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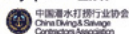
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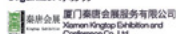
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# Editor's Welcome

IMCA's team has had a very productive spring time. We've continued to extend our global reach with our technical expertise featuring at leading industry events and discussions around the world. In this issue we catch up with all the major developments.

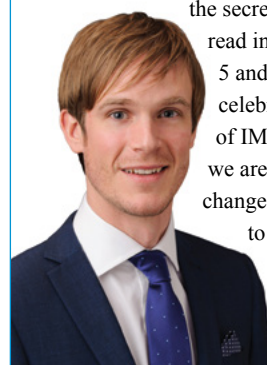
Our range of technical events broke new ground in March when we brought together industry specialists to discuss the issues surrounding the exponential rise of the use of programmable logic controllers (PLCs) in dive systems. It was the first time such a range of experts was pooled together to tackle the topic and you can see the full review and hear the insights from the day on page 18.

The first of our new regional social networking events, designed to involve more IMCA members globally, took place in Mumbai (page 6) and we visited Angola for the first time too, profiling our organisation and answering questions from our members in the region (page 12).

And as this issue of *Making Waves* is in production we're preparing for an IMCA seminar on another hot topic: the allocation of risk in contracting. As a taster for themes which may be

covered next time, our focus article (pages 9-11) in this issue delves into the closely connected subject of anti-bribery and corruption – offering some top tips and considering possible scenarios members should watch out for.

Yes, it's been a busy few months for our team delivering workshops, seminars and events around the world but it's been a busy time inside the secretariat too. You'll also read in this issue (pages 4, 5 and 22) about how, after celebrating the successes of IMCA's first 20 years, we are expecting to make changes to the way we work to prepare ourselves for the next 20 too.



Chris Freer  
Making Waves Editor

## Meet the team



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& Acting Chief Executive  
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Technical Adviser – Competence & Training

Andy Goldsmith  
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Making Waves is published quarterly to promote knowledge of matters affecting the offshore, marine and underwater engineering industry.

Ideas for articles of potential interest to a wide cross section of our members are welcome.

The views expressed on these pages are those of their respective authors and do not necessarily reflect the policies or positions of IMCA itself.

Send your contributions and ideas to [chris.freer@imca-int.com](mailto:chris.freer@imca-int.com)

# IMCA begins structure review



As agreed at the previous Overall Management Committee meeting and identified in the President's article (page 22), IMCA has started a management and governance review intended to ensure that it is appropriately structured to achieve its vision. It will consider how the organisation – both the secretariat and the committee, divisional and regional arrangements – should be most effectively structured to enable it to deliver its services. This should also provide more transparency, access and services to all members. IMCA's structure has been the same since it was formed 20 years ago and we recognise the need to review it and ensure it is meeting the needs of our much wider membership.

The work is being undertaken by a consultancy specialising in the

management and governance of trade associations. It has been split into a number of different strands and is being overseen by a steering committee made up of members of IMCA's Council and OMC and will involve discussion and input from IMCA's membership as a whole. The first piece of the work will look at the secretariat structure before moving on to the overall membership and governance structures and then the detail of committee, division and regional arrangements. If you have any particular points about the IMCA structure you would like to feed into the review then contact Jane Bugler.

If you would like to contribute to the review process please email: [jane.bugler@imca-int.com](mailto:jane.bugler@imca-int.com)



## IMCA team developments

As a part of our strategy to evolve the secretariat two new roles were created in the IMCA team this spring. Many of you will already be familiar with Mark Ford (left), who has been a Technical Adviser on IMCA's team since 2012. Mark has moved up into the newly created role of Technical Manager, to assist Technical Director, Jane Bugler, with her workload – which has expanded over the years.

In April Leeman Robinson (centre) joined as Marketing & Communications Manager. It's a role designed to bring support and focus to the events and communications team, developing integrated marketing campaigns and promoting IMCA's brand and message more effectively. Leeman comes from a similar technical trade association background to IMCA, where he focused on events, exhibitions and product strategy.

We also said goodbye to Membership Administrator, Michelle Salway (right) at the end of May after five years with IMCA which saw her progress from reception to the publications and membership teams. We'll miss Michelle greatly, and we thank her for her contributions and wish her the very best as she makes an exciting career move.

## Documents update

You'll find details below of all the recent publications we've been working on. These have been published since the previous issue of *Making Waves*. We've also given a short overview of the safety flashes and highlighted just a few of the important information notes. The full listing is available on our website by navigating to the relevant divisional page or by using the search function.

### PUBLICATIONS

**IMCA C 014 Rev. 4** – *Guidance on the use of simulators*

**IMCA C 017** – *Guidance on competence assurance and assessment – marine roles for small workboats*

**IMCA M 227** – *Station keeping incidents reported for 2011*

**IMCA S 022** – *An introduction to inertial navigation systems*

**IMCA Logbook** – *Workboat crew logbook*

**182 MSF Rev. 2** – *International guidelines for the safe operation of dynamically positioned offshore supply vessels*

### SAFETY FLASHES

Since the previous issue of *Making Waves*, IMCA has issued two safety flashes covering 13 incidents. These included three hand/finger injuries, an engine room fire, two serious crush injuries (one of which, sadly, proved fatal), a failure of a winch brake, an electric shock incident, and a dropped object caused by a

parting chain. Members continue to highlight high and low potential near miss incidents, which is a useful and positive trend.

### INFORMATION NOTES

**IMCA D 07/15** – *Recent Release of BS EN 12021:2014 Respiratory Equipment – Compressed Gases for Breathing Apparatus*

**IMCA M 02/15** – *IMCA DP Logbook Completion*

**IMCA M 03/15** – *Review of IMO Dynamic Positioning Guidelines – MSC/Circ.645*

All the latest documents from IMCA are available online at [www.imca-int.com](http://www.imca-int.com)

# Changing of the guard



*“I am standing down, leaving the way forward to build upon the new foundations we have created.”*

**CHRIS CHARMAN**  
Departing IMCA  
Chief Executive

Chris Charman has stepped down, with immediate effect (as from 1 May). Jane Bugler has become Acting Chief Executive, ensuring that IMCA is in very safe hands. A new Chief Executive will be sought to take IMCA forward and continue to deliver ever more support for our 1,000 plus members in over 60 countries.

In announcing his decision, Chris said: “Now that the changes implemented inside IMCA are well under way and gathering pace, by mutual consent I am standing down, leaving the way forward to build upon the new foundations we have created.

“The collegiate, constructive and responsible manner in which the industry addresses safety issues will be a powerful and permanent memory for me. I must offer my thanks and best wishes to the team who have been so supportive to me as a newcomer, and also to those members and friends I have made in the offshore community across the globe.”

IMCA’s Council and OMC would like to thank Chris for his input since early December 2012, particularly in working with them on the five year plan and establishing IMCA’s ‘Vision and Strategy 2014-2019’ which provides firm foundations on which to build our thriving organisation.

## Medal for IMCA’s Chris



IMCA Technical Adviser, Chris Baldwin, received a UK City & Guilds Medal for Excellence this spring for his work in completing a National Vocational Qualification Level 5 Diploma in Occupational Health and Safety Practice.

Speaking about the medal recipients, Kirstie Donnelly MBE, UK Managing Director at City & Guilds (right) said: “Our medal winners are an inspiration. Every one of them has produced exceptional work over the course of the year, going above and beyond what is expected to achieve their goals.”

## Welcome to our new members

IMCA is pleased to welcome the following new members (from 23 January 2015 – 10 April 2015)

- Ampelmann Operations B.V.
- Apollo Offshore Engineering Limited
- ASK Safety AS
- Australian Offshore Solutions Pty Ltd
- Auxilium Offshore B.V.
- BENMAR Fabrication LLC
- Bisso Marine, LLC
- Bonifacio Srl
- Broron Oil & Gas Limited
- China Offshore Fugro Geosolutions (Shenzhen) Co, Ltd
- Commercial Diver Training Ltd
- Diving Engineering & Consultancy Office
- Fugro Subsea LLC
- Global Diving & Salvage Inc
- Hudson Pacific Energy Limited
- Hughes Sub Surface Eng Ltd
- Jawar Al Khaleej Shipping LLC
- MMT (Marin Mätteknik AB)
- P&O Maritime
- Premier Oil UK Limited
- Slingmax, Inc.
- Svitzer Australia Pty Ltd
- Tanabe Pneumatic Machinery Co Ltd

### Ampelmann Operations B.V.

Eveline Huizink describes Ampelmann’s core system as: “A motion compensation platform that allows easy, fast and safe access from a moving vessel to offshore structures. We currently operate 40 systems world-wide transferring offshore crew from various types of vessels to offshore oil & gas platforms, offshore turbines, FPSOs and all other fixed and floating structures at sea.”

