

INTERNATIONAL CRANES AND SPECIALIZED TRANSPORT

www.craneworld.com
A KHL Group publication

Volume 27 ■ Number 5
FEBRUARY 2019

INTERVIEW:
David Collett

PREVIEWS:
bauma

**SC&RA
Conference**

Ropes & winches

**Industrial
lifting**

SITE REPORT:
**Nuclear
dismantling**

SITE REPORT:

Bridge building



THE MAGAZINE FOR EQUIPMENT USERS AND BUYERS



bauma MUNICH

APRIL 8-14, 2019 MUNICH

VISIT US AT BOOTH : FS/1105/2



Follow us:      /XCMGGroup

XCA60 **E** ALL TERRAIN CRANE
XCA130 **E** ALL TERRAIN CRANE
XCT25L5 **E** TRUCK CRANE

Web: www.xcmg.com E-mail: export@xcmg.com Tel: +86-516-87739205
XUZHOU CONSTRUCTION MACHINERY GROUP IMP. & EXP. CO., LTD



INTERNATIONAL CRANES AND SPECIALIZED TRANSPORT

VOLUME 27 ■ NUMBER 5 ■ FEBRUARY 2019



Chosen as the official magazine of the SC&RA (Specialized Carriers & Rigging Association)

European partner:



Approved media partner for:



KHL CONTACTS

UNITED KINGDOM

KHL Group
Southfields, Southview Road,
Wadhurst, East Sussex TN5 6TP, UK.
Tel: +44 (0)1892 784088
Fax: +44 (0)1892 784086
www.khl.com/ic

USA OFFICE

KHL Group Americas LLC
3726 E. Ember Glow Way,
Phoenix, AZ 85050, USA.
Tel: +1 480 6590578
e-mail: americas@khl.com

SOUTH AMERICA OFFICE

KHL Group América LLC
Manquehue Norte 151,
of 1108. Las Condes, Santiago, Chile.
Tel: +56 2 28850321
e-mail: cristian.peters@khl.com

CHINA OFFICE

Beijing Representative Office,
Room 769, Poly Plaza, No.14,
South Dong Zhi Men Street, Dong Cheng
District, Beijing, PR China 100027.
Tel: +86 10 6553 6676
e-mail: cathy.yao@khl.com

UK/GERMANY/SPAIN/AUSTRIA/ SWITZERLAND/NORDIC NATIONS

Mike Posener, sales manager
Tel: +353 (0)86 0431219
e-mail: mike.posener@khl.com

THE NETHERLANDS

Arthur Schavemaker
Tel: +31 (0)547 275005
e-mail: arthur@kenter.nl

FRANCE/BELGIUM/LUXEMBOURG

Hamilton Pearman
Tel: +33 (0)1 45930858
e-mail: hpearman@wanadoo.fr

ITALY

Fabio Potestà
Tel: +39 010 5704948
e-mail: info@mediapointsrl.it

KOREA

CH Park
Tel: +82 (0)2 7301234
e-mail: mci@unitel.co.kr

TURKEY

Emre Apa
Tel: +90 532 2343616
e-mail: emre.apa@apayayincilik.com.tr

CHINA

Cathy Yao
Tel: +86 (0)10 65536676
e-mail: cathy.yao@khl.com

JAPAN

Michihiro Kawahara
Tel: +81 (0)3 32123671
e-mail: kawahara@rayden.jp

USA/CANADA

Matt Burk
Tel: +1 312 4963314
e-mail: matt.burk@khl.com

Bev O'Dell

Tel: +1 816 8861858
e-mail: bev.odell@khl.com

MARKETPLACE

Julia Bossie
Tel: +44 (0)1892 786204
e-mail: julia.bossie@khl.com



Last month I was excited to inherit an old book, *Mechanical Engineering*, number 12 in the *How Does It Work Series*, written by Thomas Corbin and published by C. Arthur Pearson in the UK, way back in 1924. It belonged to my wife's grandfather who was in the British Army's Tank Regiment during the Second World War, perhaps choosing that particular job partly because of his love for anything mechanical. He died on 11 November 2011, so I am unsure where this book has been languishing for the last few years but I am glad it has turned up. It has that musty old book smell, the cover has become detached and the pages have yellowed, much more so around the edges. It is featured in this issue of *ICST* as picture of the month on page 57.

An apparently slightly random selection of topics covered in the old book includes descriptions and working explanations of hydraulic machinery, textile machinery and engineers tools. Of primary interest to me, however, is the section on machinery for lifting and transporting loads – mainly cranes. The author opens the topic as follows: "Probably more labour is expended in moving stuff from one place to another than in any other way. Consequently, machinery for the transport of goods probably constitutes more than half of the machinery in existence."

Leaving aside what the book describes as the three great types of such machinery, namely ships, railways and motor vehicles, as being outside the scope of the small paperback book, attention is focused on cranes, aerial ropeways and bucket elevators. Bearing in mind we are talking about almost 100 years ago, the book says the recent electrification of cranes (replacing steam power) allowed the ordinary crane to have "been elaborated into a special machine capable of performing special operations with astounding facility".

I wonder what *Mechanical Engineering* author Thomas Corbin would have made of the developments and changes made to cranes and transport machinery since then and the current surge of interest once again in electric power.

ALEX DAHM

Editor



Correspondence is welcome and should be sent to:
The editor, *International Cranes and Specialized Transport*,
Southfields, Southview Road, Wadhurst, East Sussex TN5 6TP, UK

KHL CRANES

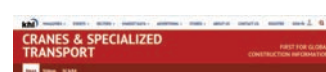


e-NEWSLETTER

Worldcrane week
Global news from International Cranes and Specialized Transport and American Cranes & Transport

www.worldcrane week.com

WEBSITES



www.khl.com/sectors/Cranes-and-Specialized-Transport/news

Crane market
The online market place for buyers and sellers of used cranes
www.khlcranemarket.com

EVENTS

www.khl.com/events/events-diary



www.khl-group.com/events/esta



www.khl-itc.com



www.khl-wcts.com



www.liftandmoveusa.com

MEMBER OF



KOBELCO

STRENGTH THROUGH EXPERIENCE SINCE 1930

KOBELCO G-Series

- EU Stage 4 compliant Power Plant.
- Up to 25% reduction in fuel consumption thanks to G-mode, 3 new Energy Saving Systems from KOBELCO: G-Engine, G-Winch and Auto-Idle-Stop.
- Ergonomic, luxurious, spacious cab with Joysticks.
- High precision in positioning loads.
- Unrivalled smooth operating comfort.
- Dual pump flow for clamshell, bucket or material handling*
- Wide, large-capacity winches improve spooling and extend wire rope life.
- Large, colour monitor with pictograms provides outstanding visibility and immediate comprehension of essential operating data.
- Fast assembly and disassembly.
- Innovative, low weight upper frame and body within 3m transport width.
- Tractor-type crawlers.*
- Over-swing preventative device.*
- Machine inclination sensor.*
- Counterweight detect system.*
- Efficient transport.
- Low maintenance.
- Excellent reliability.
- Worldwide service.

* optional items

bauma
APRIL 8-14, 2019, MUNICH

visit us on
**Outdoor Stand
FN 1016**

KOBELCO CONSTRUCTION
MACHINERY CO., LTD.
TOKYO, JAPAN
Tel: +81-(0)3-5789-2121
intlsales_cr@kobelconet.com

KOBELCO CONSTRUCTION
EQUIPMENT INDIA PVT. LTD.
Tel: +91-120-4079900
miyashita@kobelconet.com

KOBELCO CONSTRUCTION
MACHINERY MIDDLE EAST AND
AFRICA FZCO
Sharjah, U.A.E.
Tel: +971-4-298-2020
nezaki.kentaro@kobelco.com

KOBELCO CONSTRUCTION
MACHINERY U.S.A INC.
Tel: +1-281-888-8430
jack.fendrick@kobelco.com

KOBELCO INTERNATIONAL (S)
CO., PTE. LTD.
Singapore
Tel: +65-(0)6268-1308
hirakawa.takemichi@kobelco.com

KOBELCO CONSTRUCTION MACHINERY
EUROPE B.V. FOR EUROPE, RUSSIA, CIS
Tel: +31-(0)36-549-5510
jos.verhulst@kobelco.com

KOBELCO CONSTRUCTION MACHINERY
EUROPE B.V. FOR U.K., IRELAND AND
SOUTH AFRICA
Tel: +44-(0)1342-301122
mark.evans@kobelco.com

www.kobelcocm-global.com

IN THIS ISSUE

ON THE COVER



Mammoet using a 1,200 tonne capacity Liebherr LTM 11200-9.1 and a 750 tonne capacity LTM 1750-9.1 on a bridge construction project in Germany. See page 43.

