

UNDERSTANDING DREDGING





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@CEDAdredging



in Central Dredging Association









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REPORT 2017



# MESSAGE FROM THE PRESIDENT AND THE GENERAL MANAGER

2017 was a wonderfully busy and fulfilling year. Of course, there was the organising of our flagship event, CEDA Dredging Days, in Rotterdam, which engaged us for much of the time. We were rewarded with another successful event which will stand the test of time for those who were there. You can find out more about it, and see some great pictures, here in a special report. Our national sections were also busy running engaging events, and site visits, and they continue to act as an important focal point for our members across the CEDA region.

Many initiatives, generated by our commissions, came to fruition and an entire set of new ones have been launched which will take us into 2018 and beyond. You can read more about the activities of the national sections, commissions and their working groups, in the pages of this Annual Report. Some of the highlights in 2017 include:

- Dredging Days in numbers: More than 200 members of the dredging community, from 18 countries, and 76 organisations, gathered at Ahoy Rotterdam, in the Netherlands, in November, for the primary dredging event in the EMEA region. Attendees represented the entire cross-section of the field and the young, established and expert, all mingled, at the packed event, to exchange the latest ideas, knowledge and best practice. We are pleased with how the event went and we are already signed up to co-locate with Europort for 2019.
- The CEDA Environment Commission were very busy working on initiatives including the Deep Sea Mining information portal, which went live on the CEDA website in the year, and the joint CEDA/IADC publication



Polite Laboyrie
President



**Anna Csiti** General Manager

- 'Dredging for Sustainable Infrastructure' (due in 2018). In addition to their contributions to environmental policy work, they are also in the process of setting up new working groups on turbidity limits for dredging operations and on energy efficiency.
- The Dredging Management Commission also had a productive year in which they published the 'CEDA Checklist for Sustainable Dredging Management', ran an interactive session on contractual problems at Dredging Days, and set the ball rolling on the working group on effective contract/procurement type selection.
- CEDA Lifetime Achievement Award: The Board were delighted to be able to honour long-standing CEDA member Gerard van Raalte, at the IHS DPC Innovation Awards dinner in London, in November 2017, for his enduring contributions to CEDA and the dredging profession. We were also pleased to see many other CEDA members receiving awards on the night.
- Not to be left out, Young CEDA have worked tirelessly over the year, and are instrumental in ensuring that CEDA is true to its desire to encourage young professionals to join, and remain, in the dredging industry.

You can read more on the above, and the many other activities that our members have been engaged in, in this Annual Report.

As always, we are keen to make sure that we are providing members with the right level of information, events and support, to help in their professional lives, so we would like to hear your thoughts on what we do for you. Please send any feedback, on our activities and any new ideas you might have, to CEDA Secretariat (ceda@dredging.org).

Finally, we would like to thank the many CEDA members – individual and corporate – who volunteered their time during the year. CEDA, and the dredging profession as a whole, is made better and stronger when we work together. Long may it continue, and we look forward to working with you, in growing our association, meeting the challenges the year will undoubtedly bring, and further promoting the dredging profession in 2018.



# **ABOUT CEDA**

CEDA is an established authority and the leading independent forum for the professional dredging community, and associated industries, in Europe, Africa and the Middle-East. It represents dredging professionals and organisations, from government, academia and business, in the region and fosters and promotes the understanding and advancement of dredging to the wider community. It is a recognised reference point for high-quality specialist knowledge on all aspects of dredging and provides a multidisciplinary network for professional contacts.

Drawing on the collective knowledge of its members, and as an impartial organisation, CEDA regularly gives expert advice to government and international regulatory bodies. CEDA members are representative of consultancies, research and educational institutions, port authorities, government agencies, dredging contractors, designers and builders of dredging vessels, suppliers of ancillary equipment, and organisations providing a whole range of related services.

### **Mission**

CEDA's mission is to be the independent, easy-to-access forum for the professional dredging community, and the wider associated industries, in Europe, Africa and the Middle East. Through its knowledge transfer and exchange programmes, products and services, CEDA enables the professional development, and cor-

porate and personal success, of its members. It fosters technological innovation and advancement of best practice in all dredging-related activities. It promotes the contribution of dredging to sustainable aquatic environment and infrastructure.

CEDA's scope includes all fields related to dredging such as land reclamation, marine and fluvial construction, offshore energy, fluvial and deep-sea mining.

### **Vision**

CEDA's vision is to be essential to the professional dredging community, and the wider associated industries, and to be universally recognised for its professional expertise and balanced views.

### **Position**

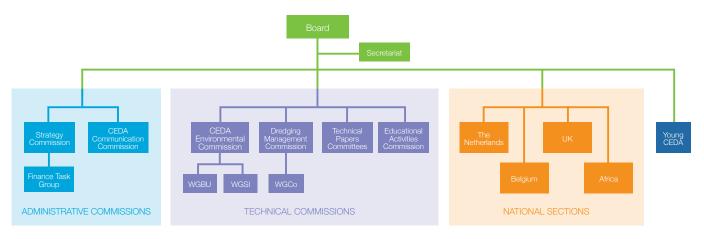
CEDA is part of the World Organisation of Dredging Associations (WODA) and is responsible for Europe, Africa and the Middle East. CEDA's two sister associations, WEDA (Western Dredging Association) and EADA (Eastern Dredging Association), serve the Americas, and Asia, Australia and the Pacific region respectively.

A number of international and national organisations, both professional and trade, operate in dredging and related fields.

# **Organisational structure**

CEDA currently has four technical commissions, supported by two administrative commissions, and five

# **CEDA** ORGANOGRAM



WGBU: Working Group Beneficial Use | WGSI: Working Group Seafloor Integrity | WGCo: Working Group Contracts



sections incorporating Young CEDA and the national sections. To find out more about the sterling work conducted by each section of CEDA, in the past year, please see their individual reports.

For those of you who are new to CEDA, or are just curious about how it all fits together, CEDA Communications Commission have put together a handy organogram to explain the connections. (see page 6).

# **MEMBERSHIP**

One of CEDA's distinctive strengths lies in its diverse membership. CEDA members, corporations, organisations and individuals come from many fields and include project owners, commissioners of large infrastructure projects, dredging contractors, equipment manufacturers, consultants, academics and regulators. The graphic and list illustrate the diversity and the geographical spread of CEDA's members.

# **Countries of origin**

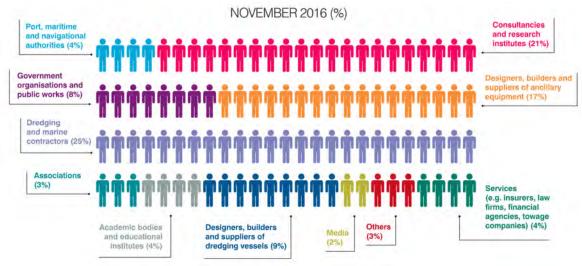
Argentina	Germany	Norway
Australia	Greece	Portugal
Bahrein	Guinea	Qatar
Belgium	India	Russia
Canada	Indonesia	Spain
China	Iran	Sweden
Cyprus	Ireland	Switzerland
Croatia	Italy	Taiwan
Denmark	Latvia	United Arab Emirates
Finland	Malaysia	United Kingdom
Fiji	Morocco	USA
France	Netherlands	
Ghana	Nigeria	

At the end of 2017, CEDA had 467 individual members, including 17 students, 7 starters, 35 retired members and 8 university or college lecturers. Unfortunately, the number of individual members continues to decrease (in the previous year there were 484).

The number of corporate members has also fallen. At the end of 2017 we had 111 corporate members, 5 members less than in 2016.

Attracting new members and retaining existing ones is a challenge. We strive to put extra effort into bringing new members into our community, and all members are encouraged to be good ambassadors for CEDA.

# **CEDA** MEMBERSHIP BREAKDOWN



Composition of CEDA's membership by main area of activity.



# **New corporate members**

In 2017 we were delighted to welcome 11 new corporate members into the CEDA community as listed below.

- Alia Instruments B.V.
   The Netherlands
- Aquatex Ltd Latvia
- Artelia Eau & Environnement France
- Conway Advocaten & Attorneys-at-law The Netherlands
- Gaico Construction Inc.
   Guyana South America
- Howell Marine Consulting United Kingdom
- ISPRA Institution for Environmental Protection and Research Italy
- Koninklijke Smals NV The Netherlands
- Rohde Nielsen A/S Denmark
- Ropeblock B.V.
   The Netherlands
- The Crown Estate United Kingdom























# CEDA VOLUNTEERS: CEDA PILLARS

CEDA is driven by its members, many of whom provide their time and expertise voluntarily. The growth of the association is based on their enthusiastic and dedicated work. They are the true pillars of CEDA.

# "CEDA IS DRIVEN BY ITS VOLUNTEERS"

# NATIONAL SECTIONS

Areas or countries with many CEDA members can set up a regional or national CEDA section to support internal networking at regional or national events. These sections are the smallest clusters through which CEDA members can become part of the wider CEDA network and, through WODA, be connected to the global network of professionals who share the same interest in dredging and marine construction. The chairs of these sections are CEDA ambassadors who help newcomers swiftly and easily become part of the CEDA community.

In 2017 CEDA's national sections continued to offer a successful series of meetings and site visits on topical subjects. Altogether, CEDA's four national sections held 13 well-attended meetings, site visits and events over the year. Members can see many of the presentations on the appropriate national section pages of the CEDA website.





# **African Section**

In April 2017, the African Section, organised the 7<sup>th</sup> International Dredging Symposium, in Casablanca, Morocco, for professional communities and researchers from industrial, academic and governmental circles in Europe and Africa. We were delighted to be able to host the two-day event with the support of the Ministry of Equipment, Transport and Logistics of Morocco.

The Symposium's theme was 'Dredging, environment and responsible development'. As a forum for knowledge exchange, and technology transfer, it provided participants with high-quality, specialised knowledge, on all aspects of dredging and raised awareness of best practice. Over the two days, there were many opportunities for some multidisciplinary networking, including the conference dinner and a visit to the Mehdia Sand Platform, kindly organised by the Rimal Company.

Alongside the Symposium, the Executive Office held its 21st Session, and its Ordinary General Assembly, at the Hotel Kenzi Tower, Casablanca.

Miloud Abudib Chair, CEDA-AS



**Miloud Abudib** Chair



Khadija Legliti Secretary



Miloud Abudib (Drapor – Morocco) opens the 7<sup>th</sup> International Dredging Symposium of the African Section.



Participants of 7<sup>th</sup> International Dredging Symposium in Casablanca, Morocco.

# **Belgian Section**







Lydia De Cauwer Secretary

2017 was another busy year in which we had three events and hosted one of the meetings of the CEDA Board.

# **New Year's Reception**

On January 24<sup>th</sup>, the Belgian Section started in 2017 with a New Year Reception, and General Assembly, in the Port of Antwerp's new harbour building. Jacques Vandermeiren, the new CEO of the port, explained the port's strategy for the coming years in an engaging keynote speech. Before the main event CEDA members had the opportunity to visit the new building and, during the reception, there was time to meet old friends and to express our New Year's wishes.



The New Year's Reception took place in Port of Antwerp's spectacular new building.

The 99th meeting of the CEDA Board took place at the Royal Yacht Club, Antwerp. In the picture (I to r): Wim Klomp (Royal HaskoningDHV – the Netherlands), Polite Laboyrie (Witteveen+Bos – the Netherlands), Jan Vandebroeck (SDI – Société de Dragage International "S.D.I." sa - France), Miloud Abudib (Drapor – Morocco), Will Shields (at the time Royal Boskalis Westminster, currently NewWaves Solutions – UK), Kathleen De Wit (IMDC – Belgium), Prof. ir. Cees van Rhee (Delft University of Technology – the Netherlands), Johan Pennekamp (Deltares – the Netherlands), Andre Kik (Royal IHC – the Netherlands), Claudia Flecken (Hamburg Port Authority – Germany), Dirk Defloor (DEME – Belgium).







Artist's impression of the new marina.