### Australian Offshore Solutions Pty Ltd

AOS is an offshore service provider headquartered in Perth, Western Australia. Jarrod Isles tells us how they, “specialise in marine and rig manning, OSV chartering, ship management and rig moving. With offices in the

UK, UAE, South-East Asia and New Zealand, we offer local solutions on a global scale.”

### BENMAR Fabrication LLC

Elizabeth Mock explains BENMAR’s latest development for us: “We are currently fabricating a Submarine Diving and Recompression System Ship Interface Template Set (SITS) – a component that enables rapid physical installation, integration, and alignment of deck-mounted Pressurised Rescue Module System elements for NAVSEA.”

### Global Diving & Salvage Inc

Global Diving & Salvage is a provider of marine construction, offshore infrastructure support services, and casualty response operations in North America, and to the international market.

Devon Grennan, CEO/President of Global says, “Our clients expect us to be held to high standards of personnel safety, process efficiency and equipment maintenance. We pride ourselves on our offshore and inland safety regime.”

### Tanabe Pneumatic Machinery Co Ltd

The Tanabe group has been manufacturing quality machines in Japan for the past 94 years. They supply reliable, cost effective, and easily maintained marine compressors which are supported world-wide.

You can find out more about our members, old and new, at:  
[www.imca-int.com/membership/membership-directory](http://www.imca-int.com/membership/membership-directory)



# Mumbai tunes in to competence

Competence management systems (CMS) were the hot topic at IMCA's Middle East & India (MEI) Section meeting in Mumbai in April. And the event finished on a high, as members in the region were the first to benefit from one of IMCA's new global social functions.

IMCA Technical Adviser, Neil Evans (pictured), took to the stage to kick off the technical session which was designed to give members from the region the opportunity to discuss the local issues which mattered to them relating to Competence & Training (C&T). Neil delivered an overview of the C&T Core Committee's work programme and current activity, giving particular focus to the IMCA competence framework, the C&T action plan and the proposal for IMCA to develop its own Competence Management System (CMS) Accreditation scheme. The proposal was well received, with delegates confirming the message we have heard in other regions that a venture which supports companies looking to develop a CMS would be desirable.

## Member benefits

IMCA members were next to take the stage, with Mike Silvester, of Horizon Geosciences, Darren Male, of Fugro Group and Natesan Ramalingam, of IGOPL, giving interesting presentations on three very different approaches to competence assessment. Following a break, discussion sessions on demonstration of competence, personnel and training issues within the region



provoked lively debate from the crowd.

Mike Silvester explained his views on why sessions like these are productive and important: "I found this event to be extremely beneficial and, judging by the attendance, it appears to have been a great success. IMCA events hold a lot of weight with contractors in the region and events like this provide an ideal platform for sharing ideas, expertise and best practices. The interaction between delegates during the Q&A discussion was a particular highlight. The next step will be to attract greater participation from the 'oil majors' in the region, so we can better understand what they expect from contractors when it comes to competence management."

## Colourful climax

To maximise the value of the trip, strengthen local ties and raise our profile, IMCA hosted a social event held at the Mumbai Cricket Association straight after the technical session. The evening, which featured colourful and artistic acts, an enjoyable dinner, music and networking opportunities, was a great success.



*“Events like this provide an ideal platform for sharing ideas, expertise and best practices.”*

### MIKE SILVESTER

Horizon Geosciences

IMCA C&T Core Committee member

Mike said: "The social events are an excellent opportunity for IMCA to give something back, members can relax and socialise outside the meeting room. It was excellent – the organisers made a brilliant effort."

As this issue of *Making Waves* is in production plans are already well underway for the next regional social events which take place in Livorno, Italy on 9 June and Houston, USA on 18 June.

# Confined space entry still an issue

Although the Safety, Environment & Legislation (SEL) Committee remains dedicated to addressing the issue, sadly, confined space entry fatalities continue to occur every year. IMCA members take very seriously their responsibility to ensure that their crews are properly educated and informed regarding the dangers of entry into confined spaces – so to help them tackle the problem IMCA is preparing further guidance on the topic.

The new document will be in addition to the existing IMCA DVD, IMCA SEL 034 – *Working in confined spaces*. It will be aimed at vessel management and others who are responsible for crew who enter confined

spaces, and will draw on the expertise and experience of SEL committee members and their company procedures and guidance. It will provide clear and easy to implement guidance on ensuring that confined space entry is conducted in a safe and professional manner.

One particular area that the guidance will address is the need to treat diving bells and saturation systems at surface pressure as confined spaces. Experience has shown that low oxygen atmospheres may be encountered inside sat chambers that have been brought to surface and this is an area that members have already indicated will need special consideration in the document.

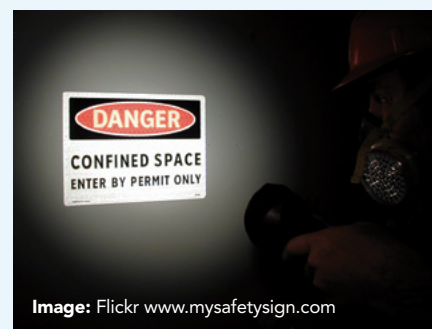


Image: Flickr [www.mysafetysign.com](http://www.mysafetysign.com)

IMCA SEL 034, along with all our other SEL DVDs and guidance, can be found at: [www.imca-int.com/sel](http://www.imca-int.com/sel)

# IMO Update



Image: Rolls Royce AS Marine

## IMCA input on DP guidelines

At a meeting in March, IMO kicked off the review of the Guidelines for Vessels with Dynamic Positioning Systems (MSC/Circ.645), agreeing to use the IMCA proposals as a basis.

The scope and structure of the Guidelines are expected to remain unchanged, but updates are required to reflect changes in technology and operations.

The review will be taken forward by an IMO intersessional correspondence group that will further develop the draft, with a target

completion date of 2016. An IMCA workgroup is being established, to feed into the IMO correspondence group.

If you'd like to take part contact:  
[andy.goldsmith@imca-int.com](mailto:andy.goldsmith@imca-int.com)

## New IMCA lifting workgroup



Image: Flickr – Horrapics

IMCA is establishing a small workgroup to look into IMO proposals for new stability criteria and operational guidance for vessels carrying out lifting. This is part of broader IMO work to update the 2008 Intact Stability Code to take account of anchor handling, towing and lifting operations, and the lifting proposals could have particular implications for offshore crane vessels and heavylift operators.

## New insurance requirement

The Nairobi Wreck Removal Convention entered into force on 14 April 2015. Shipowners operating internationally will be required to have new insurance coverage for the costs of wreck removal, but certificates can only be issued by the small number of flag states that have ratified the Convention so far. Shipowners whose flag state has not ratified the Convention will need to obtain certification from a flag state that has.

## Better maritime regulation

IMO has been evaluating responses to its 2013 public consultation, and has come up with 13 recommendations to reduce the administrative burden of IMO requirements.

The recommendations include greater recognition of electronic documents and certificates, keeping IMO instruments under review to ensure they remain relevant, and doing more to explain the necessity of the ISPS Code and other maritime security measures. More information is available from:

[www.imo.org/ourwork/rab](http://www.imo.org/ourwork/rab)



## New US regs

US authorities have released three sets of draft regulations recently; here is a snapshot of IMCA's thoughts on the issues.

### DP considerations

An IMCA Central & North America (CNA) section workgroup helped develop IMCA's response to the US Coast Guard's proposed dynamic positioning regulations. We welcomed the draft rules in principle but highlighted a number of areas that needed further consideration, including the timelines and implementation plans, the proposed risk assessment process, turning guidance documents into mandatory requirements, and the need to reference IMCA M 117 – *Training and experience of key DP personnel*.

### Well control requirements

IMCA is also intending to respond to the Bureau of Safety and Environmental Enforcement (BSEE) new Well Control Rulemaking, which includes new requirements on ROV equipment and personnel training. The deadline for comments is 16 June, but IMCA has written to BSEE to support calls from other industry organisations to extend the comment period, as the rule includes many detailed proposals.

### US diving developments

IMCA is also submitting comments on the Coast Guard proposals to update the US commercial diving regulations - see page 19 for more detail.