SUBSCRIPTIONS

To subscribe to *International Cranes and Specialized Transport* or any of the magazines in the KHL portfolio: *American Cranes & Transport*; *Cranes and Project Transport Turkey*; *International Construction*; *Demolition & Recycling International*; *Construction Europe*; *International Rental News*; *Access International*; *Access, Lift & Handlers*; *International Construction Turkey*, go to: www.khl.com/subscriptions or call +44 (0)1892 784088 for details.



International Cranes and Specialized Transport is a monthly publication with a worldwide circulation. The annual airmail subscription rate is £215, US\$345, €260. This issue of *International Cranes and Specialized Transport* is mailed on the 8th February 2019.

Material published in *International Cranes and Specialized Transport* is protected under international copyright law and may not be reproduced without prior permission from the publisher.

International Cranes and Specialized Transport (USPS 017 158) is published monthly by KHL Group and distributed in the US by DSW, 75 Aberdeen Road, Emigsville, PA 17318-0437. Periodicals postage paid at Emigsville, PA. Postmaster: Send address changes to *International Cranes and Specialized Transport*, c/o PO Box 437, Emigsville, PA 17318-0437.



BPA Worldwide is the global industry resource for verified audience data and media knowledge. BPA Worldwide business media audits provide assurance, insight and advantage to business-to-business media owners and media buyers.

PUBLISHED BY



Printed by: Warners Midlands PLC, UK

© Copyright
KHL Group 2019
ISSN: 1747-700X

FEATURES



ROPES AND WINCHES 15

New synthetic fibre ropes and slings are launched while demand for wire rope remains strong. *Christian Shelton* reports.

SITE REPORT: 21
INNOKRAN

Innokran installed Stahl winches to aid the dismantling of a nuclear power plant in southern Germany. *Christian Shelton* reports.

REGULARS

NEWS 6

SPECIALIZED TRANSPORT NEWS 31

EQUIPMENT AND ACCESSORIES 49

BACK PAGE 51

MARKETPLACE

■ PRODUCTS, PARTS & ACCESSORIES 53

■ CRANES AND EQUIPMENT FOR SALE OR RENT 54

KHL TEAM

EDITOR

Alex Dahm
e-mail: alex.dahm@khl.com
Tel: +44 (0)1892 786206

DEPUTY EDITOR

Christian Shelton
e-mail: christian.shelton@khl.com
Tel: +44 (0)1892 786208

GROUP EDITORS

Thomas Allen, Lindsey Anderson,
Andy Brown, Steve Ducker,
Sandy Guthrie, Fausto Oliveira,
Cristián Peters, D. Ann Shiffler,
Euan Youdale

WORLDWIDE CONTRIBUTORS

Graham Brent, USA
Marco van Daal, Aruba
Heinz-Gert Kessel, Germany
Richard Krabbendam, Netherlands
Tim Maughan, Japan
Brent Stacey, Australia
David Weston, UK

SC&RA CORRESPONDENTS

Mike Chalmers, Tim Hillegonds
PRODUCTION & CIRCULATION

DIRECTOR

Saara Rootes
e-mail: saara.rootes@khl.com

SENIOR PRODUCTION EXECUTIVE

Anita Bhakta
e-mail: anita.bhakta@khl.com

Tel: +44 (0)1892 786246

PRODUCTION ASSISTANT

Charlotte Kemp
e-mail: charlotte.kemp@khl.com

Tel: +44 (0)1892 786262

DESIGN MANAGER

Jeff Gilbert

EVENTS DESIGN MANAGER

Gary Brinklow

PRINT & DIGITAL DESIGNER

Mitch Logue

DESIGNER

Jade Hudson

INTERVIEW:
DAVID COLLETT

25

ESTA president *David Collett* speaks about what 2019 might hold for the association.



bauma PREVIEW

28

Prepare for this year's Bauma show which starts on 8 April in Munich, Germany.



SC&RA CONFERENCE PREVIEW

35

Don't miss the SC&RA's 2019 Annual Conference.

INDUSTRIAL LIFTING

38

Both the rise and fall of industries translates into lifting work. *Christian Shelton* reports.

SITE REPORT: MAMMOET

43

For a river bridge job in Berlin, Germany, Mammoet chose to use a pair of large wheeled mobile cranes.



SC&RA COMMENT

45

Comment from *Joel Dandrea*, SC&RA chief executive officer.

SC&RA NEWS

46

Part of SC&RA's strategic plan for 2019 will be workforce development. *Mike Chalmers* reports.

CIRCULATION & DATA MANAGER

Helen Knight
e-mail: helen.knight@khl.com
Tel: +44 (0)1892 786244

DIGITAL MEDIA DIRECTOR

Peter Watkinson
e-mail: peter.watkinson@khl.com

OFFICE MANAGER

Anne Chittendon

Direct tel: +44 (0)1892 786201

e-mail: anne.chittendon@khl.com

EDITORIAL DIRECTOR

Paul Marsden

PUBLISHER

James King



DANA ACQUIRES SME GROUP

Vehicle transmission and component company Dana Incorporated in the USA has completed the acquisition of Italian electric motor manufacturer SME Group.

Headquartered in Arzignano, SME designs and builds low-voltage AC induction and synchronous motors, inverters, and controls for off-highway vehicles, including material handling, construction and agricultural equipment.

SME will strengthen Dana's capability as vehicle and machinery electrification gathers pace. "Dana's acquisition of SME enhances our ability to address the electrification and hybridisation needs of our customers, while also increasing the potential for incremental content per vehicle," said Jim Kamsickas, Dana president and chief executive officer. "SME's electric motor and inverter products, which largely support off-highway applications, are complementary to the technologies we acquired with TM4 [an electric powertrain designer and manufacturer from Canada], which are predominately focused on light and commercial vehicle applications."

Christophe Dominiak, Dana chief technology officer, added, "The addition of SME's low-voltage induction motors rounds out our already robust offering of high-voltage permanent magnet motors and enables us to deliver a complete range of electrified solutions for our customers."

The acquisition will extend its capabilities to applications up to 250 kW.

The privately held SME Group employs more than 100 people. In addition to Italy it operates in China, Germany and Canada.

Test success for 800 tonne Liebherr crawler

Manufacturer Liebherr's new 800 tonne capacity crawler crane, the LR 1800-1.0, has hoisted its first large load as part of prototype testing procedures. It lifted 560 tonnes on an 84 metre main boom with a 12 m radius derrick.

Liebherr has called the boom system it tested the HSLDBV. It comprises the main boom (HSL), the derrick system (D), and the manufacturer's new suspended ballast with adjustable V frame (BV). According to Liebherr, the V frame offers greater flexibility than the standard rigid system for large ballast radii, as it

The Liebherr LR 1800-1.0 has been tested with 560 tonnes on an 84 metre main boom

enables the radius to be adjusted between 14 and 23 metres.

For the test load hoist, 400 tonnes of suspended ballast were extended to the crane's maximum radius of 23 m. The crane was also equipped with 170 tonnes of ballast on the slewing platform and 70 tonnes of central ballast.

Even heavier load tests will follow, Liebherr said. All testing should be complete by April



2019, when the crane will be displayed on Liebherr's stand at the Bauma trade show in Munich, Germany.

Zoomlion tower crane factory

Construction equipment manufacturer Zoomlion Heavy Industry Science & Technology Co in China has opened what it claims is the world's largest tower crane factory.

Opened in Changde, Hunan Province, on 11 January 2019, construction of the RMB 780 million (US\$ 115 million) plant began in 2016. The manufacturer described it as a smart factory designed to meet Germany's Industry 4.0 standards. It has 12 automated production lines, more than 10,000 sensors, 100 industrial robots and 35 unmanned vehicles. The 16 CNC processing centres are integrated with a manufacturing execution system (MES) to

improve production efficiency and information management.

Zoomlion said, on average, one standard crane section is manufactured every ten minutes and one lifting arm is produced every 90 minutes.