# **Hosted the CEDA Board**

On March 9th, before the CEDA Board meeting, the Belgian section invited the Board to join us for dinner in the Pomphuis Restaurant, Antwerp. Next day, the Board meeting took place in the Royal Yacht Club overlooking very nice views of the Scheldt River and Antwerp's historical city centre. The day closed with a guided tour of the Amoras site: an industrial installation which uses mechanical filter belt presses to remove water from the fine-grained dredged material taken from the port.

# **Club Evening:**

# Morphological processes in estuaries

On April 25th, at our traditional venue in Hotel Beveren, Jéremie Marmuse talked us through the plan to restore the Mont Saint-Michel's maritime character. He explained that it was a challenging project which had to take into account the huge tidal differences, and large amounts of siltation, near the project site. He was followed by Davy Depreitere who explained the impact of the large container dock (Deurganckdok) on the sediment balance of the Scheldt River. The presentation was based on the results of detailed measurements and the use of hydro-informatics tools.

# **Club Evening: Coastal zone management**

The event on October 12<sup>th</sup> started a bit earlier than usual, with a site visit to the marina of Blankenberge, which is located in an important tourist area of the city. The new infrastructure project is designed to protect the area from extreme floods and climate change. After the site visit, Niels Vanmassenhoven explained the concepts, structures and city planning elements of the project, and Daphné Toon gave a review of the coastal protection plans, for the whole Belgian coast, taking the impact of rising sea levels into account.

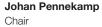
Each event throughout the year has provided participants with the chance to hear from local experts, exchange views and network with friends old and new.

At our Executive Committee meeting we took the opportunity to thank Christel Goetschalckx, for many years of logistic support to the Belgian Section, and Marleen Dauw for keeping our financial accounts up-to-date in that time.

Jos Smits Chair, CEDA-BE

# **Dutch Section**







Yvonne Duivenman Secretary

The Dutch Section (CEDA-NL) focusses on the dissemination of knowledge, and creating a platform for networking, in the Dutch dredging industry and associated professional communities.

CEDA-NL organised five meetings, in 2017, which is typical for a year when CEDA also organises Dredging Days. Event topics were carefully chosen to engage, inform and add value and, the large audiences at every event proved that the topics appealed to many. In keeping with our drive to encourage our young professionals, we were delighted to see that their attendance and interaction with our events continued to grow during the year. CEDA-NL was pleased to be able to host its events in collaboration with, and the support of, Royal Boskalis, Van Oord and Damen Shipyards. We are grateful for their generous support in facilitating our meetings. Also our annual joint meetings with KNVTS (the Dutch branch association of shipbuilders) and IRO (the Dutch branch organisation for offshore, oil & gas, and renewables) have been mutually inspiring.

# In 2017, CEDA-NL meetings were:

• 31<sup>st</sup> January, Monitoring methods of muddy bottom in ports and harbours and the nautical water depth in fairways: The meeting was organised with the Hydrographic Society Benelux, and hosted by Royal Boskalis. In the first presentation titled 'Silt in the Rotterdam harbour - endless work' Willem Snoek, of the Harbour Authority Rotterdam, gave his hydrographic view on operations and developments in monitoring techniques and how these influence the amount of maintenance dredging. He was followed by Leendert Bourgonjen, of Groningen Seaports, with his presentation 'Sustainable bed maintenance – sailing through mud' in which he showed the results of recent experiments with the TSHD Geopodes 14 sailing through mud stretches in the Delfzijl sea canal.

Styn Claes, of the Department Mobility & Public Works, Flanders, presented state-of-the-art research into nautical water depth, and finally Coen Werner, of Stema Systems, rounded off the evening with an overview of seismic monitoring concepts.



The joint evening with the Hydrographic Society Benelux was hosted by Boskalis.



Catching up with colleagues, friends and the industry's latest news over a nice meal.

• 9th March, The North Sea - Source of energy (transition): The event, held in association with IRO, covered the topic whilst considering the importance of sustainability. Eric Kreft, Leader of Decommissioning of EBN, presented 'Nederland masterplan decommissioning and re-use'. He was followed by Peter Sanders, of Partner Deloitte, who spoke on the added value to be gained from collaboration and supply chain connections in the oil and gas industry. Marjolein van Noort, Manager External Relations Royal IHC and board member Our Oceans Challenge, closed the event with her presentation 'Our Oceans Challenge' which showed the many innovative, and prosperous, possibilities to work with the natural dynamics of our seas and oceans.



- 20<sup>th</sup> April: Our April meetings are traditionally directed by a topic that concerns both the dredging and shipbuilding industries. The CEDA-NL/KNVTS club meeting dealt with 'Standardisation of Trailing Suction Hopper Dredges' and, in particular, the development and design of the Easydredge and the Beagle. Reflecting the successful standardisation of Cutter Suction Dredges in the past 60 years at Royal IHC, in the form of the Beaver CSD suite, Royal IHC picked up the standardisation of the TSHD in 2010. The audience heard from André Kik and Peter van Zanten, both of Royal IHC.
- 18<sup>th</sup> May, Turbidity caused by dredging: As guests of Van Oord Dredging and Marine Contractors, in Rotterdam, participants were treated to three presentations. Eltjo Ebbens, of LaMer Foundation in conjunction with Rijkswaterstaat, presented the views on the possible long-term impact of sand and gravel mining, on the North Sea, and the influence of this on regulations and aggregate mining concessions. He was followed by Bas van Maren, of Deltares, who continued by sharing the results of scientific research in predicting the longterm impact. (It was interesting to note that, remarkably, dredging and relocating dredged material does not always give rise to negative impact on the ecosystem.) Jurre de Vries, of Van Oord, ended with a presentation on the regulatory issues of turbidity in the tender, commissioning and operational phases, of aggregate mining projects.
- 28th September, Inland dredging: Innovations, challenges, export possibilities: This event was hosted by Damen Dredging Equipment, at their shipyard in Nijkerk. The meeting started off with an interesting tour of the shipyard building site and the dredging vessels that were on display. Hendrik Jan de Kluiver, CEO of Damen Dredging Equipment, warmly welcomed CEDA-NL and Oliver Markus, of Damen, gave us an overview of the state-of-the-art inland dredging techniques and their potential. Inland dredging from the contractors' perspective was given by René van der Zweep, of Royal Smals and he gave examples of successful project in the Netherlands and abroad. Roeland van Woerkom, of the Water Board Hollandse Delta, provided the client's viewpoint and he touched on the challenges in contract and performance monitoring. The presentations ended with a very lively exchange of views with the audience.

Copies of the presentations are available in the member section of the CEDA website.

CEDA-NL, together with the Dutch Association for Effectual Maintenance (NVDO), is one of two founding members of the Maintenance in Dredging Society (MiD). MiD organised three meetings in 2017:

- 19th April: New ways to monitor the condition of vessels
- 2<sup>nd</sup> October: The future of fuels
- 27th November: Fuel efficiency on board

Johan Pennekamp, Chair, CEDA-NL



Touring the ship yard at Damen Dredging Equipment.

### **UK Section**







Katherine Coldwell
Associated Societies
Executive

CEDA UK continued to be very active in 2017.

There were three committee meetings held throughout the year on 7<sup>th</sup> March, 9<sup>th</sup> May and 16th October.

The 7<sup>th</sup> March meeting was followed by the AGM and the Annual John Sergeant Lecture. The lecture was very much in keeping with our tradition of having a subject which only tenuously relates to the dredging business. Ian Mulcahey, Managing Director of Gensler, treated us to an entertaining presentation on the Floating Houses of Parliament Concept. The proposed modular structure, located on the River Thames, would provide a flexible and secure residence for the government during the refurbishment of its current home in the Palace of Westminster.

The 9<sup>th</sup> May meeting was held in Cardiff and the associated seminar entitled 'Dredging in Wales: A review and forward look', was particularly well supported. The presenters represented ports and renewable energy and resource organisations, and covered biodiversity and sustainable dredging management from the different perspectives.

The meeting on 17th October was the starting point for a busy afternoon, with a seminar on 'Science of Dredging: Technological transformations!', followed by our annual drinks reception. Topics for discussion included the improvements in science and technology which are opening up opportunities for operational efficiencies; enhanced data capture and visualisation; and new energy sources and storage, across all sectors. The seminar was informative and entertaining and the event was kindly sponsored by six of our corporate members: NewWaves Solutions, Boskalis Westminster, Van Oord UK, The Crown Estate, Anthony Bates Partnership and Royal Haskoning DHV UK.

We are also expecting 2018 to be busy and already have events planned including site visits to the Port of Dover Western Docks Development, in May 2018, and half-day seminar in Aberdeen, Scotland, in June 2018, followed by a site visit to Nigg Bay Project. We hope to see you during the year.

CEDA-UK
Committee



An engaged audience at a CEDA-UK event.



# **EVENTS**

# **CEDA Dredging Days 2017**

# 9-10 November 2017, Ahoy Rotterdam, the Netherlands

In November, more than 200 members of the dredging community, representing 76 organisations from 18 countries, gathered in Rotterdam, the Netherlands, for CEDA Dredging Days 2017. As is customary with the CEDA flagship event, the young, established and expert participants represented the entire cross-section of dredging and its associated fields.

In keeping with CEDA's remit, papers were of a high technical level and participants packed out the event to exchange the latest ideas, knowledge and best practice. There was reportedly a great atmosphere and plenty of opportunities for delegates to network with their peers.



Quality technical content is one reason why dredging professionals value the CEDA Dredging Days. ...

The conference focus was on dredging solutions that create essential infrastructure whilst also minimising the negative impacts on the wider environment. Solutions discussed were notable for generating additional value for nature and society. This fit perfectly with the ambitions of the new CEDA/IADC book 'Dredging for Sustainable Infrastructure' (due in 2018 – see page 26), which was introduced at the conference.

The technical programme consisted of 20 peer-reviewed technical papers, grouped into five sessions on: Environment and monitoring; Developments in instrumentation; Sustainable working methods and equipment; and

Innovative solutions. The fifth, the academic session, included scientific papers on a range of subjects. Many of the papers were written by mixed teams of specialists, quite often as a result of collaborations between different companies and across borders.

Further highlights in the packed programme included:

- a keynote by IADC president, Frank Verhoeven, in which he 'Dredged the industry's mindset'
- 7 fast-paced presentations in Young CEDA's Pitch Talks
- a lively and highly engaging interactive session on contractual problems and how to avoid them, designed and presented by the CEDA Dredging Management Commission
- CEDA presentations on completed and ongoing work including:
  - the CEDA Checklist for Successful Project Management (which launched at the conference and is available now)
  - o a CEDA information and position papers on beneficial use of dredged sediments (due in 2018)



... superb networking is another.

A nice moment in the proceedings is always the presentation of the IADC's Young Authors' Award. The winner for 2017 was Jordy Boone, Van Oord Dredging and Marine Contractors, for his paper '1DH Modelling of transport and sedimentation inside a hopper of a training suction dredger'.

Always with an eye on ensuring the future of the profession, 20 promising graduates and post-graduates were funded to attend the event as part of the Young CEDA Student Programme.



A dredging exhibition complemented the programme of the technical sessions and the busy exhibition floor was the place where everyone mingled, or simply relaxed with a coffee, during the session breaks.

The technical visit to the Princess Beatrix Lock construction site, gave participants the opportunity to see the largest monumental inland waterway lock in the Netherlands, at close quarters, as it undergoes a major expansion.

The technical sessions, dredging exhibition and the popular CEDA-Netherlands Reception on the last day, all combined to make CEDA Dredging Days 2017 another successful event that will have far-reaching benefits for the industry.

# Thanks to our supporters

The CEDA Board wishes to thank the many organisations, and individuals, who supported this important industry event by contributing to the content, discussions and exhibition, and by taking time out to attend. Their dedication and enthusiasm are essential in delivering events that are of value long after the last delegate has left.

The conference proceedings are available free to CEDA members via the CEDA website at www.dredging.org.



"CEDA offers a valuable, unique platform for the dredging industry. The network with authorities, contractors, consultants, scientists and students, is an open and safe professional network and it creates great opportunities for everyone involved in dredging, regardless of their role or organisation. CEDA Dredging Days 2017 was a particularly good opportunity to meet and exchange ideas.