For more information on IMO and regulatory issues, contact  
[emily.comyn@imca-int.com](mailto:emily.comyn@imca-int.com)



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# RISKY BUSINESS

## IMCA's view on tackling bribery in our industry

An ever increasing emphasis is being placed on the investigation and prevention of bribery in the commercial world. The risks arising from bribery are substantial and include criminal sanctions, such as unlimited fines and imprisonment, dismissal from employment, liability for damages, invalidation of insurance contracts, damage to reputation, loss of commercial contracts and loss of profits. For contractors engaged in the offshore oil and gas industry, a comprehensive approach to the management of the bribery risk is essential for continued business success.

With the help of one of our members, international law firm Stephenson Harwood, we've put together this article as an introduction to anti-bribery in the offshore industry. We'll talk about what bribery is, suggest some top tips for best practice, look at some example situations which could arise when bribery related risks are allocated and explain what discussion and advice we have to date on the topic.

### What is bribery?

Before we get into too much detail, let us consider what 'bribery' is. Transparency International, the international non-governmental organisation devoted to combating corruption, defines it as 'the offering, promising, giving, accepting or soliciting of an advantage as an inducement for an action which is illegal or a breach of trust'. It is clear that bribery is something we shouldn't be involved in, but where does a company in the offshore



industry begin in building a culture and putting procedures in place to eradicate it?

### Tips for best practice

Simon Moore, Partner at Stephenson Harwood, offered these top tips for Making Waves readers:

- As a start, a company should lead from the top and ensure that a written statement of the level of compliance expected of their employees is issued to them;
- A consistent approach to the compliance should be adopted and an adequate system of training and assessment in anti-bribery for every level of the organisation should

*“If a prescriptive list of force majeure events is used then consideration should be given to including corruption by third parties within the list.”*

**TONY CONCAGH**

Partner, Stephenson Harwood

*Continued on page 10*

# RISKY BUSINESS

Continued

- exist and be regularly reviewed;
- Companies should ensure that they conduct due diligence on any third parties, such as consultants and agents that they work with, in order that the company is fully aware of their policies. These third parties should be included in any compliance programmes and audits;
- Companies should require their legal counsel to approve any contracts or other arrangements involving consultants and agents of the company;
- A company should adopt robust procedures for the authorisation of third party payments and clear policies on political donations and procedures for whistle blowing;
- Interactions with foreign public officials should have a clear and open purpose and a written record should be kept of all meetings with such officials.

## Clause for concern

Although 'what is right' or 'what is wrong' may seem like a black and white issue, balancing the allocation of bribery related risks in contracts is a grey area. The risk of somebody in the supply chain being involved in bribery means things are not always straightforward.

Tony Concagh, Partner at Stephenson Harwood, explains: "Many contracts include clauses prohibiting contractors from bribing government officials or employees of the oil company. In a straightforward clause, the contract simply reflects the mandatory criminal laws that apply and there is little reason or scope to try to negotiate such a clause. Unfortunately,

however, the clauses included in some draft contracts issued with invitations to tender go considerably further." He considers the following examples:

- Some clauses make the contractor strictly responsible for the Contractor Group's breaches.**

"Due to the typically very broad definition of 'Contractor Group', this potentially makes the head contractor liable for the bribery committed by an employee of an agent appointed by a sub-subcontractor. Realistically, the head contractor has limited scope to influence the behaviour of such a person. There is, therefore, a strong argument that the head contractor's contractual obligations and responsibilities should be limited to its own organisation and to exercising due diligence in its appointment and instruction of its immediate subcontractors and agents."

- Some clauses provide that the contractor is disentitled to payment under the contract from the date of any infringement.**

"This clause could potentially disentitle the contractor to payment of hundreds of millions of dollars because an agent sought to improperly expedite the transit through customs of some critical equipment. Such a sanction would be entirely disproportionate to the offence and the contractor's moral culpability for the same."

- Some clauses permit the oil company to terminate the contract for any infringement.**

"In practice, an oil company is unlikely to want to terminate the contract during the course of execution because of the disruption to the project this could cause. Nevertheless, if the

*"Statistically one in four people around the world would accept a bribe; and interestingly the UK and US are amongst the higher percentage."*

**ROBERT BARRINGTON**

Executive Director,  
Transparency International UK

contract is perceived to be onerous, perhaps because it was negotiated before the drop in oil prices, the termination right could be exercised for even a minor breach."

- Some clauses require the contractor to pay the oil company an amount equivalent to the bribe paid.**

"Presumably the intent of the clause is to discourage the contractor from making such payments by making it unprofitable to do so, but we would question whether the remedy imposed by such a clause is appropriate and also whether it might be considered to be a penalty and therefore unenforceable under English law."

## Forcing the issue

'Force majeure' is a clause commonly found in construction and supply contracts which exempts the contracting parties from fulfilling their contractual obligations for causes that are beyond their control. These causes usually include acts of God or parliament, but Tony goes on to explain Stephenson Harwood's view on whether a bribery incident in the supply chain could be considered a force majeure too.

"Irrespective of the compliance clauses, the contractor is typically required to complete the work within a defined time frame or face liquidated damages. Accordingly, unless a demand for a bribe by a third party is a force majeure risk, the risk of such demands giving rise to delays (for instance with visas or at customs) often rests firmly on the contractor.

"Whilst we consider there is a strong argument such a demand should be a force majeure risk, this is not always the case. If a

## IMCA'S FREE RESOURCES ON CONTRACTING

- IMCA General Contracting Principles
- IMCA Marine Construction Contract
- IMCA Decommissioning Contracting Principles
- Identifying and Assessing Risk in Construction Contracts
- Contracts for the Provision of ROV, Support Vessel and Associated Work

IMCA's contracting resources are all available to download at:  
[www.imca-int.com/safety-environment-and-legislation/imca-contracting-guides](http://www.imca-int.com/safety-environment-and-legislation/imca-contracting-guides)





Robert Barrington of Transparency International takes the stage at IMCA's Anti-Bribery & Corruption Seminar.

prescriptive list of force majeure events is used then consideration should be given to including corruption by third parties within the list, as this would allow the oil company and contractor to stand firm and work together to fight against corruption, without the threat of liquidated damages for delay."

### What does IMCA say?

Helping our members from all over the globe to understand something as contentious and as fundamental to the reputation of their businesses as bribery and corruption is an important issue to us – and to them. Along with our 'starter' document on the topic – *IMCA General Contracting Principles* – we have published a variety of guides, templates and discussion documents (see boxed info, left) aimed at raising awareness on contracting issues, promoting discussion and providing tools that may be useful for our contractor members, their clients and sub-contractors. Each is published as an aid to clients and contractors alongside their in-house standard contracts and other industry publications.

IMCA's Contracts & Insurance Workgroup also hosts interactive events: in March 2014 a seminar of this type, on anti-bribery and corruption, took place in London. The event was staged to help attendees understand how the increase in enforcement of national and international anti-bribery and corruption legislation and practice means businesses must now demonstrate compliance. Due to its complexities, this can be a challenging area for businesses to address.

### Key messages

The day featured presentations and views from both sides of the contractor and client fence as experts from oil companies, contractors and legal firms took to the stage. Here are a few of the key messages from the day – a link to the presentations can be found at the end of this article.

- Ray Bonci, of Total E&P, and Michele de Rosa, of Eni S.p.A., stressed the importance of due diligence, warning that it is 'vital to know your third parties' and not to bury your head in the sand; ignorance is no longer a defence.
- Andrew Hayward, of Subsea 7 S.A., made his view clear that it is everybody's responsibility to try to tackle corruption, as everybody within a company and within the industry is at potential risk of exposure.
- Among the revelations in the presentation of Robert Barrington, of Transparency International UK, was that statistically one in four people around the world would accept a bribe; and interestingly the UK and US were amongst the higher percentage. He also made the point that the law made no distinction between bribes and facilitation payments: any bribe, no matter how small or insignificant, was still a bribe and against the law.

Perhaps the most memorable of the presentations at the event was that of Simon Moore and Tony Concagh, of Stephenson Harwood, who provided a fascinating corruption case study. It followed the difficulties, response and consequences to a contractor's vessel being detained when drugs were found on board and

considered the potential ramifications if the local agents paid the 'fee' for the vessel to be released without the contractor's knowledge or approval.

The content and feedback from the IMCA event was not put to waste. Following the event it was gathered and distilled into a revision of *IMCA General Contracting Principles* which included the addition in November 2014 of a 17th principle on anti-corruption.

### What is next from IMCA?

As this edition of *Making Waves* goes to press, IMCA's Contracts & Insurance Workgroup continues its work delivering the next event in the series: a seminar considering the allocation of risk in a difficult market. The event takes place on 19 May 2015 in London and is an appropriate follow-up to the anti-bribery and corruption seminar, with much synergy between the topics and new insights expected.