Commenting on the opening of the new factory, Zhan Chunxin, Zoomlion chairman and CEO, said, "We are very excited to begin production at our new cutting-edge intelligent factory. By leveraging our world-leading technology, along with the resources and support available to us in the Changde region, we will endeavour to develop even better-quality, more intelligent products."

On the day of the factory opening Zoomlion announced three new flat top tower crane models; T6515, T6250 and T7525. High technology is also a major feature on these, the manufacturer said. They support

remote condition monitoring, management via a mobile app, and have remote alarms.

At the factory opening Zoomlion claimed to be the number one tower crane brand in China and said it had the largest share of the global market. It reported sales of RMB 5 billion (US\$737 million) in 2018 and said it planned to double that to RMB 10 billion (\$1.47 billion) in 2019, from the tower crane division.



Zoomlion launched three flat top towers in January 2019



HIGHLIGHTS

■ Truck loader crane and hydraulics manufacturer Hyva marks its 40th anniversary in 2019.

The Netherlands-based company started out manufacturing hydraulic cylinders in 1979.

In the 1980s the company expanded, moving into Asian countries Malaysia, Thailand, China, Indonesia and Korea.

In the 1990s operations began in Brazil and India. Since then subsidiaries have been added in Russia, USA, Australia, Middle East and more in Asia.

In 2017 Hyva announced it had produced the two millionth hydraulic cylinder.

Commenting on the company's progress, Marco Mazzu, Hyva Group CEO, said, "At Hyva, we are proud of this history and heritage, and it will inspire us to continue our strategy of customer focus and innovation."

■ In the January issue of *International Cranes and Specialized Transport* we wrote that Dutch repair and refurbishment company Avezaat has four locations in Belgium. This should have read that 'Avezaat has four locations in Holland, situated near the ports of Rotterdam and Antwerp'. ICST apologises for any confusion.

ALE goes for record US lift

International heavy lift specialist ALE lifted a module weighing nearly 3000 tonnes, making it one of North America's heaviest lifts with a land-based crane.

ALE used its 5,000 tonne capacity AL.SK350 super heavy lifter which has a maximum load moment rating of 354,000 tonne-metres.

The 3,179.5 US ton (2,884.4 tonne) load was an MRU module for an oil and gas project at Ingleside, Texas. It was the second of three modules on top of the offshore topside. All three modules together weigh 7,290 tons (6,614 tonnes) with hook block and rigging.

All three lifts will be made from one position so no repositioning or dismantling and reassembly will be required, reported UK-headquartered ALE.

The AL.SK350 was rigged with 124 metres of main boom and set at a 49 m ballast radius. The heavy winch system was fitted as was 4,000 tonnes of ballast. The lifting radius ranged from 29.9 to 31.4 m.



AL.SK350 with close to 3,000 tonnes on the hook at Ingleside, Texas, USA

Commenting on the second lift Ronnie Adams, ALE senior project manager, said, "The second successful lift proves the tried-and-tested capabilities of the AL.SK350 crane and its unique ability to lift this weight at such a long outreach within a congested site. The team and myself are very proud to be involved in such a landmark project and be the first to achieve such a heavy lift using this type of crane in the USA."

These initial three lifts on

land are trials in a bid to minimise delay when installing the modules offshore. Confirmation can be established that the parts fit together and it allows for some more pre-commissioning to be carried out. Final installation will be done using a new heavylift vessel in the sea off Israel.

February will see the third module lifted prior to all three leaving the yard for their final destination in the second quarter of 2019.

Wind contract for Boskalis

Royal Boskalis Westminster from the Netherlands has been awarded a contract for the Inch Cape offshore wind farm project in the North Sea off the coast of Scotland, UK.

Boskalis will do the transportation and installation of wind turbine foundations, the offshore substation, and cables, for Inch Cape Offshore Limited (ICOL), a subsidiary of renewable energy firm Red Rock Power. Work is subject to a successful bid by ICOL in the next UK Contracts for Difference auction, in mid-2019.

Excluding procurement, the contract value is forecast at more than €200 million (US\$ 229 million). Boskalis will use its crane vessel Bokalift 1 for the foundations and the offshore substation foundation, sub-structure and topside. It is a self propelled crane vessel with a 3,000 tonne capacity revolving crane. The available deck space of 165 by 43 metres is a unique



feature, Boskalis said. The contract includes engineering, supply, transportation and installation of up to 72 pre-piled jacket foundations and up to 84 inter-array cables, plus transportation and installation of the offshore substation.



Swiss crane company Interkran has bought a Demag AC 100-4L all terrain crane manufactured by Terex Cranes.

The all terrain will primarily be used to erect tower cranes and as a taxi crane.

The crane has a compact design and is 2.55 metres wide and a system length of 77 m.

The crane was collected in person by Tony Teixeira, Interkran general manager, and crane operators Reis Joaquim and Sandro Guimar.

HIGHLIGHT



■ Graham Brent will step down as CEO at the National Commission for the Certification of Crane Operators

(NCCCO) effective 1 July 2019, to take up leadership of the recently formed NCCCO Foundation.

Brent has led the non-profit certification body virtually since the inception of NCCCO certification programmes in 1996. He will be succeeded by NCCCO board member and immediate past president, Thom Sickelsteel, who is currently general manager at Leavitt Cranes. NCCCO president, Kerry Hulse, said, "NCCCO would not be the organisation it is today without the leadership and guidance of Graham."

LiftWerx launches BoxHook

A new 100 tonne capacity wind turbine maintenance crane has been announced by LiftWerx.

The BoxHook is designed for larger wind turbines in the 3 to 8 MW range. It can be mounted on towers up to a height of 175 metres. In an offshore application the BoxHook is an alternative to using a crane mounted on a jack up vessel.

Specialist engineering contractor LiftWerx, based in Canada, said the new crane will drive down repair costs for onshore and offshore turbines. The BoxHook is assembled using a LiftWerx GenHook crane.

It can be used in the maintenance and repair of gearboxes, generators, transformers, and other major components, LiftWerx said.

LiftWerx is part of the Meemaken group of companies



The 100 tonne capacity BoxHook crane designed for wind turbine maintenance

owned by Roderik van Seumeren. The company specialises in complex logistics and heavy and alternative lifting in the wind energy industry.

A spreader frame from UK-based below the hook lifting equipment specialist Modulift was used to lift boats during the filming of a historical drama for television.

The History Channel's *Vikings* was filmed at Ashford Studios in Wicklow, Ireland. For the drama a CMOD 24 frame with a maximum size of 5 x 4 metres was suspended from a 50 tonne capacity Grove GMK3050 owned by Modulift distributor Irlequip. The handmade boats weighed up to 5 tonnes. The frame is recommended for loads with more than two lifting points and up to 30 tonnes can be lifted. Each corner unit was rated at 7.5 tonnes. Most of the lifts were made with the frame set at 4 x 3 m but the larger boats required it at 5 x 4 m.

Damien Maher, responsible for capital equipment sales at Irlequip, said, "The spreader frame not only lifted but also cradled the boats, thus, preventing any inward pressure or stress."



Nurol towers in Abu Dhabi

Abu Dhabi, United Arab Emirates-based Nurol Construction Company has supplied two Raimondi luffers for work on the Corniche Tower

job site in Abu Dhabi. A Raimondi LR165, part of Nurol's existing fleet, is accompanied by a Raimondi LR213 luffer, recently purchased by Nurol.

The project involves the construction of new 35-storey, mixed-use tower on the Abu Dhabi waterfront.

According to Raimondi, the LR213 was selected for its lifting capacity of 14 tonnes and its versatility in areas where it is difficult to obtain permission to over sail or fly over neighbouring property. It has a 55 metre jib and a height under hook (HUH) of 45 m, which will eventually be increased to 187 m.

The LR165 has a 55 m jib and a HUH of 45 m. It will eventually be climbed to 172 m.

"This jobsite has multiple security restrictions together with an extremely congested set of high rise developments, so much of our team's support

focused on site planning ahead of the installations," explained Wael Hasan, Middle East commercial director at Raimondi Cranes. "Later, we will be supporting this job site by dismantling the LR165 using the LR213 as a cost saving initiative, and to adhere to our client's needs.

"Raimondi dedicated a considerable amount of technical support and technical study to propose this solution for our client.