I personally enjoyed the "pecha-kucha-pitches" of Young CEDA, and the interactive session on a fictitious case. It was good, and instructive, to be able to speak openly and frankly, about sensitive matters, without the usual burdens of confidentiality required when in a real project or contract situation. This interactive session offered an insight into the interests, and the rationale, of our counterparts in different organisations in a good atmosphere."

Harry Zondag, Strategic Advisor Dredging, Rijkswaterstaat, Ministry of Infrastructure and Environment, the Netherlands

For a selection of great photos with Dredging Days 2017 highlights please see the Special Feature on pages 28 - 33



# **IHS DPC Innovation Awards**

# 29 November 2017, London, UK CEDA Lifetime Achievement Award 2017

The CEDA Board were delighted to present Gerard van Raalte with the CEDA Lifetime Achievement Award for his long-standing, and continuing, contribution to dredging and CEDA. He was presented with the award, by CEDA Vice-President, Will Shields, NewWaves Solutions, UK, at the DPC Innovation Awards gala dinner, in London, UK, on 29th November 2017.

The Award, which is part of the DPC Innovation Awards, recognises an individual who has provided a significant, and proactive, contribution to the field of dredging, and is considered by the CEDA Board to have been pivotal in the development and advancement of the organisation. A CEDA Board member explained "We had a tough task in narrowing down an outstanding shortlist to one particularly deserving candidate but, in the end, we all agreed that the person who was most deserving of the award, this year, was Gerard van Raalte".



Gerard van Raalte
(Boskalis/Hydronamic,
currently GRA
Consultancy – the
Netherlands) (left)
receives the CEDA
Lifetime Achievement
Award 2017 from CEDA
Vice-President, Will
Shields( NewWaves
Solutions - UK).

Gerard, who is now retired, has been making his mark on the industry for more than 40 years. He is an experienced coastal engineer specialising in developing innovations for dredging and reclamation. As his career progressed, he became increasingly dedicated to improving the environmental aspects of dredging. His commitment to dredging is reflected in his activity in CEDA where he was instrumental in the development of the CEDA Environment Commission (CEC). He has been an active member of CEC for 20 years, and he has also been a member of the Environmental Committee of the European Dredging Association for 16 years. He was a key contributor to two joint CEDA-IADC books, on the environmental aspects of dredging, and he is actively involved in the latest joint title 'Dredging for Sustainable Infrastructure' (due in 2018 - see moren on page 26).

Gerard is well-known, respected and appreciated, internationally and across the industry. He has always been an ambassador for CEDA, and the dredging industry, and even in his retirement he continues to promote and contribute to it.

On receiving the award Gerard said "It's a privilege to have been able to work with CEDA, and share knowledge about dredging, and I'm honoured to receive this award. I'd like to thank Boskalis for allowing me the time to contribute, as part of my job. I'd also like to thank my wife, Ann, for allowing me to do so in my private time, and accepting it when I regularly disappeared to read papers. In exchange she often accompanied me on interesting trips for international working groups and committees - I would not have been able to do it without her support."

# Other deserving winners of DPC Innovation Awards 2017

Our congratulations also go to two other deserving individuals, both active members of CEDA, who received DPC Innovation Awards that evening:

- DPC Rising Start Award 2017: Roderik Hoekstra, Deltares, Young CEDA Board member.
- DPC Magazine Commendation for Services to the Industry Award: Antony Bates, Anthony Bates Partnership, Dredging and Coastal Consultants, founding member of the CEDA UK Section.

We would also like to congratulate CEDA Corporate Members – Jan De Nul Group, HR Wallingford, Port of Antwerp, and Van Oord – for winning DPC Innovation Awards.



Roderik Hoekstra (Deltares – the Netherlands) (left), receives the DPC Rising Start Award 2017 from Nick Blackmore (IHS – UK)



Anthony Bates (Anthony Bates Partnership Dredging and Coastal Consultants – UK) (left), receives the DPC Magazine Commendation for Services to the Industry Award 2017 from Lisa Maher (DPC – UK)

### **Webinars**

CEDA covers a geographically vast region and our webinar programme helps us to ensure that our most distant members benefit from our primary mission to share knowledge and best practice. Our key webinar in 2017 featured a topic that has the potential to touch every organisation however remote.

# Webinar: Cyber security: from awareness to empowerment

With an eye on the increasing hyper-connectivity of the world, and the need to guard against cyber attacks, CEDA held a particularly timely event, in June, as part of its webinar series. The webinar, Cyber security: from awareness to empowerment, focussed on the security needs of the maritime/dredging industry and was presented by Mark Luchs, Delft University of Technology, Cyber Security Group.

ICT systems are not the only ones being targeted. Research shows that attacks on control systems are on the rise.



An earlier report by Enisa (European Union Agency for Network and Information Security), on cyber security with respect to the maritime industry, indicated that, even though the industry is labelled as a critical infrastructure in Europe, there is a significant lack of awareness, and technical implementation, amongst industry professionals and government officials. This concerning fact, along with the wish to address CEDA members' questions about cyber security and how to handle it, lead to the free event in June.

During the hour, Mark provided an introduction to the increasing security threat to essential data, documents and operations. He also looked at what organisations could and should do to defend against the increasing threat and participants had the chance to ask questions.

The webinars were presented with support of CEDA corporate member, Deltares.

# **SERVICES**

In addition to providing a platform for learning, knowledge and information exchange, and networking, CEDA also offers a variety of other services to members. In particular, it publishes resources in print and online. It also gives corporate members the opportunity to present themselves online and at events.

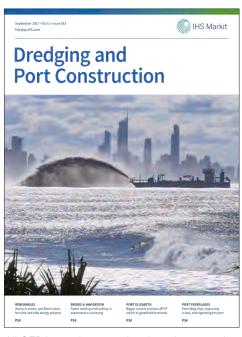
### **Publications**

# Dredging and Port Construction: CEDA's official magazine

Every CEDA member receives, as a benefit of membership, a subscription to IHS Dredging and Port Construction (DPC), the official magazine of CEDA. This specialised monthly publication keeps the readers informed of the latest developments in the sector and is helpful in identifying appropriate business partners. DPC also keeps readers up-to-date on the activities of CEDA and its sister associations, EADA and WEDA. CEDA members have access to the online version of DPC and can browse or download the archives.

Subscribers to IHS Dredging and Port Construction including all CEDA members – can benefit from enhanced features such as:

- Access to the IHS Sea-web<sup>™</sup> news module: www.sea-web.com/news
- Digital magazine: maritime.emags.ihs.com



All CEDA members receive the print magazine DPC and have access to the online version.



# **Deep-Sea Mining Information Portal**

The increasing interest in deep-sea mining, from industry and international organisations, prompted the CEDA Environmental Commission to develop a resource for anyone who needs to stay up-to-date on the topic from a sustainable dredging perspective. In addition to other materials, it contains a high-level assessment of potential environmental impacts and suggested mitigation measures. It assumes certain parameters to ensure that it can be widely used.

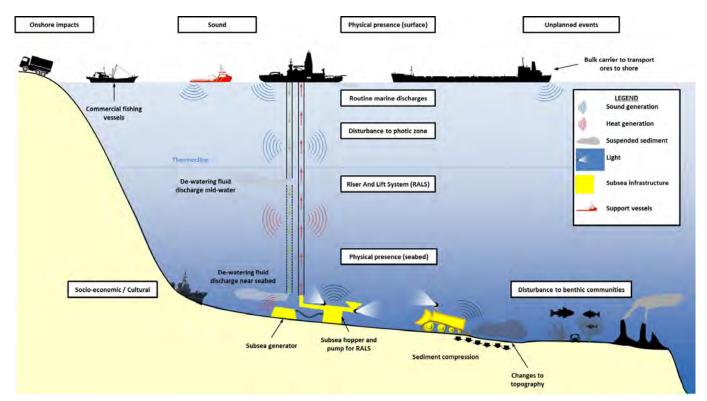
The Deep-Sea Mining Information Portal includes sections on:

- The deep-sea mining industry: Putting it into context
- CEDA involvement: Outlining CEDA's links to the industry and how CEDA members are involved throughout the sector
- Legal frameworks: Summarising the key regulatory instruments and legal frameworks that govern deepsea mining operations
- Environmental management strategy: Guidance from the International Seabed Authority (ISA) on the use of environmental impact assessments, and details of the outputs from recent workshops on environmental management strategies

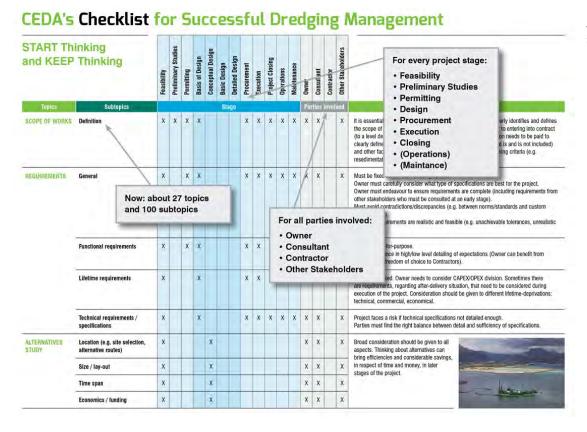
- Introduction to the typical equipment used in deepsea mining operations
- Interactive deep-sea mining infographic: a downloadable online graphic providing information on the potential environmental impacts associated with deep-sea mining
- Summary of future innovations and research

The Deep Sea Mining Information Portal can be accessed on the CEDA website at

https://dredging.org/resources/ceda-publicationsonline/deep-sea-mining-information-portal



The online portal includes an interactive graphic of potential deep sea mining impacts.



Sample page from the CEDA Checklist.

# **CEDA's Checklist for Successful Dredging Management**

A particular focus of interest for the Dredging Management Commission (DMC) in 2017, has been how the same issues are sometimes experienced differently, by different parties, across the industry. In a bid to share those experiences, and help the industry learn from its mistakes, members of the DMC, led by Kathleen De Wit (IMDC), have published a new paper entitled 'CEDA's Checklist for Successful Dredging Management'.

The Checklist shines a light on perceived differences, and in doing so, aims to help the various players better understand each other's perspective, come to mutually beneficial solutions, and improve the overall management of dredging projects. The document is a generic but comprehensive list which aims to help identify and avoid problems with dredging projects, at an early project stage, and should benefit all parties involved.

The document was presented, and well-received, at CEDA Dredging Days 2017. In her introduction, Kathleen explained that CEDA's rich member composition offered an excellent opportunity to capture the necessary information and enabled the DMC to fulfil its remit. She added, "As we know, we learn the most from our mistakes and.

in an ideal world, the same mistakes shouldn't be made twice... That's why DMC thought it would be good to start with our CEDA members and ask them about their own experiences on the things that have gone wrong in their projects. We wanted to know what happened, when and why... In particular, we wanted to know how it could have been avoided. We were grateful for their honesty, which has allowed us to collect some valuable inputs, and distil them into an undoubtedly interesting checklist of possible project 'booby traps' for you'.

The CEDA Checklist for Successful Dredging Management is an organic document and the DMC will continue to update it based on further input from CEDA members.





# In preparation: Information paper and a position paper on beneficial use of dredged sediments

The CEDA Working Group on Beneficial Use (WGBU) met three times during 2017, and completed the main part of the work on these two papers.

"The working group's first job is to make organisations aware that use and reuse is important" explained the chairman, Luca Sittoni (Deltares – the Netherlands) in an interview with DPC's editor, Lisa Maher. He added, "It can make a huge difference to new and existing developments – whether near home (in the Netherlands, Belgium or Germany) or further away (in Africa or south-

east Asia). We intend to provide the knowledge and experience, to let ports, for example, which already deal with maintenance dredging, sediment removal, storage, costing, etc., use the material as a resource, rather than simply depositing it at sea as waste". (Read the full interview in the July issue of DPC or on the CEDA website.)

The information paper will inform practitioners about recent advances, and best practices, regarding beneficial use of sediment, in the context of sustainable development, through case studies. It will also reach out to the community to invite other experts and practitioners to share case studies, experiences and lessons learned.



