<sup>st</sup> offence, cooperation etc.).
- Firearms licence revoked for one diver.
- Other diver lost his job.
- Criminal records for all 3.
- ADAS and INPP revoked diver certificates.
- HSE and Police gained significant publicity re. case.

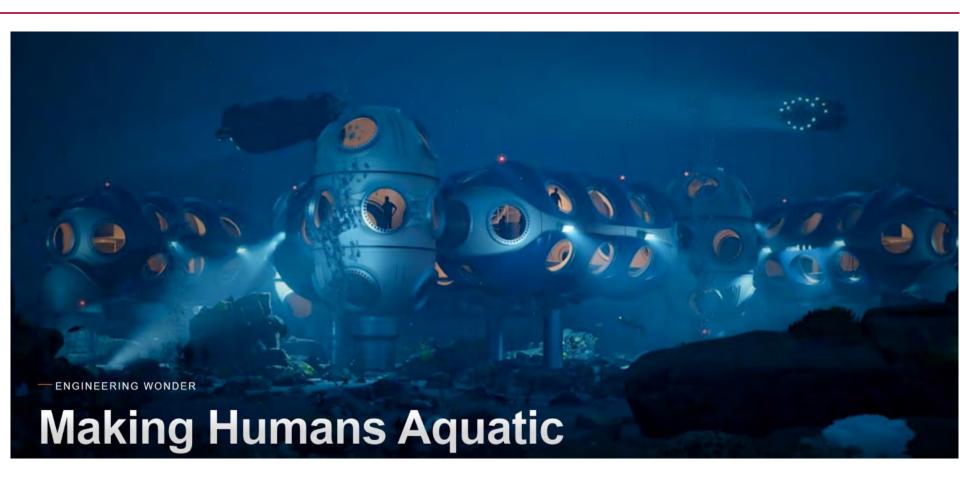
### **Certificate fraud**



- IMCA checked diver certs with HSE.
- 7 fraudulent HSE Surface Supplied (Top-up) certificates were submitted to IMCA by an overseas contractor.
- Please check all UK certs with HSE
- email: <u>diving@hse.gov.uk</u> with a scan of the cert.

### **Diver training - The future??** Deep.com

















#### **Worldwide Fatalities 2022**



- Sri Lanka Crocodile attack
- Chile SCUBA fish farm nets
- Chile SCUBA fish farm
- USA SCUBA cave
- Trinidad and Tobago 4 divers SCUBA pipeline Differential pressure
- France SS medical issue
- Panama NK Hull cleaning
- USA NK Canal dredging trench wall collapse no standby diver
- USA SCUBA Electrocution? Solo dive under barge. Alcohol?
- Australia SCUBA drug smuggling
- UK SS Crushed during wreck dismantling
- USA SCUBA removing weeds, failed to surface
- Malaysia Offshore diver dragged to 55m by failed rigging
- USA SCUBA police diver training
- Chile SCUBA fish farm
- Holland SCUBA instructor killed by ejected pillar valve
- Canada SCUBA sucked into sluice gate that was being investigated Differential pressure
- Holland NK –Arnhem sluice complex Differential pressure
- Kuwait NK Doha power plant diver drowned
- UK SCUBA electrofishing
- UK SCUBA recreational under instruction

# **Worldwide Fatalities 2023**



- USA SS storm drain work no details
- Venezuala SCUBA trapped by a bilge pump Differential pressure
- Guam SCUBA Rebreather telecoms contract work, diver missing
- Panama SCUBA Hull cleaning sea intake entrapment Differential pressure
- USA SCUBA vehicle recovery under ice freeflow at 29m
- Greece NK Vessel husbandry sucked into cooling water inlet Differential pressure
- Taiwan Hull cleaning seawater inlet Differential pressure?
- South Africa SS Vessel husbandry umbilical trapped in brush cart band mask removed
- UAE SCUBA Vessel husbandry no lifeline/comms failed to surface.

# **Questions?**