"Due to the existing developments surrounding the job site, we were informed that mobile cranes are not permitted in the area. We then executed a study and came up with the solution of utilising the LR213 in the dismantling process."

Raimondi provided a three-day training session for Nurol crane operators and the Corniche Tower job site is also subscribed to Raimondi Middle East's monthly maintenance programme.

Nurol's LR165 and LR213 luffers



EXPERIENCE THE NEW ATF 60G-3 AT

bauma

**APRIL
8-14
2019
MUNICH
BOOTH
FS.1205**



AVAILABLE NOW

WHEN SUCCESS IS YOUR ONLY CHOICE.

Strong. Long. Light. The new ATF 60G-3.

It telescopes loads of up to 40 tonnes. It operates with a radius of up to 44 m on main boom. It drives in a 10 tonne axle load configuration. In a nutshell: The ATF 60G-3 offers you an extraordinarily wide application spectrum which goes far beyond that of the equivalent 60 tonner – guaranteeing an above-average degree of utilization. And your long-term success. **When success is your only choice: The new ATF 60G-3.**

Find out more about your chances of success at: www.atf60g-3.de/en

Max. Lifting Capacity	Boom	Boom Extension	Max. Sheave Height	Max. Radius	Engine (superstructure)	Gear
60 t	9.5 m – 48 m	1.7 m / 7.4 m	58.4 m	44 m	260 kW (354 HP)	6 x 4 x 6 (6 x 6 x 6 off-road)

LIFTING CAPACITY MEETS LOADING CAPACITY THE NEW PK 135.002 TEC 7

Very rigid and light – two characteristics which make the PALFINGER P-Profile unique. Combined with intelligent control systems like DPS-C or HPSC-Plus, the new PK 135.002 TEC 7 offers an outstanding ratio of lifting capacity to dead weight, leaving payload reserves on the truck.

LIFETIME EXCELLENCE

Visit us at:

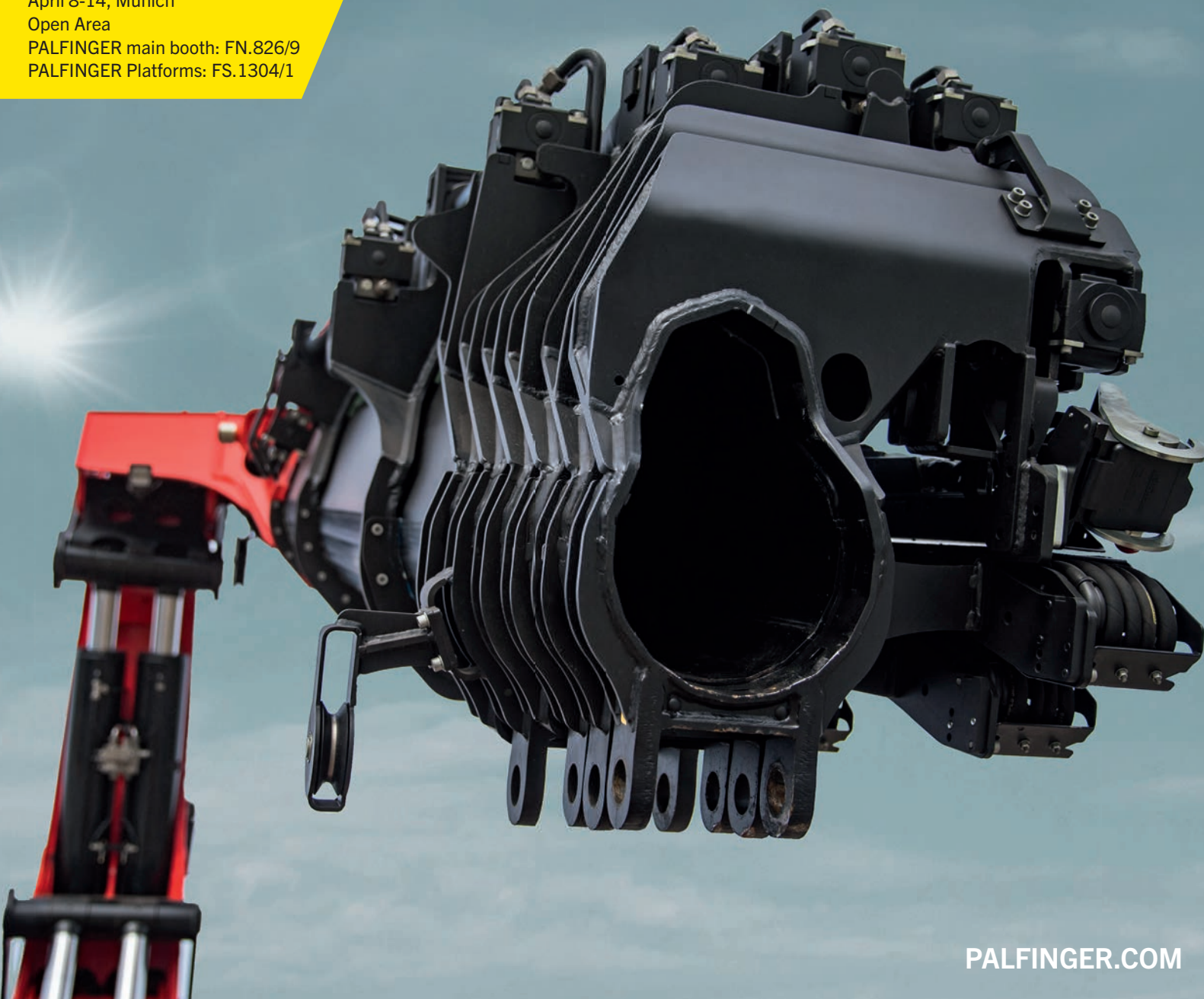
bauma

April 8-14, Munich

Open Area

PALFINGER main booth: FN.826/9

PALFINGER Platforms: FS.1304/1



HIGHLIGHT

■ Dorset, UK-based crane rental and sales company Jones Crawler Cranes has taken delivery of the first Maeda CC985 crawler crane sold in the UK. The crane has a lifting capacity of 4.9 tonnes and a working height of 16.5 metres. According to Maeda, it has a compact working footprint and near-zero tail swing. The crane also has a programmable load moment limiter and a rear view camera and monitor.

"I love everything about the machine and we're impressed with the build quality. The low emissions make this machine especially useful for us," commented the owner of Jones Crawler Cranes, Mark Jones.

The machine's first job is at Longleat Safari Park in Wiltshire. It was sold by UK Maeda Mini Cranes distributor Kranlyft.

The 152 tonne capacity NC Nielsen heavy duty reach stacker for Blue Water Shipping



Record reach stacker

Danish manufacturer NC Nielsen has delivered what it claims as the world's largest reach stacker.

The 152 tonne lifting capacity model 152 330 TH went to Blue Water Shipping in Esbjerg and was put to work moving wind turbine tower sections, nacelles and other heavy components. Blue Water Shipping wanted flexibility and sees the new stacker as an alternative to a crane. It is based on a Konecranes 4545 reach stacker.

Søren Messmann, Blue Water Shipping general manager of the port services division, said, "Now we can handle the heaviest lifting and transport tasks ourselves by combining our machines for the different projects. For instance, we can lift objects of up to 250 tonnes with the world's largest reach stacker on one end and one of our 100 tonne reach stackers on the other – or operate with extremely heavy objects hanging on the hook. This sets us up to handle the transport projects of the future."

On working with NC Nielsen, Messmann said, "We have had

fantastic co-operation with NC Nielsen. We have carried out open, joint and constructive development work with plenty of ideas on the table.

"NC Nielsen has been good at grabbing the ideas and turning them into technical solutions. There have been no restrictions in principle, and that way of thinking moves the boundaries of what is possible."

For our first announcement story on this reach stacker see the story 'Nielsen reach stacker goes large' in the ICST October 2017 issue, *News*, page 6, or at this link: <https://bit.ly/2UsG2yx>.