A review of the event will be available through the news feed on IMCA's website and we'll be running an article about the key developments from the day in the September issue of *Making Waves* too – so look out for that.

Find more info and advice from IMCA on the topic of contracting at:  
[www.imca-int.com/safety-environment-and-legislation/imca-contracting-guides](http://www.imca-int.com/safety-environment-and-legislation/imca-contracting-guides)

See the presentations from the anti-bribery and corruption seminar at:  
[www.imca-int.com/anti-bribery](http://www.imca-int.com/anti-bribery)

# Angola gets IMCA big picture



The bay of Luanda is regularly busy with OSVs.

“A very useful event to understand the questions people in the region need answering.”

**NICK HOUGH**

Technical Adviser, IMCA

## IMCA'S AFRICAN STATS:

IMCA's African member base has grown faster since 2012 (114%) than the total world-wide member base (26%).

IMCA currently has 75 members based on the African continent – 7% of our total membership – they are based in:

- Angola
- Cameroon
- Congo
- Egypt
- Gabon
- Nigeria
- South Africa
- Tunisia

The growth of Angola's offshore industry continues and with offshore support vessel activity on the rise too, it is a key time for IMCA to build our presence in the region and offer support and guidance to our members there. We kick started the process by introducing ourselves with a special briefing seminar.

An article released earlier this year by offshore-technology.com<sup>1</sup> which considered 'what the offshore oil and gas industry can expect in terms of CAPEX spending, regional hotspots, oil prices and potential challenges in 2015' identified Angola as an area of interest. In the article, Content Analyst at Infield Systems Limited, Catarina Podevyn, said Africa is expected to hold a 15% share of offshore capital expenditure over 2015, up 10%, led by developments offshore Angola. In West Africa, offshore Ghana and Congo will also see increasing expenditure, she added.

Having had to cancel plans to hold a meeting in the region in 2014 IMCA was keen to reschedule its programme and raise its profile there. The seminar took place in Luanda on 4 March alongside IMCA's Europe & Africa Section meeting at the Skyna Hotel and delegates from a variety of contractors attended the event. They listened to the range of presentations from the co-hosts, Europe & Africa Section Chairman, Pascal Grosjean of Technip, and IMCA Technical Adviser, Nick Hough, before getting involved in Q&A and discussion sessions.

## Back to basics

Nick and Pascal gave the group a thorough introduction to IMCA, explaining our vision and strategy, and the key benefits, resources and materials available to those who join. Delegates were able to network with other IMCA member representatives and took the opportunity to ask some important questions.

Nick Hough explains: "It was a very useful event, not only for the attendees to get a glimpse of the resources and accumulated knowledge base at IMCA's disposal, to network and make connections – but also for us, to understand the questions people in the region need answering and the issues we can help them to address.

"For instance, we heard concerns about the competence and quality of CMID assessors and were able to point delegates in the direction of the new CMID accredited vessel inspector scheme run in conjunction with the International Institute of Marine Surveying (IIMS). Questions about completing logbooks and the competence and assessment of personnel were also recurring themes which we were able to address."

## Vietnam next

IMCA's briefing programme to answer the demand of evolving areas of the membership continues in July when we combine the next Asia-Pacific meeting in Ho Chi Minh City, Vietnam with a similar event. If you think you could be involved in introducing us to a new audience or have something topical you'd like to talk about when we visit your region, please email us at [info@imca-int.com](mailto:info@imca-int.com).

For IMCA's full world-wide event listing please see: [www.imca-int.com/events](http://www.imca-int.com/events)

## REFERENCE

1. Offshore-technology.com – Future outlook: the offshore oil & gas industry in 2015. [www.goo.gl/hKjuEY](http://www.goo.gl/hKjuEY)



## Jane presented award in Canada

IMCA Technical Director, Jane Bugler, only went to Victoria to present at a conference, but came back with a surprise award for her contribution and co-operation over the years.

Jane's presentation at the Canadian Underwater Conference on 30 March focused on how, in hyperbaric evacuation, planning was key to success. She told the delegates about how IMCA's suite of hyperbaric documents – D 051, D 052 and D 053 – could help them do just that, by developing appropriate arrangements for equipment, procedures and training required for the successful evacuation of divers in saturation.

She drew attention to IMCA information note D 15/14, produced by a joint IMCA/IOGP workgroup, which provides guidance on how to meet the requirements set out in IOGP 478 – *Performance of saturation diving emergency*



*hyperbaric evacuation and recovery using IMCA's guidance.* The info note also includes a list of topics a hyperbaric evacuation plan should cover and a suggested template for such plans. She revealed that IMCA would like to set up a web page for use by IMCA members to identify the locations of hyperbaric reception facilities, so that with appropriate arrangements in place, members could share such facilities.

During the event Jane was surprised to be called up to the stage and handed an award by Jonathan Chapple, Chairman of the Board of directors of DCBC (pictured), for her outstanding contribution to the discipline.

## WORLD-WIDE EVENTS

The full listing of the events we are running and supporting can be seen at [www.imca-int.com/events](http://www.imca-int.com/events)

- IMCA events are highlighted below

### JUNE

- 16-17: European DP Conference**  
London – UK
- 18: Central & North America Section, Competence Seminar & Social**  
Houston – USA ●
- 22: South America Section Meeting & Social**  
Macaé – Brazil ●
- 23-26: Brasil Offshore**  
Macaé – Brazil
- 24-25: Renewable UK Global Offshore Wind**  
London – UK

### JULY

- 22-23: Asia-Pacific Section Meeting & Vietnam Briefing**  
Ho Chi Minh City – Vietnam ●
- 28: Middle East & India Section Meeting**  
Doha – Qatar ●

### SEPTEMBER

- 2: Competence Seminar**  
Aberdeen – UK ●
- 7-11: London International Shipping Week (LISW)**  
London – UK
- 8-11: Offshore Europe**  
Aberdeen – UK
- 8-10: Asian OSJ & Asian DP**  
Singapore
- 9: Cyber Security Seminar (in conjunction with LISW)**  
London – UK ●
- 16: Central & North America Section Meeting**  
Houston – USA ●
- 23-23: Americas OSJ**  
Houston – USA

### OCTOBER

- 27-28: IMCA Annual Seminar 2015: A health check for the marine contracting industry**  
Abu Dhabi – UAE ●

## IMCA to tackle cyber security



London International Shipping Week, the showcase for all sectors of the international shipping industry, will return on 7–11 September 2015. IMCA is pleased to be one of the supporting organisations again, and this year we will be hosting a seminar on cyber security on Wednesday 9 September. Organised in conjunction with the Security Association for the Maritime Industry (SAMI), the event is aimed at Company Security Officers and will include a mix of presentations and tabletop exercises.

For more info please visit: [www.londoninternationalshippingweek.com](http://www.londoninternationalshippingweek.com)

## Talking all over the world

IMCA sprang into action again this spring, with our team involved at a variety of important industry events across the world.

Claudine Bleza and Andy Goldsmith represented the Association at OTC in Houston, where Andy attended the DP Station Keeping conference. This session focused on the many challenges the industry faces and discussed some of the solutions.

Mark Ford and Natasha Simmonds were busy meeting members at the 20th North Sea Cranes and Lifting Conference in Stavanger, Norway. Mark spoke in the technical conference, profiling IMCA and its lifting specific guidance, while Nick Hough

headed to Glasgow to All Energy to give an overview of IMCA's involvement in the field of offshore renewables.



To see our full events programme visit: [www.imca-int.com/events](http://www.imca-int.com/events)



# ANNUAL SEMINAR 2015



## A HEALTH CHECK

FOR THE MARINE CONTRACTING INDUSTRY

27-28 OCTOBER 2015 • JUMEIRAH AT ETIHAD TOWERS • ABU DHABI • UAE

“Hugely successful in bringing together a wide range of offshore industry personnel to discuss key issues of the day”

Paul Evans,  
Qatar Petroleum

“Professional and structured: in the top range. Valuable for establishing new contacts and new business opportunities”

Jan Egil Wagnild,  
Marine Cybernetics



### JOIN THE DEBATE

- Our speakers are industry experts
- Topical and technical presentations
- Have your say in our interactive workshops



### MAKE NEW CONNECTIONS

- Discuss key issues in person with our members
- Network at our top quality social events
- Gain exposure: exclusive sponsorship packages



### SAVE WITH THE SAME GREAT PRICE

- We're freezing our prices from last year
- There is simply no better focused industry technical event available for the same cost

Registration will be available online from mid June and feature an early bird discount, saving members **20%**. We advise early booking as last year's event sold out.