The second face-to-face meeting of the CEDA Working Group on Beneficial Use (WGBU) took place in Antwerp, Belgium, at the dredged sediment treatment facility, Amoras. (I to r): Thomas Vijverberg (Boskalis - the Netherlands), Dafydd Lloyd Jones (Marine Space, UK), David Tenwolde (Dredging Marine Offshore Services the Netherlands), Joost Koevoets (Royal IHC - the Netherlands), Heinz-Dieter Detzner (Port of Hamburg - Germany), Marco Wensveen (Port of Rotterdam - the Netherlands), Arjan Wijdeveld (Deltares the Netherlands ), Ivo Pallemans (Jan De Nul - Belgium), ), Luca Sittoni (Deltares - the Netherlands), Chris Schalm (Ministry of Infrastructure and Water Management/ Rijkswaterstaat - the Netherlands), Peter Seymour (ECOCEM - Ireland).

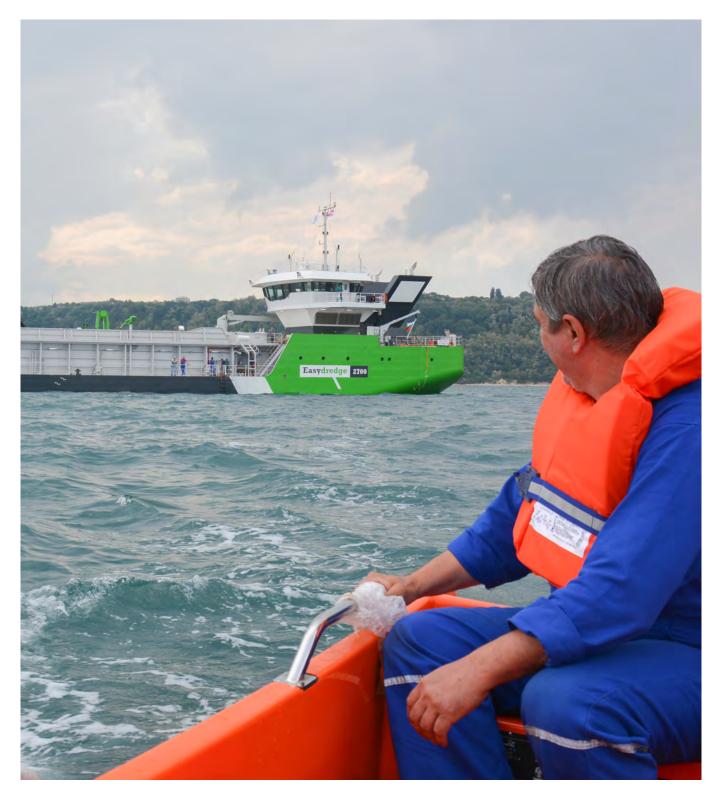


Participants of the third face-to-face meeting hosted by Port of Rotterdam at the Slufter Confined Disposal Facility. (I to r): Thomas Vijverberg (Boskalis - the Netherlands), Luca Sittoni (Deltares - the Netherlands), Arjan Wijdeveld (Deltares - the Netherlands), Ivo Pallemans (Jan De Nul - Belgium), Marco Wensveen (Port of Rotterdam - the Netherlands), Helmut Meyer (Federal Waterways and Shipping Agency - Germany), Nick Buhbe (Greatecology - USA), Chris Schalm (Ministry of Infrastructure and Water Management/Rijkswaterstaat - the Netherlands), Heinz-Dieter Detzner (Port of Hamburg - Germany). Not pictured: Peter Seymour (ECOCEM - Ireland) and Eric Stern (Tipping Point Resources Group - USA) who both participated in the meeting remotely.

The authors acknowledge that some contamination may be present in sediments, especially those originating from industrial areas, but the information paper will not deal with this topic. Instead, a parallel position paper will be produced to cover the risks of, approaches to, and opportunities of, sediments with various degrees of contamination.

Luca gave a sneak preview of the two papers to delegates at CEDA Dredging Days 2017. His presentation is available on the CEDA website.

The WGBU includes experts on beneficial sediment use from various countries, connecting CEDA with the sister organisations WEDA and EADA. The two papers will be published in May 2018.





# In preparation: Information paper on seafloor integrity

The Marine Strategy Framework Directive (MSFD, 2008/56/EC) establishes a framework within which Member States take the necessary measures to achieve, or maintain, good environmental status (GES) in the marine environment. Several of the 11 qualitative descriptors, which determine GES, relate to dredging works and marine construction. Dredging is directly linked to descriptor D6 on sea-floor integrity which states:

'Sea-floor integrity is at a level that ensures that the structure and functions of the ecosystems are safe-guarded and benthic ecosystems, in particular, are not adversely affected'.

The dredging community is not as familiar with descriptor D6 as it could be so the Working Group on Sea-floor Integrity (WGSI), which reports to CEDA Environment Commission (CEC), has been asked to address the topic in a CEDA information paper. The paper will cover what is meant by seafloor integrity, and why it is important, and the role of the seafloor for marine environments (eco-engineers). It will then move on to discuss how dredging affects seafloor integrity and how to assess the effects. Managing risk and opportunities will also be covered and there will be useful case studies and recommendations included. The Working Group works closely with the MSFD NAVI Task Group through the CEDA representatives on NAVI, Chantal Martens, NAVI Chair (Ministry of the Flemish Community Maritime Access Division - Belgium) and Dafydd Lloyd Jones (Marine Space - UK). They met in November to discuss the first draft and the final paper is expected in summer 2018.



Participants of the inaugural WGSI meeting in Antwerp, hosted by Ministry of the Flemish Community Maritime Access Division, Belgium (I to r): Remment ter Hoofstede (Van Oord - the Netherlands), Jannes Kamphuis (Royal IHC - the Netherlands), Ine Moulaert (Jan De Nul - Belgium), Theo Prins, attending for colleague, Arjan Boon (Deltares - the Netherlands), Dafydd Loyd Jones (Marine Space - UK for MSFD NAVI), Annemiek Hermans (at the time Boskalis - the Netherlands), Chantal Martens (Ministry of the Flemish Community Maritime Access Division - Belgium, for MSFD NAVI), Mark Huygens (DEME - Belgium) and Frederik Roose (Ministry of the Flemish Community Maritime Access Division - Belgium, for the CEDA Environment Commission (CEC)).



WGSI Chair, Anne Lise Middelboe (DHI – Denmark) (second from left) discusses the outline of the planned paper with members of the CEC during their meeting in Copenhagen, hosted by Sweco. CEC members in the picture (I to r): Alessandra Feola (ISPRA – Italy), Frederik Roose (Ministry of the Flemish Community Maritime Access Division – Belgium), Mark Bollen (IMDC – Belgium), Klavs Bundgard (Sweco – Denmark).

# In preparation: Guidance paper on contracting and procurement methods

At the end of the year, the first Working Group of the Dredging Management Commission (DMC) was tasked with an assignment to produce a CEDA guidance paper on contracting and procurement methods. The aim of the paper is to raise awareness of the related factors within the industry. It will also provide informative guidance which can be used and referenced by parties when procuring works and entering into contracts. The paper will provide the relevant information in a broadly accessible format.



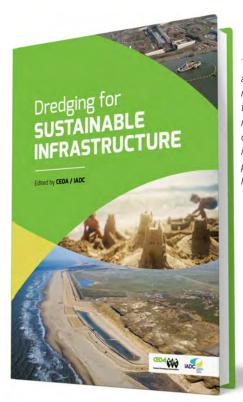
The first meeting of the working group on contract type selection took place in early January 2018. (I to r): Stan Putter (Conway Advocaten & Attorneys at Law - the Netherlands), Harry Zondag(Rijkswaterstaat - the Netherlands), Gerard van Raalte (GRA Consultancy - the Netherlands), David Gwillim (Pitmans Law – UK), Luc Imbrechts (Imbrechts & Van den Nest byba – Belgium), Ralph Hubert (Wasserstrassen- und Schifffahrtsamt Bremerhaven – Germany), Dirk-Jan Karssen (Fugro-Netherlands), Dirk Roukema (Blue Pelican Associates BV - the Netherlands). Claudia Knijnenburg (Port of Rotterdam - the Netherlands), joined the meeting after the photo was taken.



# In preparation: CEDA-IADC handbook 'Dredging for Sustainable Infrastructure'

The ambition of this book (due in 2018) is to be the essential guidance to planning, designing, implementing and operating, hydraulic infrastructure where dredging is involved. The aim will be to ensure sustainable projects that ultimately benefit society, nature and the economy, as a whole. The basic premise of the book is that this can only be achieved through a thorough understanding of the natural environment and its services and through the active involvement of stakeholders.

Dredging for Sustainable Infrastructure will be an invaluable resource for planners, designers, decision makers, regulators, contractors, environmental conservationist, and financial institutions, with a stake in hydraulic infrastructure. With backgrounds ranging from engineering to environmental, and social sciences to economics they will appreciate the need to deliver projects with longevity, that do more than just the basics.



This book will be an invaluable resource for those who are responsible for delivering hydraulic infrastructure projects with longevity.

Early 2017, the Editorial Advisory Board (EAB) ran a second international workshop in Brussels, Belgium, with 30 experts, many of them with decades of experience in the field. The purpose of the workshop was to ensure that the EAB was on the right track, and that this was the book the audience had been waiting for. It was a lively two-day event resulting in lots of useful comments

and suggestions. In addition, the vast amount of knowledge and experience, so generously shared by participants, has been channelled into the book in the form of numerous case studies.

The CEDA Environmental Commission reviewed the draft and has provided valuable in-depth comments. Special thanks were expressed to the expert team at Boskalis, providing expertise in engineering and natural sciences, for the detailed and constructive comments.

For a set of great photos about the work on the book in 2017 please see the Special Feature on pages 34-37.

# **Digital services**

### **CEDA** websites and e-newsletters

The two CEDA websites, www.dredging.org and www.cedaconferences.org, as well as the CEDA Newsletter, are the most effective ways to keep members, and other stakeholders, informed about CEDA's activities. They also facilitate the sharing of dredging knowledge and information. More and more employees of CEDA corporate members are opening personal accounts to allow them to bypass the CEDA contact points for their organisations and directly access CEDA e-notices and e-newsletters.

# **CEDA** proceedings online

The proceedings section of the CEDA website now contains over 1050 CEDA conference and congress papers, all of which have been peer-reviewed. These are available on the CEDA website (Resources > CEDA publications online) and are readily accessible to CEDA members free of charge.

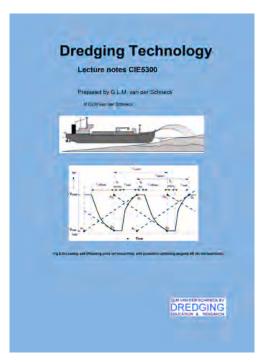
The online proceedings are also available to nonmembers who can access any full paper for €20.00.



The latest edition to the set of online proceedings is the Proceedings of CEDA Dredging Days 2017.

# **Publications by others**

Visitors to the Resources section of the CEDA website can find publications that have been kindly made available to us, by members and supporters, or books that are available at a CEDA member discount. In 2017 we added the Dredging Technology Lecture Notes, by Mr van der Schrieck, to the latter category.



This book, along with several others, can be ordered at a special CEDA member discount.

### **Presentations online**

A range of presentation files from international and CEDA national section meetings are also available for members, on the CEDA website, along with the webinar presentations (the webinars do not currently require member login).

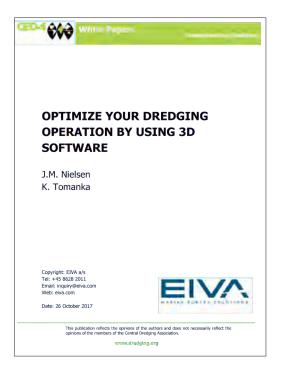
### Social media

We are happy to report that the number of followers engaging with CEDA on social media – Twitter (@CEDAdredging) and LinkedIn – has continued to grow. In 2017 we worked on expanding our reach to enable members, and non-members, to connect, share ideas, and keep up-to-date more easily.