SENNEBOGEN ON TUNNELLING PROJECT

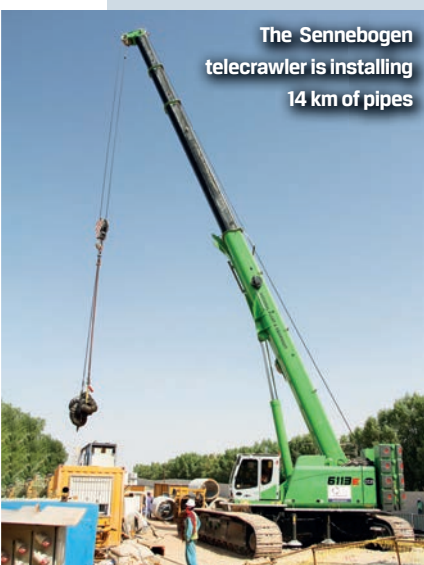
A 120-tonne capacity Sennebogen telescopic crawler crane was used on a long-term project building small tunnels in Dubai, United Arab Emirates.

Where the city of Dubai is expanding its built environment further into the desert, multiple micro-tunnelling projects are underway in which pipes are inserted into the dry ground. A 120 tonne capacity Sennebogen telescopic boom crawler was chosen to lift the necessary equipment into and out of the vertical access shafts.

As host of the Expo 2020 World Expo new impetus will be brought to the region where industrial diversification will be vital in a move away from the economy's dependence on oil. Dubai has a population of more than three million and large numbers of tourists.

Trenchless pipe-laying to re-route existing pipelines is a crucial part of developing habitable terrain.

The Sennebogen crane is being used to install 14 km of water pipes, sewage pipes and other supply lines into the ground in the Khawanej area of Dubai, 15 km east of the international airport.



The Sennebogen telecrawler is installing 14 km of pipes

Transshipping duties for offshore cranes

Chinese shipping company Cosco Shipping Bulk Co. has bought two floating cranes from Finnish company Konecranes.

The cranes are Gottwald Model 8s and will be used for handling bulk in open-sea operation off the coast of Guinea, Africa, from the end of 2019.

This is the first time Cosco has bought a floating crane from Konecranes. According to Konecranes, the Model 8 is built in accordance with Lloyd's Register Code for Lifting Appliances in a Marine Environment. This allows it to be operated at wind speeds up to 24 m/s and maximum wave heights of 2.5 metres.

Both cranes have a maximum outreach of 43 m and a 63 tonne grab curve for continuous-duty bulk handling. Specifically, they will be used for transshipping bauxite, used for the production of aluminium, from river barges onto ocean-going Panamax vessels on the open sea.

ZhiJun Fan, general manager of technical division of Cosco, said, "These cranes have proved themselves as particularly productive and reliable in rough open sea environments."

According to Konecranes, number of Gottwald floating cranes in operation on the western coast of now Africa totals ten.

Experience the Progress.

Together.
Now &
Tomorrow.

Visit us at:

bauma

Munich, April 8th-14th

Find out more at
www.liebherr-bauma.com



The Safe Alternative: New Liebherr Rough Terrain Cranes

LRT 1090-2.1: 47 m / 154 ft full power boom

LRT 1100-2.1: 50 m / 164 ft pinned boom

- Safe & Strong**
- High lifting capacities with a maximum of safety due to VarioBase®
 - Globally uniform load charts conform to ANSI, EN and further standards
 - Safe access points and flat deck
- Comfortable**
- Simple and easy to operate
 - Operator friendly extra wide and tiltable crane cabin
 - Sales and service directly from the manufacturer



Liebherr-Werk Ehingen GmbH
P.O. Box 1361
89582 Ehingen/Do., Germany
Phone: +49 7391 502 0
E-mail: info.lwe@liebherr.com
www.facebook.com/LiebherrConstruction
www.liebherr.com

LIEBHERR

EQUIPMENT SALES TO REMAIN HIGH

Global sales of construction equipment are expected to stabilise in 2019, following two years of strong growth, according to specialist forecasting and market research company Off-Highway Research (OHR).

Worldwide equipment demand grew by 27 % in 2017, following a period of decline that had run from 2012 to 2016. Further double-digit growth in 2018 took the global market to 1 million unit sales with a retail value of almost US\$100 billion (€87.7 billion).

Demand of this magnitude is on a par with previous recent highs in the market seen in 2011 and 2007. While the volume achieved in 2018 is expected to represent the peak of the current cycle, equipment sales in 2019 are forecast to remain close to last year's levels.

Chris Sleight, managing director of Off-Highway Research said, "After two years of solid and largely synchronised growth, the picture for the world's major equipment markets is now looking more mixed.

"There will be moderate declines in a number of key markets in 2019, but the falls are not expected to be steep and will be partially offset by continued growth elsewhere. As a result, sales will remain above 900,000 units per year over the medium term, with a value in the region of US\$100 billion (€87.7 billion)."

Heavy lifting work for Marr

Marr Contracting from Australia has been awarded a contract on a high profile suspension bridge construction project in Turkey.

In 2017, a joint venture (JV) between Korean construction group Daelim, Turkish construction conglomerate Limak, Korean infrastructure developer SK E&C, and Turkish construction contractor Yapi Merkezi, (abbreviated to DLSY), won the contract to design, build and operate the Çanakkale 1915 suspension bridge.

The bridge will span the Dardanelles strait in Turkey, which forms part of the continental boundary between Europe and Asia. Once complete, it will be the world's longest span suspension bridge and will carry a six-lane motorway – part of the US\$ 2.8 billion Kinali-Balikesir motorway project.

As part of the bridge build, the DLSY JV has awarded the contract to deliver specialised



Marr Contracting will supply a 330 tonne tower crane to help build the Çanakkale 1915 suspension bridge

heavy lifting crane services to Australia-based tower crane specialist, Marr Contracting.

Marr said it plans to use its 330 tonne capacity Favelle Favco M2480D heavy lift luffer in order to decrease the construction time and associated risk for the project. Marr started work planning the project in January 2018 and expects to be on site from July 2019 for an estimated 14 months. It will be responsible

for: designing the crane supports and ties; supplying the supports ties and cranes; installing and commissioning the cranes; climbing and operating the cranes during the construction of the bridge towers; and dismantling of the cranes on completion of the build.

MANITOWOC BAUMA LAUNCHES

Manufacturer Manitowoc will show six new cranes and several new lifting technologies at the 2019 Bauma exhibition in Munich, Germany, in early April.

All terrain cranes on display will include the 300 tonne capacity Grove GMK6300L-1, successor to the GMK6300L. Also on show will be a new GMK4090 all terrain and a new 60 tonne capacity GMK3060L all terrain.

Among the products on show from Manitowoc's tower crane brand Potain will be the Hup 40-30 self erecting tower crane, new high speed hoist winches and the operator hoist that fits inside the tower crane's mast. On the technology side, news will include a mobile diagnostic app and a boom configurator app.

Barry Pennypacker, Manitowoc president and CEO, said, "e have bolstered our new product pipeline, developing products that our customers want to purchase."

Feldmann buys five new Liebherr cranes

Swiss crane rental and transportation firm Feldmann has bought five new Liebherr cranes. The order comprises: an LTC 1050-3.1 compact crane; an LTM 1100-2.1 telescopic mobile crane; an LTM 1250-5.1; an LTM 1450-8.1; and an MK 88 mobile construction crane.

The purchases are part of Feldmann's replacement

purchase strategy. "The new machines fit perfectly into our range," said Heinrich Kistler, head of cranes at Feldmann. "The LTC 1050-3.1 is a very compact crane with a low clearance height. We also love the compact dimensions of the LTM 1100-5.2 and the lifting capacity of the LTM 1250-5.1. The LTM 1450-8.1 with its long telescopic boom can be set up quickly and is very manoeuvrable. The MK 88 is a user-friendly mobile construction crane with very good lifting capacities."

From left to right: Marc Bollinger (Liebherr Baumaschinen), Andreas Gnädinger, Heinrich Kistler (both from Feldmann Pneukran + Transport), Marcel Hartel (Liebherr Baumaschinen)





COMPACT AND STRONG.

Delivers class-leading load charts combined with the compact footprint you expect from the leader in Taxi cranes.

The GMK4090 is designed to deliver unsurpassed work site versatility, putting more jobs within your reach.