To book or for more information visit: [www.imca-int.com/events/annual-seminar-2015](http://www.imca-int.com/events/annual-seminar-2015)

Image: Ceona



# WORLD-WIDE

## IMCA at heart of EU offshore developments

A week of events focusing on all the different aspects of shipping took place from 2-6 March to mark European Shipping Week. IMCA's Emily Comyn and Andy Goldsmith were at the centre of events in Brussels. In this issue of *Making Waves* Emily gives members a review of the most important regulatory developments.

Changes to offshore drilling safety requirements, introduced in response to the Deepwater Horizon incident, and the growth of the offshore renewable energy market in the North Sea have led to a greater focus from EU regulators on the offshore marine sector.

IMCA continues to monitor EU developments, directly and through our growing co-operation with the European Community Shipowners' Associations (ECSA). As part of our strategy to engage key stakeholders and work with other industry organisations, we have been participating in ECSA's newly formed Sectorial Contact Group on Service and Offshore Support Vessels. In March IMCA was also one of the supporting organisations for the inaugural European Shipping Week.

With much discussion and debate over the course of the week – I've highlighted just a few of the key legislative developments that members should be aware of that could affect them.

### Energy audit discussion

By 5 December 2015, all EU companies that are not Small and Medium Enterprises (SMEs)

should have completed the first of their regular energy audits, required under the EU Energy Efficiency Directive (2012/27/EU).

Companies must assess their total energy consumption, including energy used by ships. Not all EU member states have implemented the EU Directive, and those that have appear to be taking different approaches to the energy audit requirements. However, IMCA is in discussion with other shipowners' associations to try to identify whether compliance with the IMO MARPOL Annex VI Ship Energy Efficiency Management Plan (SEEMP) requirement would satisfy the EU audit requirement for ships.

### IMCA monitors CO<sub>2</sub> situation

Europe has agreed to adopt a new regulation on the Monitoring, Reporting and Verification of CO<sub>2</sub> Emissions from Maritime Transport. From 1 January 2018, companies will be required to report CO<sub>2</sub> emissions released from ships arriving at, within or departing from EU ports.

However, the Regulation only applies to

EU Transport Commissioner, Violeta Bulc, speaks at the ECSA Gala Dinner in Brussels.

ships over 5,000 GT and to ship movements and activities that serve the purpose of transporting cargo or passengers for commercial purposes. Offshore construction activities would therefore appear to be largely excluded, although IMCA is seeking clarification via ECSA. The EU rules will put pressure on the IMO discussions on developing a global system for CO<sub>2</sub> monitoring, which could still include offshore vessels.

### IMCA responds on Working Time

In March, IMCA responded to a consultation on plans to review the EU Working Time Directive. IMCA submitted general comments about the need for the Working Time Directive to take account of the special requirements of the offshore industry, but also stressing the need to maintain the current delineation between 'offshore work' and the 'seafarers' regime. Details were provided in IMCA section briefing note E&A 05/15, which can be seen at: [www.imca-int.com/media/185717/imcaea05-15.pdf](http://www.imca-int.com/media/185717/imcaea05-15.pdf).

For more information on EU and global regulatory issues, contact [emily.comyn@imca-int.com](mailto:emily.comyn@imca-int.com)



The flagship conference of European Shipping Week in Brussels.



Images: ECSA & Shipping Innovation





## Accredited vessel inspector site launches

On 1 May the accredited CMID vessel inspector scheme kicked off with the website to handle applications going live. IMCA's Technical Adviser, Chris Baldwin, tells us the importance of this step and reveals what is coming next for applicants.

"The scheme is being delivered by IMCA and the International Institute of Marine Surveying (IIMS) and will radically alter the vessel inspection expectations of all stakeholders. The Accredited Vessel Inspector (AVI) card is set to become the industry standard symbol of quality for CMID reports.

"There are three parts to achieving accreditation status and maintaining it over a five year period. The first step is for professional inspectors to make their application; then, within a two-year period, they have to attend a one day 'CMID Accreditation Course' (see box right); and the third step is to maintain continuing professional development (CPD) by using evidence based skill development methods such as keeping a logbook, attending CMID workshops and completing CMID reports annually."

### CMID COURSE DATES

- **3 Sep** Aberdeen, UK
- **7 Sep** Singapore
- **6 Oct** London, UK
- **29 Oct** Abu Dhabi, UAE
- **6 Nov** Shanghai, China
- **17 Nov** Amsterdam, the Netherlands
- **24 Nov** Bergen, Norway
- **1 Dec** Houston, USA

Info about the application process, fees and FAQs can be found at: [cmidvesselinspectors.com](http://cmidvesselinspectors.com)

## IMCA thanks Pete

The recent re-election of the Marine Division Management Committee (MDMC) saw the vice-chairman, Pete Fougere of Transocean, stand down. Pete's first involvement with MDMC was when he became the IMCA Deepwater Americas Marine rep in 2003. He was elected onto the committee the following year and elected as vice-chairman in 2006, a position he has held ever since. As a senior engineering manager, he brought considerable knowledge, providing valuable input into IMCA marine and in particular DP publications. His involvement with the MTS DP committee has helped foster a closer working relationship between our two organisations. We wish Pete all the best for the future, in his retirement, but we know that he will continue to be a strong voice on DP issues. We welcome the new committee and thank everyone who took part in the nomination and election process.



## Draft DP update close



Image: Allseas

Whilst many of the basic principles of dynamic positioning (DP) remain the same, advances in technology, the increasing variety of vessel types using DP for offshore work and the move to deeper water has led IMCA to review and update 'M 103', one of its key marine documents.

The 2015 revision of IMCA M 103 – *Guidelines for the design and operation of dynamically positioned vessels*, which is now nearly complete, pools the resources of international industry field experts and various design documents. It will separate design and operational guidance into two sections, allowing for more focus on both elements, and feature expanded vessel type-specific guidance.

### Focused sections

IMCA Technical Adviser, Andy Goldsmith, describes the key changes which have been made to the structure of the document: "Section 2, on design, is now applicable to all DP vessels, providing guidance to achieve safety in DP vessel design through a fault tolerant approach based on the principle of redundancy.

"Similarly, the operations guidance in section 3 will apply to all DP vessels. Among other topics, it will cover recent developments in the industry to achieve safe DP operations through a detailed activity operational planning approach and on training and experience of DP personnel, manning and watchkeeping arrangements.

"The vessel type-specific guidance focuses on the industrial mission of seventeen different vessel types and the impact that this has on design and operation: these are contained in a series of appendices."

The document will provide IMCA members with up to date guidance on a wide range of matters which are essential for ensuring that DP operations are carried out safely. It is anticipated that a draft will be available for industry review during Q3 with final publication planned before the end of 2015.

Find out more about IMCA's essential marine documents here: [www.imca-int.com/marine](http://www.imca-int.com/marine)



# ROVs still on the rise



IMCA's world-wide ROV personnel and vehicles statistics for 2014, a useful snapshot of the industry, is now available to view on our website – and while some numbers are down, some continue to rise.

The stats record the personnel and vehicle numbers in February and August each year of the IMCA members who take part. We believe the statistics to be broadly representative of a significant proportion of the ROV industry.

## Numbers down

26 member companies reported their statistics for 2014 which was lower than the 32 who reported in the previous year. We suspect that this has affected the results somewhat. We encourage IMCA ROV contractor members who were unable to this time, to get involved in the process in the future; it provides a measurement tool and the opportunity to see areas of growth and decline in our industry. Members are also encouraged to make sure we have their latest contact details, as we are concerned that

many may not have received the invitation to contribute this time.

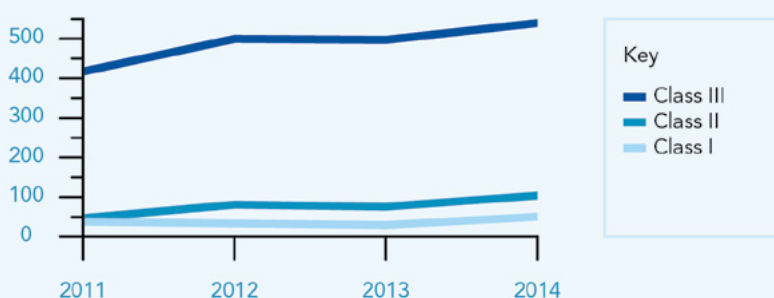
The figures for the overall number of ROV personnel for 2014 were down by approximately 10% on those from 2013. However, we expect that 20% fewer companies providing data was more likely the cause for this than any industry trend.

## ROVs rising

In spite of the lower data return, one statistic which seemed to show continued growth was the number of ROVs in world-wide operation at the time of the survey. Even with fewer contractors completing the survey, the number of vehicles in use has increased in all classes.