Those interested in dredging can communicate, start debates and network with each other, on four LinkedIn groups - CEDA, Young CEDA, CEDA-UK, and CEDA Adaptive Management. Each group allows members to connect, and have meaningful dialogue, with like-minded professionals and associates in the industry.

# Services to corporate members

Corporate members of CEDA have the opportunity to promote their products and services directly to the membership. They can also reach a broader audience through publishing commercial white papers on the CEDA website, which we distribute via the CEDA e-newsletter and our social media channels including LinkedIn and Twitter.



In 2017, we published this CEDA White Paper by Corporate Member EIVA, Denmark.

The list of corporate members on the CEDA website, with hyperlinks to their websites, is one of the most frequently visited pages of our site.



# SPECIAL FEATURE: CEDA DREDGING DAYS 2017 (9-10 NOVEMBER 2017, ROTTERDAM, THE NETHERLANDS) - HIGHLIGHTS IN PICTURES

### Networking before the conference even started!



In the light-hearted and fun breakfast session, early morning on 9 November, participants were taken through a series of quick-fire, ice-breaker exercises designed to help them make the most of the networking opportunities at the event.



"Great idea! Early start and, as a bonus, you avoid the traffic jam!" said Rene Kolman, IADC's Secretary General.

### **Technical sessions**

CEDA Dredging Days has the reputation for high-quality, relevant and timely technical content.



Polite Laboyrie, CEDA President (Witteveen+Bos – the Netherlands) opens the conference.



Prof. ir. Cees van Rhee, Chairman of the Technical Papers Committee (Delft University of Technology – the Netherlands), introduces the conference theme and invites the keynote speaker to the floor.



In his keynote, Frank Verhoeven, IADC President, 'dredges the industry's mindset'.



'CEDA's Checklist for Successful Dredging Management': In a featured presentation, about this first output from CEDA's new Dredging Management Commission, Kathleen De Wit (IMDC – Belgium) stresses that the aim of the document is to help the various players, in dredging projects, better understand each other's perspective and come to mutually beneficial solutions.



CEDA Dredging Days have a well-deserved reputation for high-quality content. The presentations in the peer-reviewed technical sessions are closely followed by a captive and expert audience.



On behalf of Young CEDA (see page 47) Jort van Wijk (IHC MTI – the Netherlands) does a great job in moderating the mobile app Q&A.

# **Dredging exhibition**

The exhibition was a busy place during the breaks, where lots of contacts were made.



















### Interactive session on contract management.

In this lively and highly engaging session, designed and presented by the CEDA Dredging Management Commission, working on a fictitious case, participants discussed contractual problems and how to avoid them. The session was an outstanding success.









Working in small groups, participants took the role of an external contract consultant for the port authority.





Members of the panel (I to r) Johny Van Acker (Dredging International – Belgium), André van Hassent (Port of Rotterdam – the Netherlands), Kathleen De Wit (IMDC – Belgium), Charles Wilsoncroft (HKA – UK) represented the contractor, the project owner, the consultant and the legal advisor.



Groups tell fellow participants their agreed position about the issues discussed.



Feedback from the groups are recorded in real time.



"This was fun!" A selfie, before the group breaks up.

### **Young CEDA Pitch Talks**

With a dynamic series of 7 short, sharp presentations, on the overall theme of the conference, this session delighted everyone. Organised for the third time, the Young CEDA Pitch Talks provide students and young professionals with a platform to present their ongoing work, expose their ideas to a broad expert audience, and get immediate feedback and inspiration.



Young CEDA Pitch Talks speaker line-up during Q&A (I to r): Denis van Kester (Van Oord – the Netherlands), Arjan Frens (Boskalis – the Netherlands), Yorian Van Leeuwen (DEME – Belgium), Katherine Cronin (Deltares – the Netherlands), Camille Kapela (Egis Ports – France), Sina Raremi (DHI – Denmark), Ben Sloof (Damen Dredging Equipment – the Netherlands). Right: Session chair Roderik Hoekstra (Deltares – Netherlands).



Arjan Frens (Boskalis – the Netherlands), one of the Young CEDA speakers gives his talk...



...while his fellow speakers in the session pay close attention...



# Superb networking

There were plenty of opportunities for networking during the breaks, at the CEDA-NL Reception and the farewell drinks.















# IADC Young Authors' Award



Jordy Boone (r) (Van Oord Dredging and Marine Contractors – the Netherlands) won the IADC Young Authors' Award for his paper '1DH Modelling of transport and sedimentation inside a hopper of a training suction dredger'. On the left: Rene Kolman, Secretary General IADC.

# Mobile app embraced



The savvy and fun-loving participants who played the mobile app photo challenge game.

# **Young CEDA Corner**







CEDA sponsored student delegates.

### **Technical visit**

Hosted and sponsored by the Jan De Nul Group, the site visit was a great opportunity to see the largest monumental inland waterway lock in the Netherlands, at close quarters, as it undergoes major expansion.

At the Princess Beatrix Lock.









# SPECIAL FEATURE: ON THE WAY TO THE NEW CEDA/IADC BOOK 'DREDGING FOR SUSTAINABLE INFRASTRUCTURE'

### Preparing the next stage

The second workshop 2-3 February 2017, in Brussels, Belgium

The aim of this workshop was to check that the book was heading in the right direction, and was on target to meet the audience expectations laid out in the first workshop hosted by the Hamburg Port Authority, in 2014. The second workshop was attended by 30 experts with a broad range of specialist knowledge, from Australia, Belgium, Denmark, France, the Netherlands, Portugal, Russia, UK and USA. There were lots of good discussions and the workshop delivered priceless results for the Editorial Advisory Board (EAB) and the lead authors.



Prof. ir. Stefan Aarninkhof, EAB member (Delft University of Technology – the Netherlands) reminds participants of the book's aims.



In front (I to r): François Dekeuleneer and Mark Huygens (DEME – Belgium).



30 international experts with a broad range of specialist knowledge from 9 countries, across the globe, participated in the workshop. Among them were several members of the Environment Commissions from CEDA, WEDA and PIANC.



(I to r): Erik van Eekelen (Ecoshape – the Netherlands), Ron Cox (School of Civil and Environmental Engineering – Australia), Rienk Hessels (Rohde Nielsen – Denmark), François Dekeuleneer and Mark Huygens (DEME – Belgium).



Chapters 2 and 3 will cover the broader picture that dredging operates in. Chapter 4 on assessment and management of sustainability, will be the basis from which subsequent chapters will develop. They triggered a lot of discussion. In the picture (clockwise): François Dekeuleneer (DEME – Belgium), Christine Adnitt, lead author of the chapters (Royal HaskoningDHV – UK), Claire Jeuken (Deltares – the Netherlands) and Ida Brøker (DHI – Denmark). In front, Philip Spadarro (TheIntelligenceGroup - USA) and Paul Scherrer (Dragages Ports – France).



(I to r): Christine Adnitt, lead author of Chapter 4 on assessment and management of sustainability (Royal HaskoningDHV – UK) and Katherine Harris (Harris Holden – UK).



Lead authors of Chapter 5 on dredging and construction operations, (clockwise): Gerard van Raalte (GRA Consultancy, formerly Boskalis – Netherlands) and Marcel Van Parys (Jan De Nul Group – Belgium) with EAB member, Mark van Koningsveld (Van Oord Dredging and Marine Contractors – the Netherlands) and Mark Huygens (DEME – Belgium).



Dredged sediment management offers great opportunities for nature-based solutions. This will be discussed in Chapter 6. Lead author Pol Hakstege (Hakstege Consultancy - the Netherlands), centre, in discussion with Mark van Koningsveld (Van Oord Dredging and Marine Contractors – the Netherlands), left, and Burton Suedel (USACE – USA), right.



You can always count on a good laugh with Mark Lee (HR Wallingford – UK), lead author of Chapters 7 and 8 on modelling and monitoring (2<sup>nd</sup> from left). With him is (I to r): Rienk Hessels (Rohde Nielsen – Denmark), Burton Suedel (USACE – USA), Erik van Eekelen (Ecoshape – the Netherlands), Michael Shilin (Russian State University of Hydrology – Russia).



The 'harvest': the collection of suggestions for project examples, procedures that would benefit detailed guidance, and subjects that would need in-depth discussion, is growing for each chapter.



Wrapping up on two very productive days.



### Writing up session moments

In 2017 the work intensified. After the workshop in February EAB members and lead authors had 3-day working sessions, on 4 occasions, at the IADC offices in the Hague, the Netherlands, and followed up with another meeting, in January, at HR Wallingford, UK.



May 2017 (clockwise): Mark van Koningsveld (Van Oord Dredging and Marine Contractors – the Netherlands), Mark Lee (HR Wallingford – UK), Polite Laboyrie (Witteveen+Bos – the Netherlands), Anders Jensen (DHI – Denmark), Anna Csiti (CEDA Secretariat – the Netherlands), Marcel Van Parys (Jan De Nul Group – Belgium), Rene Kolman (IADC Secretariat – the Netherlands).



September 2017 (clockwise): Anders Jensen (DHI – Denmark), Polite Laboyrie (Witteveen+Bos – the Netherlands), Mark Lee (HR Wallingford – UK), Marcel Van Parys (Jan De Nul Group – Belgium), Prof. ir. Stefan Aarninkhof (Delft University of Technology – the Netherlands), Rene Kolman (IADC Secretariat – the Netherlands).

December 2017 (clockwise): Stefan Aarninkhof (Delft University of Technology – the Netherlands), Mark van Koningsveld (Van Oord Dredging and Marine Contractors – the Netherlands), Mindert de Vries (Deltares – the Netherlands), Gerard van Raalte (GRA

Consultancy - the Netherlands).



Informing the dredging community of the upcoming book



Polite Laboyrie, Chairman of the Editorial Advisory Board, (Witteveen+Bos - the Netherlands) at CEDA Dredging Days 2017 in Rotterdam ...



... and at the CHIDA conference in Beijing.

## **Concentrating ambition**

Chairman of the EAB, Polite Laboyrie (Witteveen+Bos – the Netherlands), challenged EAB members and authors to reduce the original project ambition down to its essence. Gerard van Raalte (GRA Consultancy – the Netherlands) had a go at concentrating the text and this is what he came up with.

Original text: Our ambition is to achieve dredging projects

that fulfil their primary functional requirement,

while adding value to the (natural and socio-economic) system based on thorough understanding of the natural system and

proactive engagement of stakeholders throughout. This book provides guidance to make this possible.

Can the same be said with fewer words..?

Ambition to achieve dredging projects

fulfilling primary requirement, while adding value to system, based on of nature system and

Being understanding proactive to stakeholders.

Book gives guidance.

Still too long...

Ambition dredging projects

fulfilling requirement, with value to system, understanding nature proactive stakeholders.

Book with guidance.

Must be shorter...

Dredging

for requirement,

and value,

Nature and stakeholders.

Guidance book

...and even shorter...

Dredging book

Shorter

BOOK!!!





# REPORTS FROM THE COMMISSIONS

CEDA currently has 5 active commissions that report to the Board. The reports appear here in alphabetical order.

## **Communications Commission (CCC)**







**Deborah Rowe**Secretary and Content Editor

CEDA Communications Commission (CCC) meeting in February 2017 was kindly hosted by Tideway at their offices in Breda, the Netherlands. At the meeting it was agreed that the main communications for the year would focus on the flagship event - CEDA Dredging Days 2017. Much of our activities across the year centred on using social media and other channels to communicate details of the developing technical programme and exhibition, and to encourage registrations.

CCC continued to work closely with its social media agency to improve CEDA's digital presence and refine how we engage online with members and the broader dredging community. The agency joined the CCC meeting, via teleconference, to give a presentation on our social media performance in the past year. They gave us some useful tips which we have been putting into practice. Part of their recommendations included a website audit, and changes to content, to improve our search engine optimisation (SEO) and CEDA's online profile. The audit proposal was approved by CEDA Board, and work on implementing the improvements started later in the year. Beyond that, our social media engagement has continued to grow, with more members, industry contacts and media, actively engaging with our communications across LinkedIn, the professional network, and Twitter.