- Impressive load charts — at 12 t per axle
- Narrow width and MAXbase variable outrigger system delivers greater jobsite access and increased lift capacities
- Single engine technology with fuel saver technology delivers better fuel efficiency
- Crane Control System (CCS) delivers operator-friendly and ergonomic operation of the crane

Contact your local Grove dealer: www.manitowoc.com

GMK4090

SUPERIOR TAXI CHARTS

- Capacity: 90 t
- Main boom: 11 m – 51 m
- Maximum jib: 8,7 m – 21,0 m
- Maximum tip height: 75,0 m

All counterweight needed to achieve full capacity fits on one standard trailer

New comfortable driver and operator cabs enhance productivity

Boom configurator mode offers the easiest setup and optimal configuration

Bi-fold swingaway and boom extension enhances lifting over obstacles at greater heights

Six-section MEGAFORM™ boom with TWIN-LOCK™ pinning system delivers greater lifting capacity at all radii

VISIT US

bauma

APRIL 8-14, 2019 • FS 1202

The rise of synthetic rope continues, although demand for wire rope remains strong.

CHRISTIAN SHELTON reports

Linear development

The use of synthetic rope as an alternative to wire rope for crane and rigging operations gathers greater pace as Austrian rope manufacturer Teufelberger and Swiss-headquartered equipment manufacturer Liebherr announce they have developed a new type of high-tensile fibre rope designed to increase lifting capacities. The new rope will debut on a new Liebherr tower crane series that will be launched at the Bauma show in March.

During the development of the new fibre rope Liebherr says it tested more than 100 different prototypes, measuring a total of around 70,000 metres in length. Initially they were tested using a traditional rope bending machine. This was followed by the construction of a special test bench with a

hoisting height of 42 metres. It enabled ropes with a thickness of up to 31 millimetres to be tested with loads of up to 45 tonnes on a rope drum with multiple rope turns.

Liebherr also built a climate chamber in which the rope was subjected to a wide range of weather conditions and temperatures ranging between 80 and minus five degrees. Sand and dust were added to the air to simulate desert conditions and a monsoon climate was also created.

Field tests

These lab tests were followed by a series of field tests in which high-tensile fibre ropes in various diameters were used on 11 tower cranes across Germany, Austria, France, Belgium and Switzerland. The field tests started in 2016 and have now concluded.

Liebherr says the test results demonstrate that the new fibre rope weighs around one-fifth of a conventional steel rope, lasts four times as long, and is much easier to handle. Liebherr claims the benefits of the lighter rope were particularly noticeable during the assembly and dismantling of the cranes during the field tests, as it could often be fitted by hand and without requiring auxiliary

Liebherr will launch a new tower crane series at Bauma fitted with its new fibre rope

The new fibre rope from Liebherr and Teufelberger being tested on a tower crane

reeving winches. Re-reeving the hook block was also quicker and easier, Liebherr adds.

Liebherr adds that the rope's fibres do not require lubrication, so cleanliness is improved and the need for maintenance reduced.

Liebherr reports that the high-tensile fibre rope is extremely wear-resistant and can withstand a high number of bending cycles. Having a service life four times that of steel rope helps reduce the number of rope changes required over the rope's lifetime, Liebherr says.

When the rope reaches the end of its service life, this is indicated via a change in the colour of its jacket and Liebherr says the fibre rope can also withstand multiple notches without suffering immediate damage.

The winding pattern of the new fibre rope is similar to that of a steel rope, Liebherr explains. It says, however, that in the event of the lower layers having less tension than the upper ones, then the new fibre rope is more tolerant than steel. In the event of notching, it will free itself Liebherr claims.

To achieve the controlled wear of the fibre rope, Liebherr used a Lebus winding system throughout development. According to Liebherr, the Lebus system provides a





Lankhorst is working to develop the offshore fibre sling market in South East Asia. Its heavy lift slings have also received DNVGL approval

clean winding pattern on the cable drum, minimising wear and extending service life.

Test bed centre

Like Liebherr, another company to utilise a test bed to develop its portfolio is Maine, USA-based custom and specialty rope manufacturer Yale Cordage, which acquired the Sahm Splice test bed centre in mid-2018. Yale Cordage says the acquisition now gives it the capacity for destructive and non-destructive testing of synthetic rope, wire rope, shackles, chain, and slings up to 1,300,000 pounds (600 tonnes) in tensile strength. The test bed also has a low-range capacity up to 250,000 pounds (110 tonnes).

With a maximum test sample length of 116 feet (35 m), and a 15 foot (4.6 m) stroke, Yale Cordage claims it is one of the largest and most capable test beds in the eastern USA and that having it means a big reduction in delivery times for its synthetic Fortis heavy-lift slings and Loup sling loops.

"We're pretty excited to have taken delivery of the largest test bed on the East Coast of the USA," comments Tom Yale, CEO of Yale Cordage. "Yale cordage is principally about replacing wire rope in the marketplace. Our Fortis synthetic slings are very tough. Every heavy lift sling we produce needs to be proof loaded. We do that to twice the rated working load."

Now that Yale Cordage has the test bed, it says it will continue to produce Loups and Fortis slings to order, but it also now stocks commonly used lengths and capacities.

Wire rope demand

Despite the rise of synthetic rope, however, demand for wire rope still remains strong, as demonstrated by the opening of a distribution centre in Portland, Oregon, USA, by wire rope

manufacturer WireCo WorldGroup. According to WireCo, the new facility is strategically located to handle the wire rope needs of its customers across the northwestern United States. The Portland centre maintains inventory to improve availability and reduce delivery time throughout the service area, WireCo says.

The manager of the new distribution centre is Alisa Glazier. She previously worked for WireCo at its Beaverton, Oregon, facility, and was the assistant manager of WireCo's Houston distribution centre.

John Embray, vice president sales at WireCo, comments, "We are excited to return to servicing our customers from a WireCo-



managed facility. This new distribution centre will allow us to service our West Coast customers in a more timely manner."

Market development

WireCo WorldGroup subsidiary, Dutch synthetic and steel wire rope manufacturer Lankhorst Ropes, has announced a co-operation agreement as of the end of November 2018 with Singapore-based rigging and mooring equipment specialist Franklin Offshore International. Franklin is currently one of world's largest steel wire rope fabricators; however, the co-operation agreement is aimed at developing the market for fibre rope slings for heavy lift offshore projects in South East Asia.

According to Lankhorst, as offshore contractors look for ways to maximise their vessel's crane lift capacity, fibre rope slings can provide a more practical and cost-effective alternative to steel wire ropes. Lankhorst says Franklin Offshore is currently one of world's largest steel wire rope fabricators and, under the agreement, Franklin Offshore becomes the sole and exclusive distributor and representative to sell and distribute Lankhorst Ropes' heavy

»

MANITOWOC GERMANY RECEIVES WIRE ROPE TRAINING

Employees at Manitowoc Crane Group Germany have received wire rope training from crane and mining rope manufacturer Casar. The training took place at Manitowoc's Crane Care training centre in Wilhelmshaven and covered: national and international standards; the principles of rope technology; the handling, maintenance and installation of wire ropes; wire rope inspection; and identifying causes of wire rope damage.

The training session was aimed at employees from the purchasing and technical support departments, as well as Manitowoc trainers (who go on to train other Manitowoc employees across the world). Training was conducted by Casar service technician Harald Philipp and supported by Jens Weis, an engineer from Casar's research and development department. The session was led by Manitowoc's training centre manager Gerald Maderer.

According to Casar, the training was very well received and there are plans to repeat it every two years.



Casar training at Manitowoc Germany

RETHINK COLLABORATION

Let's create the future together

Working closely with you and using our application engineering approach to customize solutions to your specific challenges is just one of the many ways that we're rethinking collaboration so we can continue to succeed together.

Come to bauma 2019 and see how we're continuing to rethink collaboration.

NEWS FROM SAMSON ROPE TECHNOLOGIES

USA-based rope manufacturer Samson Rope Technologies has appointed a new senior member of staff and launched a new website.

At the end of 2018 the company announced the appointment of **KRIS VOLPENHEIN** as vice president of research and development. Volpenhein has been a Samson employee for the last 12 years. His roles have included applications engineer, engineering manager, Asia-Pacific sales manager, and, most recently, as director of technical services.

Second, Samson Rope says its newly redesigned website is simpler and faster to use. The company says the website has been built from the ground up and utilises the latest design features. It can be found here: www.samsonrope.com



lift synthetic rope slings in South East Asia.

"As a leading supplier of steel wire slings for many years, we recognise that recent developments in fibre rope slings by Lankhorst Ropes now make it a viable alternative to steel wire in those projects where the self-weight of the wire is too much for the vessel's crane," says Angie Tang, CEO, Franklin Offshore International. "Working with Lankhorst gives us access to not only market leading, high performance fibre slings but the technical know-how to assist our in-house team in developing fibre sling heavy lift systems here in South East Asia."