- Class IIIs in use saw a 9% rise from 2013
- Class IIs in use saw a 36% rise from 2013
- Class Is in use saw a 71% rise from 2013

Steady growth of ROVs in operation continues from 2011-2014



See the full report here: [www.imca-int.com/media/186666/imcar03-15.pdf](http://www.imca-int.com/media/186666/imcar03-15.pdf)



## ROV group revived

Members of the Central & North America (CNA) section Remote Systems & ROV Division Committee convened on 21 April in Houston, USA. It was the first meeting held since March 2012 and provided a chance for members to get together to discuss ROV hot topics.

The meeting, chaired by Chad Brown of Helix ESG at their US Head Office, also provided an opportunity for the secretariat to update the members on the changes that had occurred recently in the ROV division. A total of 15 delegates from IMCA members attended. Topics ranging from the formation of the ROV Training Steering Group to the impact on ROV operations of recent US BSEE rule making on well control measures were thoroughly discussed.

Chris Baldwin, the Remote Systems & ROV Division Management Committee Secretary, provided updates on IMCA ROV related documents including reviews to existing ones – R 002, R 005, R 006, R 008, R 011, and progress reports on the new ones, which will cover ROV umbilicals and ROV system load testing procedures. The attendees felt the meeting was invaluable and another has been planned for 17 June 2015 at Helix ESG, Houston.

To find out more about how to be involved with similar committees please email: [info@imca-int.com](mailto:info@imca-int.com)

# Diving: the digital dilemma

Image: Drass Energy



“It’s the first time that such a broad range of expertise has been pooled together on the topic – it was a very useful step forward.”

**PETER SIENIEWICZ**  
Technical Adviser, IMCA

Use of programmable logic controllers (PLCs) in diving systems is on the rise. In March IMCA brought leaders in the field together to discuss the issues and tackle how the industry can continue this exciting development safely – maintaining the delicate relationship between sea water, electronics and human life.

For years, there were no big developments in how saturation diving systems were being built. But in 2009 the first three totally digitally controlled sat systems were commissioned. This was a fundamental shift from the traditional dive systems that had evolved in the industry over the past 40 years. In basic terms, the new systems were relatively simple and could control a number of chamber parameters like temperature, humidity and decompression. As soon as any operating parameters were exceeded, the system stopped.

One of the expected benefits of these new systems was that they would automate procedures which could reduce manning costs. Over the last few years, however, it has become evident that the reduction of labour to operate the new breed of systems has been replaced by the need for technical expertise in system engineering and electronics to maintain them.

## Incident and examination

In 2013 an incident, covered in IMCA Safety Flash 01/14, occurred with one of these systems. The system had been placed in an unsafe condition which caused two uncontrolled descents of the bell. The bell’s umbilical was damaged leading to a loss of bell pressure. The incident did not lead to any injury or health consequences, but could potentially have been fatal.

IMCA Technical Adviser, Peter Sieniewicz, describes how, “In this case, the system was being operated in a ‘mode’ which it was not intended to be used in – and not all of the potential modes of failure had been identified. This prompted the owner to do some examination of what was happening elsewhere, as a better understanding of the implications of using PLCs was needed.

“What we saw across the industry, was that there were actually PLCs present in conventional diving systems too. In conventional systems, however, PLCs are more often used to monitor something like CO<sub>2</sub> or oxygen tolerance levels, for example, rather than control them like fully digital systems do. Nonetheless, these processes and others could be considered part of the safety critical path.

## Seminar initiative

“The second generation of automated dive systems is already in production and we now have the situation where life support technicians (LSTs) are coming through who have worked solely on the new systems and not on the conventional systems. But there is concern that our industry is still a long way behind the learning curve when compared, for example, to the aircraft industry. Pilots are required to spend a set amount of time doing emergency drills and simulations; while in

our industry, although simulator training forms an important part of what we do, there is not currently an industry specified time for how much is required.”

In light of the issues outlined IMCA decided take the initiative, get the industry leaders together and discuss the challenges and differing approaches that the introduction of fully automated PLC control systems in diving has created. The seminar took place on 11 March in Amsterdam and provided designers, system engineers, software testers, suppliers, regulators and operators the opportunity to share their knowledge and views. As Pete summarised: “It’s the first time that such a broad range of expertise has been pooled together on the topic – it was a very useful step forward.”

## Development direction

The consensus among attendees at the seminar was that an approach like the ISO 61508 – *Functional Safety of Electrical/Electronic/Programmable Electronic Safety-related Systems* method, using safety integrity levels (SILs), to provide a target to attain in regards to a system’s development, would be a good way to identify, explore and deal with issues. Whether IMCA will be involved in determining these SIL levels or creating a set of specifications for dive systems of this kind will be decided by IMCA’s Diving Division Management Committee (DDMC).

What is clear is: with the number of automated systems in use set to double soon, the industry is already looking to IMCA for direction, so expect to hear more from us on this important topic soon.



## Diving round up



### New committee chairs

The biennial election of the Diving Division Management Committee (DDMC) recently took place and we are pleased to report that the new chairman is Sjur Lothe (left) of Technip, who will be supported by the new vice-chairman Steve Sheppard (right) of Helix ESG as well as the new committee. Sjur and Steve are familiar figures to Diving Division members having been their company representative on the committee for a number of years, as well as regular presenters at IMCA seminars. There had been a strong interest in sitting on the committee and we thank everyone who put themselves forward for election.

### FMEA guidance revision

The FMEA workshop held at the IMCA Annual Seminar 2014 recommended that IMCA D 039 – *FMEA guide for diving systems* should be thoroughly revised by a workgroup comprised of everyone involved with the life cycle of diving systems – manufacturers, suppliers, classification societies, diving contractors, clients and consultants. One of the first actions of the newly assembled DDMC was to form a balanced workgroup to tackle the revision.

### IMCA airs parachute doc

Following a number of significant changes to the document a draft version of IMCA D 016 – *Open parachute type underwater air lift bags* has been released for industry-wide review. Contribute your feedback as soon as possible at [info@imca-int.com](mailto:info@imca-int.com).

### Global diving activity stats

The secretariat would like to thank all the members who provided feedback for the production of global diving activity statistics for 2013. The material collected is currently being assessed and the 2013 statistics should soon be published in an IMCA info note. Meanwhile, members will shortly receive requests to send in their diving personnel figures for 2014.

# IMCA's hyperbaric battery safety tips



Recently, IMCA commissioned a study to obtain definitive information on the safety implications of using lithium ion batteries in hyperbaric conditions. With the results now in, we plan to revise our relevant guidance to reflect the new findings.

The conclusion of this study is that use of portable devices powered by lithium ion batteries in hyperbaric chambers is safe, subject to the implementation of the recommended control measures defined in the report.

Some of the key risk control measures identified in the QinetiQ report include:

- Keep the number of portable devices using lithium ion batteries inside chambers to a minimum;
- Limit all batteries to a maximum power density of 100 Wh;
- On entry carry out a simple condition check of all devices being taken into systems;
- Do not permit charging of battery powered equipment within chambers;
- Mandate an appropriate maximum rate of

compression and decompression for the transfer of batteries into and out of the chambers for charging;

- Ensure only Original Equipment Manufacturer (OEM) devices in original condition are used in chambers i.e. prohibit all modified and repaired devices;
- Keep all battery powered devices switched off whilst not in use, especially during medical lock transfers;
- Where possible use alternative types of battery (non-rechargeable).

IMCA intends to revise guidance contained in IMCA D 041 – *Use of battery operated equipment in hyperbaric conditions* in light of the findings of the QinetiQ report.

## US regs in right direction

Almost two years ago the US Coast Guard's advisory group NOSAC (National Offshore Safety Advisory Committee) re-established its diving safety committee to assist in revising the US commercial diving regulations (46 CFR 197). It is widely recognised that the current rules, written in the late 1970s, are in need of serious revision.

IMCA took part in the NOSAC work. In April 2014, NOSAC submitted its first set of recommendations, many of which focused on aligning the US regulations with current

ADCI and IMCA standards.

In February this year, the US Coast Guard published its draft revised regulations. These are a step in the right direction, but more changes are needed in order to reflect current industry best practices. IMCA diving members in the Central & North America section have been assisting in the development of IMCA's response to the draft updated regulations.

Further updates on developments will be provided in future editions of *Making Waves*.

# Ocean busyness

With Ocean Business, a key event attended by many in the offshore survey community, taking place on 14-16 April and a host of exciting new developments planned to refresh IMCA's range of survey documents, it's been a busy spring for our Offshore Survey committee.