CCC at their meeting hosted by Tideway, Breda, in the Netherlands (I to r): Kathleen De Wit (IMDC - Belgium), Nicolas Hibert (Dredging International – Belgium), Martin van Ommen (Royal IHC – the Netherlands), Will Shields (at the time Boskalis Westminster, currently NewWaves Solutions - UK), Deborah Rowe (Sheba Marketing – UK).

In more traditional areas, we have had encouraging feedback from members on our e-newsletters and printed newsletters and we will continue to use them to keep people informed of our activities. Our most recent issue of CEDA News, in November, was produced specially for Dredging Days 2017 and we distributed additional copies to corporate members, on request, for display use. (If you would like extra copies for your reception, or staff areas, please contact CEDA Secretariat.)

CCC supports the commissions, working groups and national sections, in keeping members informed of CEDA activities and communicating CEDA's work to the wider community. To help with this we have developed additional materials to help corporate members explain 'what CEDA does':

- A5 postcard with 'useful facts about CEDA', a breakdown of membership, and contact details.
- Slides about CEDA that can be dropped into CEDA members presentations as appropriate.
- The organogram provides a graphic representation of how CEDA's different commissions, working groups and sections fit together.

Finally, the Annual Report was edited, designed and produced with the help of CCC members and we would particularly like to thank Dredging International, Belgium, for their support with its production.

Will Shields
Chair, Communications Commission

## **Dredging Management Commission (DMC)**



Polite Laboyrie
Acting Chair

The Dredging Management Commission (DMC) was set up in response to the corporate members' survey we conducted in 2015. It provides a forum for initiating and facilitating discussions, innovations and questions, from the dredging community, on the management of dredging works in the broadest sense. Its aim is to bring together all stakeholders related to dredging management works, and to be:

- the discussion platform
- the focal point of contact
- the initiator of knowledge development

DMC members are currently working on:

- optimising a dredging strategy for ports, waterways, coastal and flood protection
- contract management simplifications
- monitoring and promoting the development of the state-of-the-art dredging technology for the future

As a result, we aim to encourage mutually beneficial improvements and solutions for all those involved.

DMC during their second meeting, hosted by Port of Rotterdam, at the World Port Centre (I to r). Front row: Claus Iversen (Femern -Denmark), Mark Winkelman (Damen Dredging - the Netherlands), Bas van Maren (Deltares - the Netherlands), Kathleen De Wit (IMDC -Belgium), Camille Kapela (Egis Ports - France), Murat Ege (AECOM - Qatar). Back row: Hilco Timmer (Witteveen+Bos - the Netherlands), Andre van Hassent (Port of Rotterdam - the Netherlands), Charles Wilsoncroft (HKA - UK), Bert Visser (Ministry of Infrastructure and Water Management/Rijkswaterstaat - the Netherlands), Johny Van Acker (DEME - Belgium), Koos van der Geer (Van Oord Dredging & Marine Contractors - the Netherlands), Polite Laboyrie, (Witteveen+Bos - the Netherlands).







The 'Checklist' under final review by members of the DMC (I to r): Andre van Hassent (Port of Rotterdam – the Netherlands), Mark Winkelman (Damen Dredging Equipment – the Netherlands), Johny van Acker (Dredging International – Belgium), Stan Putter (Conway Advocaten & Attorneys-at-Law – the Netherlands), Wim Defere (Port of Antwerp – Belgium), Murat Ege (AECOM – Qatar), Claus Iversen (Femern – Denmark), Rienk Hessels (Rohde Nielsen – Denmark), Koos van der Geer (Van Oord Dredging & Marine Contractors – the Netherlands), Polite Laboyrie (Witteveen+Bos – the Netherlands), Kathleen De Wit (IMDC – Belgium), Bert Visser (Ministry of Infrastructure and Water Management/Rijkswaterstaat – the Netherlands).

## The first year

Since the inaugural meeting in September 2016, the group has grown and is now even more enthusiastic about its task. A bit more than one year on, DMC has an impressive track record that includes:

- the publication of CEDA's Checklist of Successful Dredging Management – a generic but comprehensive list, of possible project 'booby traps', which draws on CEDA's rich member composition, and vast pool of experience. It asks users to "START thinking and KEEP thinking" (see also on pages 21 and 28)
- running the highly successful interactive session on contracts, which featured as part of the CEDA Dredging Days 2017 programme (see photos on pages 28-33)
- initiating the latest Working Group on Effective Contract/Procurement Type Selection, which had its first meeting on 18th January (see also on page 25)

### The next topic: dredging technology

DMC is already busy with the next focus which is to reduce the gap between dredging technology-related challenges and solutions. We will seek to understand, and encourage discussion around, the challenges project owners face now and in the future. We will also highlight the technologies and methodologies, that are already available, or are being developed, by contractors and equipment manufacturers.

Typical topics that DMC's Focus Group on Dredging Technology is already working on include:

- the new types of equipment which are being developed
- possible developments in operational limits
- the possible restrictions facing consultants and clients
- · looking for where the gaps in knowledge might be

The Focus Group will organise a series of regional workshops to gather input from the entire CEDA membership, and to get participants discussing the requirements, and solutions, for their particular fields of expertise. The Group plans to hold the workshops in Belgium, Germany, the Netherlands, Spain and Scandinavia during 2018/2019.

Chairing DMC has been a very nice and rewarding experience. I am very pleased that Koos van der Geer, of Van Oord, the Netherlands, has agreed to take over this role in 2018. He has broad operational experience in dredging and marine contracting, combined with experience in project engineering, commercial management and QHSE management. He is currently manager of Van Oord's Project Office. With Koos at the helm, I am confident, that DMC is in good hands and will continue to go from strength to strength in achieving its remit.

Polite Laboyrie
Acting Chair, Dredging Management Commission

## **Environment Commission (CEC)**



Frederik Roose Chair

CEDA Environment Commission (CEC) held two meetings in 2017. The spring meeting, hosted by Boskalis, was in Papendrecht, the Netherlands, and the autumn meeting, was hosted by Sweco in Glostrup, Copenhagen, Denmark.

The year saw a few changes to Commission members. Erik van der Blom and Helmut Meyer (Federal Waterways and Shipping Agency - Germany) both transferred to the Dredging Management Commission. They have been replaced by new members Leonard den Boer (IHC – the Netherlands) and Volker Steege (Federal Ministry of Transport and Digital Infrastructure – Germany). Andy Birchenough has left Cefas, to join the International Maritime Organisation, and has stepped down from his role in CEC. He will be replaced by Jemma Lonsdale (Cefas - UK) in 2018.

The Commission would like to thank Erik, Helmut and Andy, for their contributions to CEC over the years, and I'd personally like to wish them all the best on their new endeavours!



During its 2017 spring meeting CEDA Environment Commission visited the construction site of Markerwadden in the Marker Lake, the Netherlands (I to r): Astrid Kramer (Boskalis – the Netherlands), Alberto del Pino (Dravosa - Spain), Annelotte Baas (Boskalis – the Netherlands), Vera Breitung (Federal Institute of Hydrology – Germany), Rita Ramos (Port of Lisbon – Portugal), Sina Saremi (DHI – Denmark), Frederik Roose (Department of Mobility and Public Works – Belgium), Pieter de Boer (Rijkswaterstaat – the Netherlands), Klavs Bundgard (Sweco – Denmark), Marijn Huijsmans (Witteveen+Bos – the Netherlands), Marc Huygens (DEME – Belgium), David Sutherland (HR Wallingford – UK), Erik van der Blom (Royal IHC – the Netherlands) and Leonard den Boer (Royal IHC – the Netherlands).



# THANK YOU



Andrew Birchenough (Cefas – UK)



Eric van der Blom (Royal IHC – the Netherlands)



Helmut Meyer (Federal Waterways and Shipping Agency – Germany)



During the autumn meeting in Copenhagen, CEC was invited to Rohde Nielsen. In the photo, Peter Lauridsen tells about interesting recent projects.

## **Working groups**

The Working Group on Beneficial Use of Dredged Material and the Working Group on Seafloor Integrity, were set up in 2017. Terms of reference were drafted for two new working groups, on energy efficiency and turbidity limits, and invitations to join them will go out in 2018.

The Working Group on Beneficial Use of Dredged Material is tasked with delivering an information paper with a selection of recent case studies which illustrate best practice in the context of sustainable development. They will also produce a parallel position paper which considers the risks and opportunities of using sediments with varying levels of contamination. Working Group member Luca Sittoni, presented intermediate results during the CEDA Dredging Days, in November, and both publications are due to publish in 2018. You can read more about them on pages 22-23 and see Luca's presentation on the CEDA website.

Seafloor Integrity is one of the qualitative descriptors of the Good Environmental Status (GES) in the marine environment, as described in the Marine Strategy Framework Directive (MSFD). As this descriptor is directly linked to dredging works and marine construction, the Working Group on Seafloor Integrity has been established to help dredging professionals get to grips with it. Their task will be to prepare an information paper which details the descriptor, its related criteria, and the methodological standards. The Working Group had their first meeting on 18th May 2017 in Antwerp. For more see on page 24.

## **Publications**

Deep-Sea Mining Information Portal: The increasing interest in deep-sea mining, from industry and international organisations, prompted CEC to establish an online resource to keep the community up-to-date on its environmental impacts from a dredging perspective. More information is available on page 20 and the portal can be accessed at <a href="https://dredging.org/resources/ceda-publications-online/deep-sea-mining-information-portal">https://dredging.org/resources/ceda-publications-online/deep-sea-mining-information-portal</a>.

Within CEDA, the new CEDA-IADC handbook 'Dredging for Sustainable Infrastructure' falls under CEC's responsibility. The Commission has been involved from the very beginning. In our spring meeting we reviewed the draft text and provided in-depth comments to the Editorial Board on each chapter. For more on the book see on pages 26 and 34 - 37.

## Representing CEDA at other events



Pieter de Boer (Ministry of Infrastructure and Environment/Rijkswaterstaat - the Netherlands)

In addition to papers presented by our members at CEDA events, CEC was delighted to be able to represent CEDA at the 3rd European Climate Change Adaptation conference, in Glasgow in June 2017. Pieter de Boer (Ministry of Infrastructure and Environment/Rijkswaterstaat - the Netherlands) presented CEDA's Information Paper on Climate Change Adaptation at the session on soft sediment solutions.

## **Environmental policy work**



Prof Tiedo Vellinga Vellinga (Delft University of Technology and Port of Rotterdam – the Netherlands)

A key task for CEC is to develop and implement CEDA's environmental policy, and represent CEDA at meetings of international conventions and other regulatory forums, such as the London Convention and Protocol (LC/LP) and the Oslo and Paris Convention (OSPAR).



The Science Day, at the scientific meeting of the London Convention in March 2017, focused on waste prevention audits which aim to identify and control sources of contamination. On behalf of CEDA, Prof Tiedo Vellinga (Delft University of Technology and Port of Rotterdam – the Netherlands) gave a presentation, entitled 'Sediment management and source control, the Port of Rotterdam case', which was well received.



**Laura Lallier** (eCoast – Belgium)

Laura Lallier (eCoast – Belgium) attended the meeting of OSPAR's Environmental Impacts of Human Activities Committee (EIHA), in April 2017 on behalf of CEDA. She informed the OSPAR meeting about the forthcoming publication of the Deep-Sea Mining webpages on CEDA's website and about the book

'Dredging for Sustainable Infrastructure'. This was the last time that Laura would represent CEDA at the OSPAR EIHA meeting, so our thanks go to her for her excellent work over the years!

There are a number of relevant dredging-related Directives of the European Commission including the management of dredged sediments. CEDA is involved as a stakeholder in the implementation process of the Marine Strategy Framework Directive (MSFD) and is chairing the MSFD NAVI group, which provides input to the EU on this legislative process.

The revision of the Commission Decision that defines criteria for assessing Good Environmental Status (GES), to which MSFD NAVI contributed, was completed in 2017 with the publication of the revised Commission Decision 2017/848. The revised Decision will be applied by Member States when updating their Marine Strategies in 2018. MSFD NAVI expects that some uncertainties may still exist on how the Member States will interpret the new Decision and will follow up on the updated strategies in 2018.