According to Lankhorst, the two companies are already evaluating a number of offshore projects involving Lankoforce slings. Its Lankoforce HL range of heavy lift slings have a minimum breaking load (MBL) of around



Cortland Company slings were used to lift a 500 tonne tunnel boring machine in Ohio, USA

2,000 tonnes in single leg configuration and 3,200 tonnes in an endless configuration.

Lankhorst has also received DNVGL Approval of Manufacture (AoM) for its heavy lift slings. It says it is the first fibre rope manufacturer to achieve this and it believes that the DNVGL-CP-0173 Offshore Fibre Ropes certification is an important stepping stone in the wider market acceptance of heavy lift, fibre rope slings.

The AoM means that Lankhorst's sling production process complies with the strict requirements for E303 certification.

According to Rui Pedro Faria, senior research and development engineer, Lankhorst Euronete Portugal, "There is no specific standard for synthetic lifting slings, which is why we are taking a 'New Technology Qualification' approach. Even if the customer does not want full E303 certification, the AoM guarantees that the product is made correctly and in accordance with the highest quality standards."

Heavy lifts

Synthetic ropes and slings are increasingly being used as part of very heavy lifts. For example, slings developed by the Cortland Company in the USA were recently used in Ohio to lift a 500 tonne tunnel boring machine from a heavy haul trailer.

Plasma 12 by 12 rope slings were used to safely elevate and transfer the machine underground. According to the Cortland Company, the strength and elastic properties of the Plasma 12 by 12 slings comes from a load-controlled process of precise braiding, which is subject to destructive testing prior to deployment.

The synthetic slings were spliced into custom lengths of 63 feet (19 m), with each section weighing 135 pounds (61 kg). In comparison, the same length of steel rope would be at least seven times that weight – around 1,045 pounds (474 kg) – says Cortland. The slings also had a minimum breaking strength of 780,000 pounds (354 tonnes), equal to that of steel.

According to Cortland, the Ohio tunnel boring lift also demonstrated the ease of handling of synthetic slings, which it says are about half the size of bulky round slings. They have a stretch load limit of one per cent – again equivalent to that of steel, the Cortland Company adds.

"When used properly and in-line with specialist advice, a synthetic sling offers a viable alternative to wire rope, which has been the standard option across industries for many decades," said Brooks Nunley, technical sales manager at the Cortland Company. "As well as being easier to handle, intensive testing ensures they are tough enough to perform and withstand any challenging lift and transfer operation."

ATTRACTION OF TUBULAR SLINGS

Spanish hook manufacturer Elebia has developed a synthetic sling that you can thread wire rope through. The sling designed to aid automatic pickup via Elebia's automatic lifting hooks.

Elebia used two Evo5 automatic lifting hooks with tubular slings and wire rope to lift galvanised steel boxes. The steel boxes were grouped into blocks of nine, with each block weighing approximately one tonne. The blocks of boxes were then setup with the tubular slings at both ends. Metal wire rope was fed through the nylon-coated Elebia slings and a magnet that comprises part of the hook attracted the wire rope inside the sling, resulting in automatic engagement. Each sling has a capacity of three tonnes, although they can be customised in terms of load limit and length. According to Elebia, the remote engage and release helps keep the operator safe.

A video of the system in action can be seen at: <https://bit.ly/2sTSvQg>



The Elebia tubular sling

Great capacity! Great reach! 2 overflow loads!

175|AT

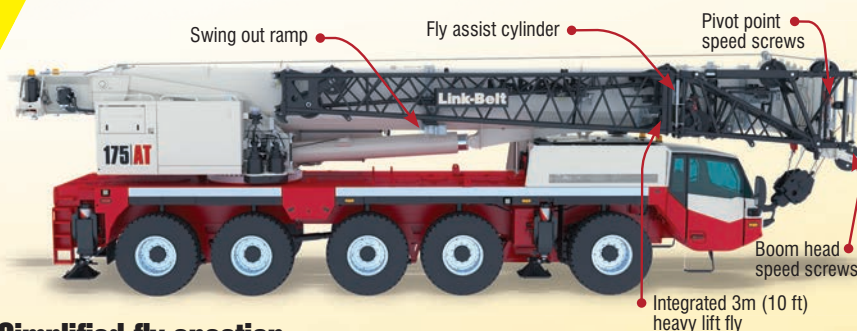
150 mt All Terrain Crane

- 13-60.1m SIX SECTION PIN AND LATCH BOOM
- ALL NEW OPERATOR AND DRIVER CABS
- HIGHLY MANEUVERABLE, COMPACT 5-AXLE DESIGN
- CLASS-LEADING 15-LITER DISPLACEMENT ENGINE



- 81 V-CALC outrigger positions
- Real-time 360° charts
- Live capacity preview mode
- Outrigger position sensing
- Incorporated swing arrest

VISIT OUR BOOTH FS: 903/3
bauma
APRIL 8-14, 2019 MUNICH

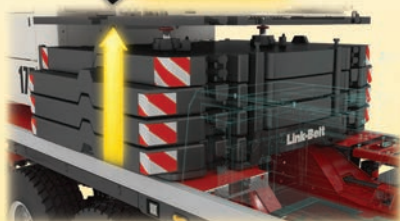


Simplified fly erection

- Efficient one-man operation
- Limited ladder climbs
- Reduced exposure to work-at-height

Efficient use of the overflow loads saves money

- Efficient boom over the front and dolly configuration transport proposals for all markets
- Only two overflow loads to get all counterweights and attachment to the job



"CDS" Counterweight Detection System

- Pulse 2.0 automatically detects the amount of counterweight and selects the appropriate configuration.
- PULSE 2.0 prompts the operator to verify the selected counterweight configuration.
- Discrepancies between operator selection and PULSE 2.0 detection result in configuration mismatch on the RCL.

Link-Belt

CRANES

Lexington, Kentucky, USA | www.linkbelt.com

You Tube
Link-Belt Cranes

f Like us on
Facebook
Link-Belt Cranes

t @LinkBeltCranes



WORLD LEADERS IN TAILORED TOWER CRANE MANUFACTURING

J780PA

Max. Load: 75t

simply excellent cranes



**TOWER[®]
CRANES**

JASO TOWER CRANES

Ctra. Madrid-Irún, Km 415
20213 Idiazabal (Gipuzkoa) • Spain
T. (+34) 943 187 000
E. jaso@jaso.com

VISIT US AT:

bauma

APRIL 8-14, 2019, MUNICH

STAND FS/1003/8
OUTDOOR

Follow us at:

www.jaso.com



JASO GROUP[®]

Dismantling German nuclear power plants

A wave of nuclear power decommissioning related work is being carried out across Germany. Here we look at how Innokran dismantled a nuclear power plant in southern Germany.

CHRISTIAN SHELTON reports

German crane specialist Innokran has installed crane systems from German manufacturer Stahl CraneSystems to help dismantle a nuclear power station in Philippsburg, in the state of Baden-Württemberg, Germany.

The job comes as a result of the 13th amendment of the Atomic Energy Act, which was passed in the summer of 2011. The Act saw a move away from use of nuclear power as a source of energy in Germany, with the government aiming to



The power lines for the SHWF 8 winch and the auxiliary winch run in an energy chain

decommission all nuclear power stations in the country by the end of 2022.

According to Innokran, this has proved a fruitful source of work for the company. "We completed our first job in the power

plant sector back in 2012 and have continuously expanded our experience in this field since then," explains Christoph Fischer, managing director of Innokran.