Despite the recent downturn, Ocean Business, which is traditionally attended by offshore survey and ROV contractors and service providers, was once again very popular this year. It was a resounding success for IMCA with Technical Adviser, Chris Baldwin, and Events Co-ordinator, Parul Patel, taking the opportunity to raise the Association's profile, meeting members face to face on IMCA's stand and even enjoying some unexpected British sunshine!

Meanwhile IMCA Technical Adviser, Nick Hough, was onsite too: and was busy presenting in the technical conference (pictured) about the work programme of IMCA's Offshore Survey Committee and the latest developments and updates which are underway to keep its guidance up to date.

## Latest docs

Nick summarises for us the updates he gave in his presentation: "It's an exciting time for the committee, with a great deal of revisions necessary to bring some of our older guidance documents in line with technologies and practices which have developed since their conception. Also, we continue to answer the need of our members in producing brand new guidance on 'emerging' technologies.

"In April we distributed IMCA S 022 – *An introduction to inertial navigation systems*, to IMCA members. And as we speak, the newly revised IMCA S 003 – *Guidelines for the use of multibeam echosounders for offshore surveys*, is in production too. It contains a raft of updated material on topics like navigation and attitude, sound velocity profiles, sensor installation, calibration and location, bias tests and patch tests, data cleaning and filtering and digital

terrain models.

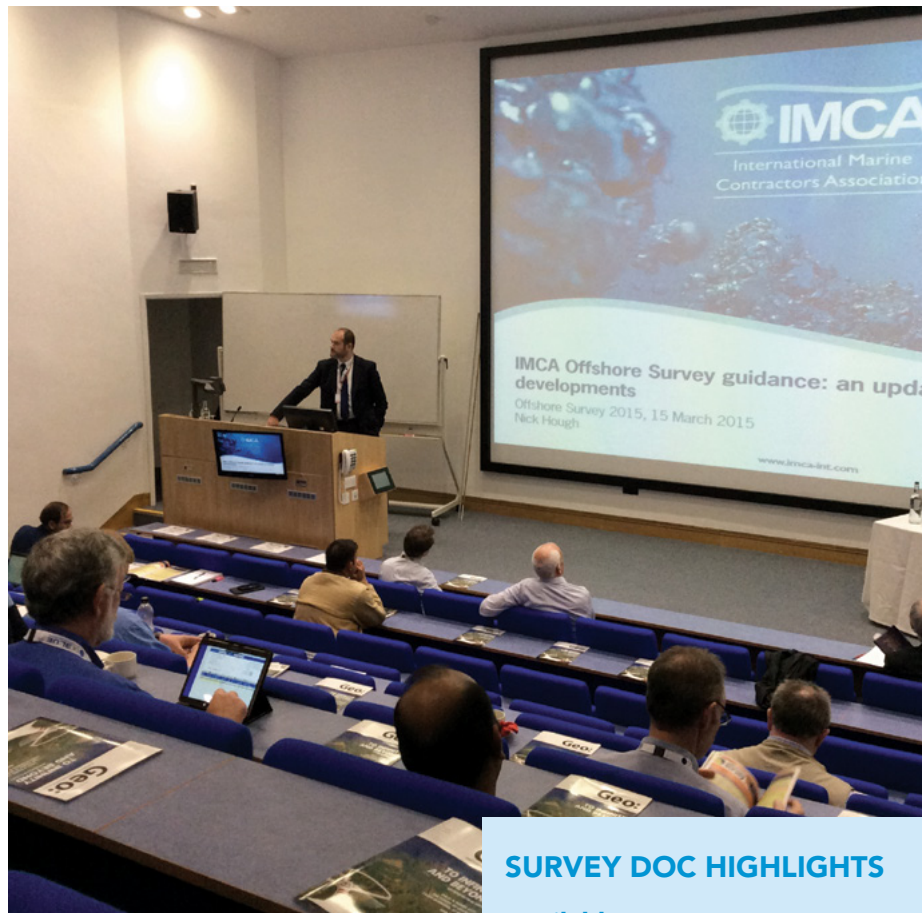
"Next up is the project to merge IMCA S 009 and 010 to form the new document *Guidelines for the shared use of vessel sensors for DP and survey operations*. This new document will highlight the risks associated with sharing sensors, advise on developing procedures to mitigate these risks and will also cover system redundancy, operational considerations and procedures for temporary installations. Members should expect an update on this document later in 2015.

## In the pipeline

"Looking further down the line, the lengthy task of revising IMCA's guidance documents on digital video, IMCA S 008 and 014, is underway. In the final documents members can expect to see developments reflected in data storage media, overlay, rendering, codecs and formats. We're also aiming to make the introduction document shorter, more accessible and jargon-free.

Similarly, there has been much development in the field of metrology. So the update to IMCA S 019 – *Guidance on subsea metrology* will cover new technologies such as inertial, laser and sonar scanning techniques, LiDAR underwater laser metrology, Echoscope and Blueview.

"Finally, with workgroups already established to write them, the next generation of guidance is also in its early stages of development too. These will cover: GNSS



## SURVEY DOC HIGHLIGHTS

### Available now:

- IMCA S 022 – *An introduction to inertial navigation systems*

### Coming soon:

- IMCA S 003 – *Guidelines for the use of multibeam echosounders for offshore surveys*
- IMCA S 009 & 010 (merged & updated) – *Guidelines for the shared use of vessel sensors for DP and survey operations*

### In the pipeline:

- GNSS heighting
- Out of straightness survey
- The shared use of sensors for survey & ROV positioning

All of IMCA's current Offshore Survey documents can be found at:  
[www.imca-int.com/survey](http://www.imca-int.com/survey)

heighting – the use of satellite positioning to determine exact elevation, out of straightness (OOS) survey and, thanks to a particularly productive workshop session on the topic at the IMCA Annual Seminar 2014, the shared use of sensors for survey and ROV positioning. We will, of course, be able to reveal more information about specifics of these documents in due course, so stay tuned."



# THE CYCLE OF IMCA GUIDANCE

## Demanded by you, published for you

The latest IMCA guidance document arrives on your desk or becomes available to download freely via our website: why has it been produced? what production stages does it go through? can you contribute directly to future IMCA publications?

IMCA has published more than 200 guidance notes and technical reports over the years, many of which are free to download, whether you are an IMCA member or not. They cover areas such as:

- Diving and ROV codes of practice;
- DP documentation;
- Marine best practice guidance;
- The Common Marine Inspection Document (CMID);
- IMCA's catalogue of safety promotional materials and much more.

Just how are they conceptualised? Who determines the content and format? What are the stages each publication goes through until release?

### Moor specific example

Nick Hough, IMCA Technical Adviser, and Darren Male, IMCA SEL Committee member and Regional HSSE Manager Middle East/India of Fugro Group, tell us how the latest IMCA DVD has just been through the 'cycle'. "Mooring Safety DVD (IMCA SEL 038) has just been released" says Nick, "and is available in 10 languages. It uses computer generated animation, which enabled us to reduce lead-time in the production process."

Darren describes how the process got underway: "During a routine IMCA Middle East & India section meeting there was a discussion around the alarming increase in the frequency of injury reports and alerts relating to seemingly avoidable incidents being sustained by personnel performing routine mooring activities.

"We agreed that there was a need for IMCA to try to do something to buck this trend, but it was soon recognised that the usual formal

*"IMCA's ability to produce quality, authoritative material, which shapes the industry, is a testament to our members who are committed to improving the technical and safety performance in core areas."*

#### DARREN MALE

Fugro Group  
IMCA SEL Core Committee member

guidance may not be the most effective tool to convey the message. The challenge lay in ensuring that whatever was produced could be easily understood by those using it."

Nick recalls, "I came back to the UK with the idea, and presented it to the full SEL Committee, who were extremely enthusiastic. We wanted to highlight six authentic, albeit dangerous mooring situations, ranging in severity from a lost finger nail to a death; and to make firm and easy to understand recommendations about what must occur during all mooring situations. This is, after all, a day-to-day operation where familiarity and the belief that routine is safe can breed complacency. The aim of the DVD was to stress the need for effective planning, risk assessment and good communication to ensure safety for all individuals involved. Like all IMCA material, the final product was approved by the Overall Management Committee, and the DVD is now available."



Image: Dana Petroleum

### Get involved

"This DVD resulted from a section meeting discussion, but your contribution to our safety flashes, submission of facts to our annual safety statistics and your opinions are also invaluable aids to ensuring our guidance and safety promotion material is relevant and delivers what the industry needs."