Several of the 11 qualitative descriptors are directly or indirectly linked to dredging works and marine construction, hence the need for the new Working Group.

Frederik Roose Chair, Environment Commission



## **CEDA** representatives at international forums



**Andy Birchenough** Cefas, UK

- LONDON CONVENTION
- OSPAR



Pieter de Boer Ministry of Infrastructure and Environment, Netherlands

◆ EU WASTE DIRECTIVE



**Vera Breitung**German Federal
Institute of Hydrology, Germany

INTERNATIONAL
 COMMISSION FOR THE
 PROTECTION OF THE
 RIVER DANUBE



Dafydd Lloyd Jones

Marine Space, UK

- EU MARINE STRATEGY
   DIRECTIVE WG GES
- EU MARINE STRATEGY
   DIRECTIVE NAVI



**Chantal Martens**Ministry of Flemish
Community,
Maritime Access,
Belgium

- ◆ EU MARINE STRATEGY

  DIRECTIVE NAVI (CHAIR)
- EU MARINE STRATEGY DIRECTIVE STRATEGIC CO-ORDINATION GROUP
- EU MARINE STRATEGY DIRECTIVE
  WORKING GROUP
  ON PROGRAMME OF
  MEASURES, ECONOMIC
  AND SOCIAL ANALYSIS



**Tom Matthewson** HR Wallingford, UK

- OSPAR INTERSES-SIONAL CORRESPON-DENCE GROUP
- MARINE STRATEGY
   DIRECTIVE



**Henrich Roeper** Hamburg Port Authority, Germany

- EU WATER FRAMEWORK
   DIRECTIVE NAVI
- EU MARINE STRATEGY
   DIRECTIVE NAVI



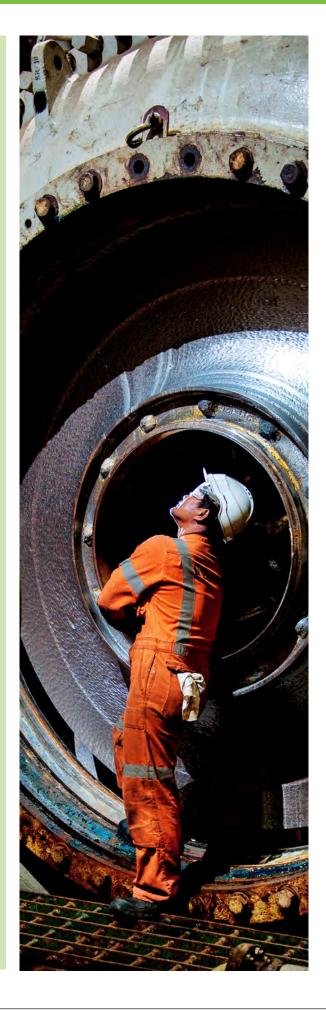
**Frank Thomsen** DHI, Denmark

- EU MARINE STRATEGY DIRECTIVE, TECHNICAL SUBGROUP UNDERWA-TER SOUND
- OSPAR INTERSESSIONAL CORRESPONDENCE GROUP NOISE



**Thomas Vanagt** eCoast, Belgium

OSPAR



## S/F SamueLNG for a blue Atlantic arch

S/F SamueLNG Project is the first phase of the EU-funded Global Project 'Towards a Blue Atlantic Arch by 2025'. CEDA is one of the consortium of 12 partners from along the Atlantic Arch, representing France, Spain and the Netherlands, which are collaborating on the three-year project.



Samuel de Champlain dredger operating in front of Saint Nazaire bridge in the Loire Estuary.

The overall project aims to improve the sustainability of marine traffic through the use of liquified natural gas (LNG) as an environmentally-friendly, and cost-effective, alternative to conventional ship fuels for small vessels. It will aim to achieve the first LNG retrofit of a Trailing Suction Hopper Dredger (TSHD), in Europe, through the use of innovative technology and design. During the project TSHD Samuel de Champlain, the flagship vessel of the Dragages Ports (DP) fleet, will be converted from marine gas oil (MGO) to dual fuel (MGO/LNG).

Following the kick-off meeting in December 2016, the S/F SamueLNG Project started in earnest, in 2017, with the first two studies on innovative LNG distribution processes covering a terrestrial bunkering mobile unit in Gijon, and a floating bunkering device in Vigo. Studies looked at the infrastructure needed for the LNG bunkering logistics and included conceptual designs for the floating storage device. In the coming year, work will start on the conversion of the Samuel de Champlain, with plans for the dual-fuel dredger to be back in operation in December 2018.

### CEDA's role

CEDA is co-lead on activities relating to the dissemination of project results. We are working with project lead DP, and other key organisations in the consortium in Spain and France, to disseminate the latest information and learnings to CEDA members and the wider maritime community. This work is supported by a CEDA Environment Commission Task Group.

Over the year CEDA has overseen, and advised on, the communications of project progress. As part of our remit we also delivered in-depth articles which have appeared in publications including World Dredging, Dredging and Ports Construction, and Ports and Harbours magazine. In addition to CEDA member newsletters, details and updates can be found at the project website http://www.samuelng.eu/.

### The consortium

The partners working alongside DP and CEDA are:

- 5 public port authorities: Nantes Saint-Nazaire (GPMNSN), Le Havre (GPMH), Rouen (GPMR), Port Authority of Gijon (VAG), Port Authority of Vigo (APV)
- 2 ship engineering and design companies: Inova Labs, Ghenova
- 2 energy supply companies: EDP, GNF
- A short shipping company: Suardiaz (VN)





## **Strategy Commission (CSC)**



Wim Klomp Chair

In 2017 the primary focus of the CEDA Strategy Commission (CSC) continued to be on corporate member communications and following up on the discussions on how CEDA membership adds value. In general, the added value for active CEDA members, and the main objective of the Board and committees, is to support them in spreading the CEDA messages within their companies. Actions identified and being implemented in 2017 included:

- inviting new members to national meetings, supporting the national sections in introducing CEDA to them, and providing opportunities for them to actively participate in CEDA initiatives
- continuing with the newsletters and asking companies/ active members to distribute them within their organisations
- following up on suggestions from corporate members on interesting subjects for activities including seminars and new working groups

The newly formed Dredging Management Commission (see on page 39) is a good example of activities started

as a direct result of suggestions from corporate members. It has attracted interest and commission members from corporate members, which were not already active within CEDA, and has also encouraged new organisations to join CEDA as corporate members.

Also, the Dutch National Section organised an evening on river and small-scale dredging following suggestions from several members from the Netherlands.

The CSC has seen an increase in the number of events, on dredging subjects, being offered by conference organising companies. CEDA is trying to coordinate between the different initiatives developed by others like Dredging Today and inform the members as appropriate. Furthermore, we monitor the feedback from participants at other events, in order to inform, and improve, our own events and ensure that members, and delegates, always get the most from their attendance.

CSC, together with the Education Activities Commission, is setting up a working group to organise a web-based portal to facilitate research, where problem owners, problem solvers and potential project partners, can collaborate more easily. The aim will be to make it easier for companies to connect, on projects sponsored by EU or other governmental organisation, where research institutes and universities are requested to collaborate with companies, and end-users, for innovation and new developments in the industry.

Wim Klomp Chair, Strategy Commission



The Strategy Commission during their spring meeting at Tideway, Breda, the Netherlands (clockwise): Wim Klomp (Royal HaskoningDHV – the Netherlands, Jan Vandenbroeck (S.D.I. – France), Peter de Looze (at the time Hal Maritime – the Netherlands), Polite Laboyrie (Witteveen+Bos – the Netherlands).

## **Young CEDA Commission (YCC)**



Peter de Looze Chair

2017 was another successful year of engagement for Young CEDA members. Our events, and National Section club evenings, are widely recognised as a great opportunity, for young professionals and students in the dredging and marine construction industry, to meet and learn from more experienced professionals. During the year we organised three main events, plus the Pitch Talks which are now a regular feature of the CEDA Dredging Days programme.

Social media is another important channel for our members and we currently have around 500 members in the Young CEDA LinkedIn group.



Dr Ian Selby at the Young CEDA Thames Dredging Opportunities Seminar hosted by the University College London, UK.

## **Engaging young members**

Events in 2017 included a dredging seminar in February, hosted by the University College London, UK. Six industry speakers gave attendees an overview of current opportunities in the dredging industry, with a focus on the river Thames. Despite London transport strikes, the event was well-attended by both students and experienced professionals, from various backgrounds, who all had something to contribute to a valuable and informative afternoon.

In March, the Belgian Section organised an excursion to the beach reclamation project in Knokke. The excursion



Participants standing by the TSHD Al-Idrisi during the site visit in Knokke.





Masterclass about 'Building with Nature' by Gerard van Raalte at Marker Wadden.

was attended by young professionals, and students from several universities in the country, who wanted to learn about beach reclamation. The icing on the cake was an on-board tour of the trailing suction hopper dredger 'Bartolomeu Dias'.

In September, Boskalis very kindly hosted an excursion to the Marker Wadden Project. Unfortunately, due to bad

weather, we couldn't sail out to the man-made islands, but our host Gerard van Raalte (GRA Consultancy - the Netherlands) more than made up for that with a masterclass on their construction. For many of the attendees, this was their first chance to get a close look at a 'Building with Nature' project. They were given a unique insight into the construction process and a fantastically full day ended with networking and drinks.



In good mood at Marker Wadden in spite of the weather.

## Young CEDA at Dredging Days 2017

The Young CEDA Pitch Talks are now a regular, and much-anticipated, feature of key CEDA conferences. in 2017, Young CEDA organised a dedicated session of quick-fire presentations at the Dredging Days in Rotterdam. The session gave seven speakers the opportunity to present their research in five minutes, using no more than 20 slides. Each presentation was strictly timed and, with well-defined topics, the presenters kept their pace and the attention of the audience. For more see on page 31.



CEDA sponsored student delegates.



In 2017, Young CEDA Commission members represented organisations in the Netherlands, Belgium, Germany, Denmark, France and the United Kingdom. The Commission was represented by members who sat on other CEDA commissions, including the Education Activities Commission and Strategy Commission, and at a national level by members who attended National Section club evenings.

Young CEDA Commission meetings were held in London at the office of Royal Haskoning DNV.

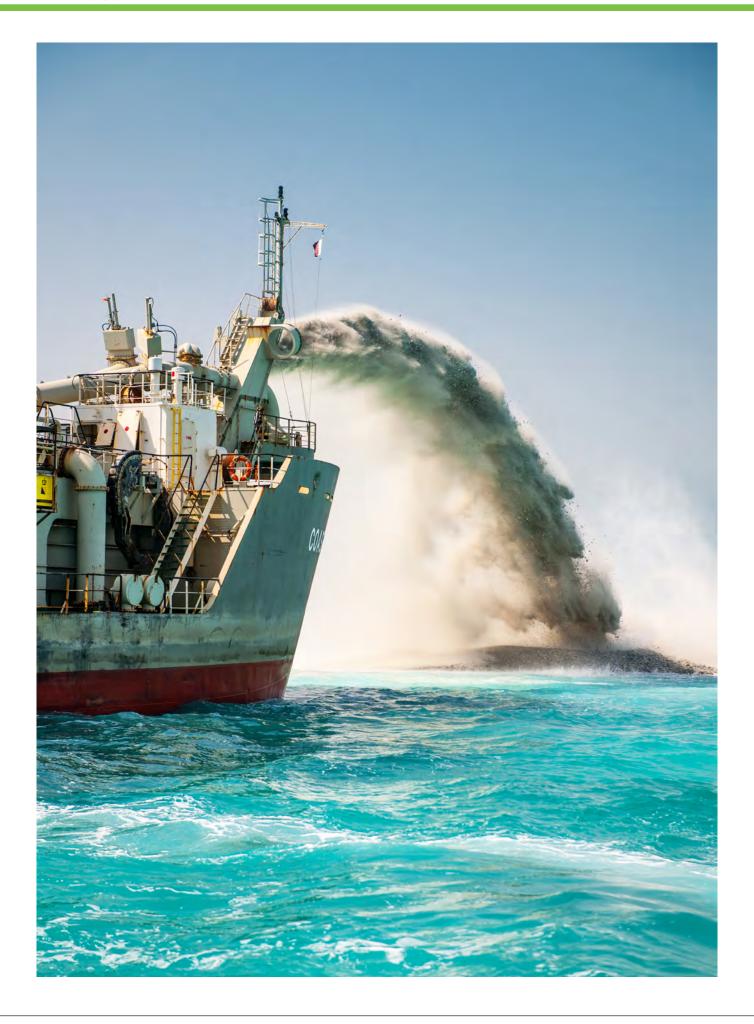
Peter de Looze Chair, Young CEDA











## **FINANCES**

## **Balance sheet 2017**

Expenditures	€ x 1.000	Income	€ x 1.000
Office and governance	49,9	Membership fees	
Staff	119,8	- Individual members	29,8
National sections		- Corporate members	193,2
- African Section	1,0	Incidental income	0,6
- Belgian Section	12,6		
- British Section	8,4		
- Netherlands Section	11,5		
Services and DPC subscription	25,7		
Environment Commission	1,1		
Dredging Management Commission	1,0		
Young CEDA	3,0		
Communications	17,0		
Sundries			
Total	251,0	Total	223,6
Result			-27,4
Reserves			420,1