In March, Nick spoke at the SPE's Americas HSSE Conference on IMCA's approach to SEL issues affecting its members (SPE-173523-MS) and highlighted the five fundamental things that enable us to assist members to stay safe. These are worth highlighting again in Making Waves:

- Safety flashes (a reporting template is online);
- Safety statistics;
- Safety promotional materials;
- Good practice guidance;
- Networking, liaison and events.

"Each of these provides opportunities for you to let us know your experiences, and your subsequent requirements," says Nick. "IMCA's guidance is built on two-way dialogues with members and the wider industry. So, come on, help us to help you, to keep you and your colleagues safe!"

To find out how you can contribute contact us at: [info@imca-int.com](mailto:info@imca-int.com)



*“Our aim is to establish governance which provides enhanced transparency, increased publicity and greater access and services to all our members.”*

**MASSIMO FONTOLAN**  
Saipem, IMCA President

# IMCA 2.0: the call for sustainability

The fall in oil prices has undoubtedly had a major effect on our industry as it continues to dominate the headlines and is commonly the opening topic of most professional meetings and conversations. The key questions on our lips are, “How long will this last?” and, “How long we can survive waiting for better weather to return?”

I personally believe this is an oversight of what is really happening. Not only is it a contingent situation due to oil price, shale, political instability and few other ‘mega’ issues our industry cannot be blamed for, but there is also a systemic issue embedded here which requires a call for a performance and sustainability check.

## Room for improvement

If we look at how our industry has performed in recent years we can see a significant growth in assets, equipment, companies, technologies, turnover, profit, invested capital and, ultimately, costs. However, this has been at the expense of a comparatively reduced industrial value creation in terms of our capability to deliver on time and to budget. A number of projects have experienced longer schedules, increased costs with reduced performance and return on capital invested.

IMCA continues to be an authority in the marine contracting industry globally and endeavours to champion better regulations and enhance operational integrity at all levels. However, the current circumstances require IMCA to actively measure and monitor the actual performances of the marine contracting industry throughout the whole value chain, thus unlocking its full potential.

There is room to improve performance, competence and standards as well as manage risk through best practice, fair contracting principles and high standards of quality and safety. There is also room to review critically our most consolidated business and operating models, practices and standards with a view to reconsidering what is no longer sustainable and what does not create industrial value.

## IMCA's challenge

In my opinion this is our new challenge and should be the way that IMCA must respond to the changing global economic scenario, as well as the increasing pressure on costs and performances from our clients at all levels. By adapting faster we shall become stronger, as an industry and a global trade association.

With this in mind, we have changed the constitution to increase representation. We are reviewing the organisation of the IMCA secretariat and committees in order to establish governance which provides enhanced transparency, increased publicity and greater access and services to all our members. Yet we won't stop here, for the call of sustainability will be our next challenge!



## IMCAre nominations

It is one year since the launch of IMCAre, the charitable foundation formed by IMCA, and we'd like to remind members that you can nominate a cause to benefit from funding, donate towards one and make a difference.

Are there educational causes, projects or training courses in your region which would benefit from a financial contribution from IMCAre? If so, then let us know and we can make a difference with targeted donations which will add long term value.

For more info about IMCAre see: [imca-int.com/imcare](http://imca-int.com/imcare)

To nominate, donate and make a difference email us at: [info@imca-int.com](mailto:info@imca-int.com)



# SPOTLIGHT ON JACK SIMPSON



Jack Simpson, Engineering Quality Lead of Technip Marine Operations Services is a Chartered Engineer with 40 years of experience in the offshore, marine and subsea industry. In this interview Jack discusses the challenges of the current market, the important work of the Crane and Winch Operations Workgroup (CWOW) – which he chairs – and the benefits of being involved with IMCA.

## Diving deep

“How did I get started in the offshore oil and gas industry? Well, first of all, I have to say, it doesn’t feel like it was 40 years ago! I’d done my years of studying and was doing marine surveying off the west coast of Scotland. The skipper of the boat was telling me, ‘why don’t you go into the oil business?’ – It’s a new and exciting opportunity’.

“It was March 1974, I was young and single at the time I and thought, ‘why not?’. I just went for it! I applied to do a deep diving course with COMEX, who had just started their mixed gas diving courses, in Marseille. I had no idea at the time where it would take me.

“It was in these ‘early days’ of professional diving that I had to contend with one of the biggest challenges of my career – keeping my mother informed and onside with what I was doing; things were different and a lot riskier at that time. Of course, safety standards in the diving industry have improved enormously since then.

## Taking the lead

“After six years in the offshore diving industry I moved to Conoco UK to manage subsea construction, installation and IRM projects on fixed installations and subsea pipelines. I’ve spent time at Maersk Floating Production, operating and managing FPSOs world-wide, and London Offshore Consultants, managing their engineering and warranty surveying from Aberdeen too.

“In my nine years with Technip I’ve had management roles in marine, diving and construction, subsea construction and discipline engineering. I’ve held the positions of Asset Integrity Lead and Engineering Quality Lead. Technip’s global fleet of wholly-owned, joint venture and third party chartered vessels is under the team’s remit. We have recently developed a Validation and Verification Process to ensure that all quality objectives and expectations are delivered. It is designed to prevent engineering failures; ensure robust mitigation is applied to

prevent incidents and accidents; support lessons learned and continuous improvement processes and to prevent loss.

## Planning and protecting

“One of the main issues facing the industry at the moment is the oil price. However, in this challenging business environment, I believe it is fundamental that, as far as possible, companies ‘hang tough’ by retaining their experienced, competent personnel and core assets. Using these as a springboard, they’ll get ahead of the competition when the next upturn comes.

“Another subject of much debate at present is the demographic of the workforce in our industry and this is not for the first time. There is a generation of ‘older hands’ like me – and many who are older – in the offshore diving industry. At some time in the future we are going to start to lose these people to retirement and we need to be in a position to fill the gaps with younger people who are competent.

“But when they don’t see a secure future, the graduates who want positions, like engineering roles for example, do not necessarily start by looking in the energy industry. At Technip, we’ve got young graduates on apprenticeship schemes and marine cadetships and as an industry it’s essential that we try to protect these youngsters and the industry’s future.

## Loads of development

“I was first involved with IMCA and its committees after a winch failure on a large construction vessel. Investigation showed that the standard to which it was designed and built was inadequate for the load it was retrieving. I wanted to share that information and that’s what got me hooked with IMCA because these winches, cranes and wire ropes are equipment which is involved in everything that we do.

“There is still not a wide understanding of the issues which surround the deployment and recovery of loads subsea and the effect of hydrodynamics is not easily understood. We’ve

“As an industry it’s essential that we try to protect these youngsters and the industry’s future.”

reached depths where the weight of the wire rope required to deploy a load has actually become greater than that of the load itself. We’ve now seen the emergence of fibre ropes and slings which address the issue of weight control.

“To help inform members on the key considerations when using these new technologies and materials IMCA’s CWOW is currently working on a new document, *Guidance on high performance fibre slings*, along with a host of revisions to other vital marine and lifting documents.

## Healthy contribution

“The chance to get involved and help shape IMCA’s guidance on issues like this, to improve the industry, is a real benefit for a company like ours. But IMCA is an association which serves companies of all sizes. The value that some of the smaller organisations can get from joining this forum – by networking and having conversations with the contractor members and hearing their accumulated experiences and knowledge in the field – is immense.

“Looking to the future, the theme for the IMCA Annual Seminar, in Abu Dhabi in October, is *a health check for the marine contracting industry*: so how healthy do I think it is? Well, I believe its maturity is improving all the time. The technology certainly is and vessels are getting more capable: I think we’re in good shape.”

Technip is a world leader in project management, engineering and construction for the energy industry. We operate from the deepest subsea oil and gas development to the largest and most complex offshore and onshore infrastructures. Present in 48 countries, it has state-of-the-art assets on all continents and operates a fleet of specialised vessels for pipeline installation and subsea construction.

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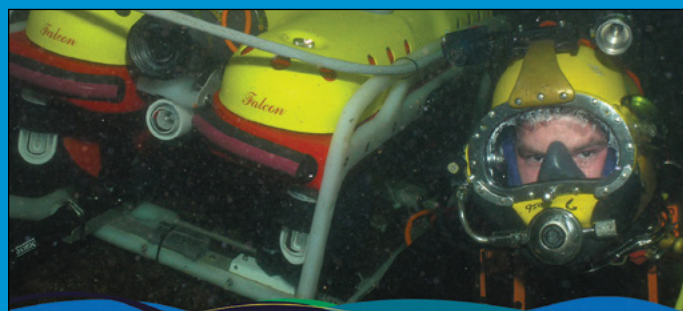
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