## **Figures**

Individual CEDA members:	467
Corporate CEDA members:	111
National section meetings:	13
Expenditures 2017:	€ 251 000
Budget 2017:	€ 284 000

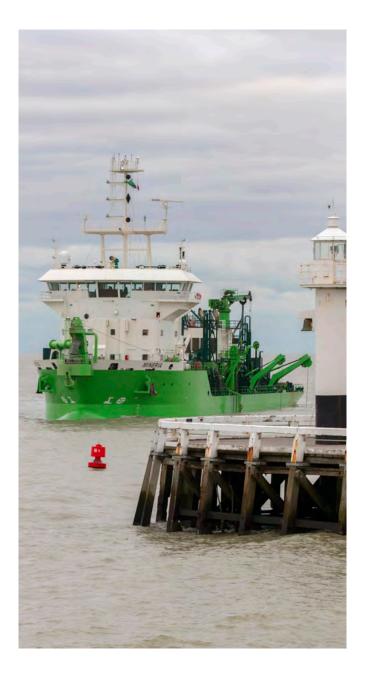




## **OBJECTIVES FOR 2018**

Our programme of activities within the Commissions, Young CEDA and the National Sections, and our work with the International Conventions and groups within the European Commission, are very important to the work that we do. We look forward to taking those activities to the next level in 2018. Here are just some of the initiatives that we are developing and working on:

 In collaboration with IADC we will publish our new book 'Dredging for Sustainable Infrastructure' in 2018.
 We believe it will be an essential guide for planners, designers, builders, operators and owners of infrastructure where dredging is a key component.



- We will mark the occasion of the book's publication with a joint CEDA-IADC conference, 19-20 November 2018, in Amsterdam, the Netherlands. With a select international panel of expert speakers, the two-day conference will provide lots an essential update on maximising project values for society, nature and economy. New knowledge that can be put into practice straightaway.
- Under the remit of the CEDA Environment Commission (CEC), two working groups will complete their work producing one information, and one position paper, on the beneficial use of sediments, and one information paper on sea-floor integrity.
- In addition, the CEC will launch two new working groups - one on energy efficiency, and one focussing on assessing and evaluating environmental turbidity limits for dredging operations.
- The Dredging Management Commission (DMC) will also have a new working group under their wing, which will be tasked with preparing an information paper on effective contract type selection.
- In a series of regional workshops, the DMC will gather feedback from the CEDA membership on dredging technology-related challenges and solutions, with the aim to identifying and reducing the gaps between them.
- Together with the Delft University of Technology, we will receive a high-level delegation of CHIDA, in April.
   The visit is a follow-up on Polite Laboyrie, CEDA President's discussion with the CHIDA Board of Directors, in Beijing in December 2017, about possible collaborations between our two organisations.
- We will start working on our flagship conference,
   CEDA Dredging Days 2019, which will run from 7-8
   November and will once again take place in conjunction with the Europort Exhibition.
- Throughout the year, CEDA authors will be working on their papers for WODCONXXII which will need to be submitted by 15 December 2018.

As always there is much to do in the year ahead and we would not be able to meet our objectives without the support of our members. We fully appreciate and value your input. If there are any additional activities that you think CEDA should be doing, or any activities that you would like to get involved in, please let us know. Contact the CEDA Board with your thoughts and feedback – we're always keen to hear from our members.

The Board of CEDA

## **ORGANISATION**

## **CEDA Board of Directors**

CEDA is governed by the Board of Directors, which generally meets twice a year. Elections are held every two years. After the most recent election in November 2017, the Board of Directors is made up of 17 members from 7 countries.

The autumn meeting of the Board was hosted by Witteveen+Bos, in their offices in Rotterdam, the Netherlands (clockwise): Claudia Flecken (Hamburg Port Authority – Germany), Jos Smits (IMDC – Belgium), Dirk Defloor (DEME – Belgium), Daan Rijks (Boskalis – the Netherlands), Peter de Looze (at the time Hal Maritime, currently Monitrax – the Netherlands), Kathleen De Wit (IMDC – Belgium), Johan Pennekamp (Deltares – the Netherlands), Polite Laboyrie (Witteveen+Bos – the Netherlands); Mark Lee (HR Wallingford – UK), Michael Costaras (DHI - Denmark).



## **CEDA Annual General Meeting**

The Annual General Meeting (AGM) in 2017 took place on 8 November at Ahoy Rotterdam, the Netherlands. It followed the first day of the CEDA Dredging Days (for more about the conference see on pages 16 and 28 - 33).



The Audit Committee scrutinises CEDA's finances and prepares their report for the AGM (clockwise): Frans Lijmbach (retired from Royal IHC – the Netherlands), Michel de Nijs (Van Oord Dredging and Marine Contractors – the Netherlands), Ben den Toom (Aquiferadvies – the Netherlands).



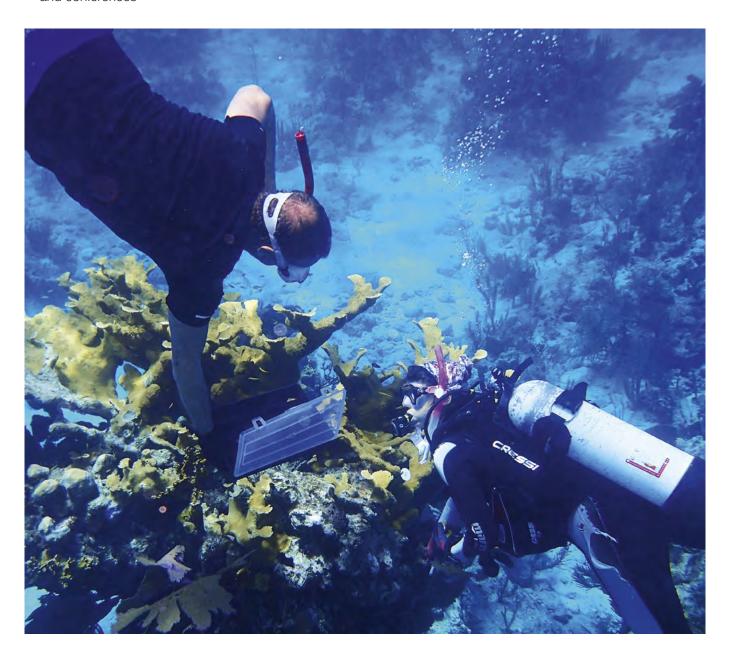
## **CEDA Secretariat**

The day-to-day management of CEDA is carried out by a permanent secretariat based in Delft, the Netherlands. In 2017 CEDA employed two staff members with 1.63 full-time equivalents: Anna Csiti, general manager and Yvonne Duivenman, administrative assistant. Mark Luchs, PhD candidate at the Delft University of Technology, supported the Secretariat on a part-time basis. The main areas of work for the secretariat include (but are not limited to):

- Planning, managing, executing and supporting, the execution of various CEDA projects
- Overseeing, organising and assisting, CEDA activities including CEDA Dredging Days, seminars and conferences

- Supporting the Board of Directors and the various CEDA commissions
- Acting as CEDA's contact point for other related organisations, individuals and national sections
- Developing and maintaining the online presence of CEDA
- Managing CEDA's financial and operational administration
- Membership administration
- Acting as the secretariat for the Dutch Section

In addition to the central CEDA Secretariat, every national section organises its own national secretariat.







## CEDA VOLUNTEERS

A word of thanks is due to all the volunteers who work for the benefit of CEDA. We pay tribute to all those silent and sometimes not so silent workers who give up their free time to contribute to CEDA's successes. In many cases, their employers allow them to do part of this work in their company's time, so we express our gratitude to those companies too.

In 2017 the staffing of CEDA's voluntary-based units was as follows:

## **Standing bodies**

## **Board of Directors**

#### Elected members

Miloud Abudib, Drapor Marocco (Chair African Section) Michael Costaras, DHI, Denmark

Dirk Defloor, Dredging International (DEME), Belgium Kathleen De Wit, IMDC, Belgium

Claudia Flecken, Hamburg Port Authority, Germany Andre Kik, Royal IHC, the Netherlands

Wim Klomp, Royal Haskoning DHV, the Netherlands (Chair Strategy Commission)

Polite Laboyrie, Witteveen+Bos, the Netherlands (President)

Mark Lee, HR Wallingford, UK (from November 2017) Johan Pennekamp, Deltares, the Netherlands (Vice-President, Chair CEDA-Netherlands Executive Committee)

Cees van Rhee, Delft University of Technology, the Netherlands (Secretary/Treasurer, Chair Educational Activities Commission, Chair Technical Papers and Committee CEDA Region - WODCON XXII)

Daan Rijks, Royal Boskalis Westminster, the Netherlands

Will Shields, NewWaves Solutions, UK (Chair Communications Commission)

Jos Smits, IMDC, Belgium

Jan Vandenbroeck, S.D.I. (DEME), France

Retiring from the Board in March 2017 with special thanks for her contribution was:

Ida Brøker. DHI. Denmark

## Ex officio members

Peter de Looze, Hal Maritime, the Netherlands (Chair Young CEDA)

Frederik Roose, Ministry of the Flemish Community, Belgium (Chair Environment Commission, CEC)

## General Manager

Anna Csiti, the Netherlands

#### Alternates to Board Members

Thibault van Craen, S.D.I. (DEME), France Helmut Meyer, Federal Waterways and Shipping Administration, Germany

Dirk Roukema, Blue Pelikan, the Netherlands Martin van Ommen, Royal IHC, the Netherlands

## **Dredging Management Commission**

Johny Van Acker, Dredging International (DEME), Belaium

Anna Csiti, CEDA Secretariat, the Netherlands

Edward De Broe, Port of Antwerp, Belgium

Kathleen De Wit, IMDC, Belgium

Murat Ege, AECOM, Qatar

Koos van der Geer, Van Oord Dredging & Marine Contractors, the Netherlands

Andre van Hassent, Port of Rotterdam, the Netherlands

Claus Iversen, Femernbelt, Denmark

Rienk Hessels, Rohde Nielsen, Denmark

Anders Jensen, DHI, Denmark

Camille Kapela, Egis Ports, France (Young CEDA representative)

Polite Laboyrie, Witteveen+Bos, the Netherlands (Acting chair)

Bas van Maren, Deltares, the Netherlands

Helmut Meyer, Federal Waterways and Shipping

Administration, Germany (since March 2017)

Henry Odunsi, Earth Info Services, Nigeria

Stan Putter, Conway Advocaten & Attorneys-at-law, the Netherlands

Hilco Timmer, Witteveen+Bos, the Netherlands Bert Visser, Rijkswaterstaat, the Netherlands

Johan van der Vorm, Royal Boskalis Westminster, the

Mark Winkelman, Damen Dredging, the Netherlands

Charles Wilsoncroft, HKA, UK

Retiring from the Commission in March 2017 with special thanks for their contribution were: Guido Kashel, Port of Hamburg, Germany Daan Rijks, Royal Boskalis Westminster, the

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