Dismantling commences

Located on the river Rhine, approximately 30 km south of Mannheim, the Philippsburg nuclear power plant (NPP) is operated by German electric utilities company EnBW. EnBW first contacted Innokran, which is a

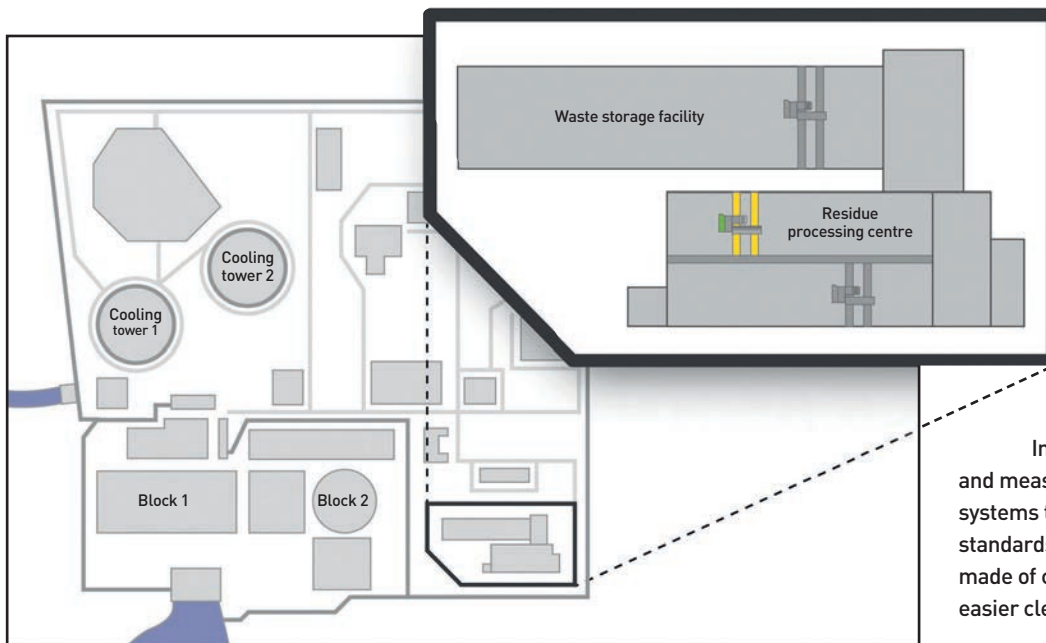
»

(Left) The second hoist brake is an additional double-shoe brake with an external brake spring



“ We completed our first job in the power plant sector back in 2012 and have continuously expanded our experience in this field ”

CHRISTOPH FISCHER,
Innokran managing director



A diagram outlining the location of the Stahl SHWF 8 winch at the Philippsburg NPP

are protected in an energy chain. When the load moves downwards, the generator-generated energy is converted into heat by the braking resistance and released into the environment via convection.

In addition, the systems' brakes and measuring systems have redundancy systems to comply with industry safety standards. The system's switch cabinet is made of corrosion-free stainless steel for easier cleaning.

'certified partner' with Stahl, back in January 2017 and dismantling of the plant's boiling water reactor in Unit 1 (NPP 1) started in May 2017.

The pressurised water reactor in Unit 2 (NPP 2) is also approaching the end of its operating life and will be shut down by the end of 2019.

The radioactive spent fuel elements of the two reactors are being stored at an interim storage facility in the NPP and are not affected by the dismantling process.

The size of the infrastructure to be

dismantled was considerable. Stahl says the total mass of NPP 1 was approximately 398,000 tonnes, and NPP 2 is approximately 783,000 tonnes.

Up to 98 % of the total mass can be recovered, with between 1 to 3 % having low to medium-level radioactive residues. To treat these radioactive parts, EnBW has built a residue processing centre (RPC) and a waste storage facility (WSF), where the radioactive waste is being stored until a permanent disposal site is ready.

At the RPC and WSF Innokran installed a Stahl CraneSystems frequency-controlled SHWF 8 winch with a lifting capacity of 32 tonnes on a double girder overhead travelling crane with a span of 20 metres.

According to Stahl, the SHWF 8 winch is being used with a continuously variable lifting speed range between 0 to 4 m/min.

Auxiliary hoist

An auxiliary SHF 50 hoist with a lifting capacity of 5 tonnes has also been installed.

The power supply lines for the hoists

Documentation challenges

"The biggest challenge with such a plant is the complete documentation of all work processes – also those of supplier companies," states Fischer. "EnBW attaches great importance to this."

This documentation encompassed stamping steel components to ensure traceability and the inspection of all welds by an external assessor.

EnBW is constructing a similar residue processing centre and waste storage facility at a NPP site in Neckarwestheim where it will install more Innokran crane systems. ■

“ The biggest challenge with such a plant is the complete documentation of all work processes – also those of supplier companies ”



The switch cabinet is made of corrosion-free stainless steel





True satisfaction for all

We will always be committed to forging even stronger ties with all our customers and “delivering true satisfaction,” to enhance the lifestyles, cultures and societies of people around the world. Rising to a new heights with a new brand.

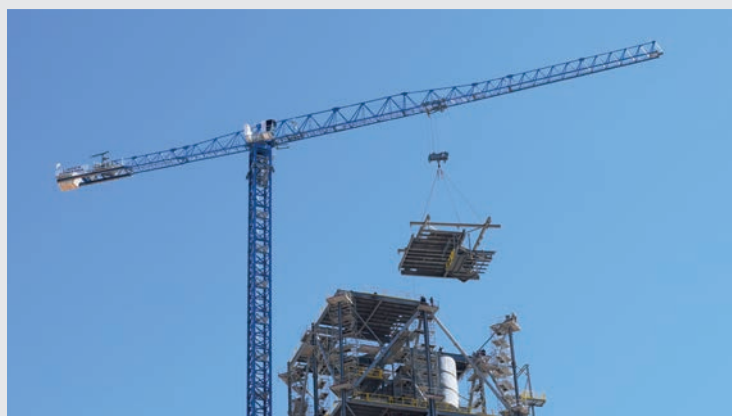
bauma 2019
APRIL 8–14, 2019, MUNICH

Hall F5 Stand 903/3



SCX 2800A-3 **SCX 1500A-3**

★★★★★
VISIT US AT
bauma
BOOTH FS.1103/1



**AN EXTENSIVE RANGE
OF TOWER CRANES,
SUITABLE FOR ALL
TYPES OF
CONSTRUCTION
PROJECTS**

OVER 50 YEARS
of experience designing,
manufacturing, supplying
and offering support
services for tower cranes for
construction.

+20,000 CRANES
manufactured by COMANSA

**COMMITTED
TO LIFTING
EVOLUTION**

COMANSA.COM

ASIA
Hangzhou - P.R. China
+86 571 8299 5555
sales@comansacm.com.cn

INTERNATIONAL HQ
Huarte - Spain
+34 948 33 50 20
export@comansa.com

NORTH AMERICA
Pineville (NC) - USA
+1 800 589 7980
sales@lccranes.com



Historic year ahead

In his job as ESTA president, David Collett is upbeat about prospects in what could be a historic year for the European association and the industry it serves. ICST reports

David Collett is president of the European Association of Abnormal Road Transport and Mobile Cranes – ESTA – and he is managing director at specialized transport company the Collett Group in the UK. He talked to ICST about what is coming up in 2019 for the association and similarly for the industry.

WHY IS 2019 AN IMPORTANT YEAR FOR ESTA?

This year is probably going to be one of the most notable since the European Association of Abnormal Road Transport and Mobile Cranes (ESTA) was formed more than 40 years ago. To be clear, the industry is not going to see ESTA change radically overnight. None of us on the ESTA Board have a magic wand. But we are engaged in an ongoing process of significant and important developments. Steadily and methodically, we are building on our successes, expanding our influence, making new contacts, adopting an ever-higher profile and, in the coming months, we hope that several major projects will come to fruition.

As always, central to our philosophy and all our work is safety. We are continually looking at how our industry's practices can be improved, and how we can work as effectively as possible with our clients and suppliers.

Within that general approach, there's a range of different and important projects, all of which, if successful, will improve the safety and efficiency of the industry. Three major examples are: the European Crane Operator Licence; the new best practice guide

for the safe transport and erection of onshore wind turbines; and our ongoing campaigns to harmonise heavy transport and abnormal load regulations and create heavy transport corridors across Europe.

HOW DO YOU SEE THE STATE OF THE WIDER MARKET, ESPECIALLY GIVEN THE POLITICAL UNCERTAINTIES?

Our clients need certainty if they are to invest, so the global political and economic upheavals at present can only be a cause for concern. Being from the UK, I am acutely aware of this and at the time of writing it was not at all clear how the Brexit issue would be resolved.

In addition, in the UK we are seeing doubts about the future of some major schemes. Hitachi have pulled out of the Wylfa nuclear power station project and a number of politicians are raising concerns about the cost of HS2, the new high-speed railway line. What is more, we have seen some major European companies focusing on other parts of the world, not Europe or the UK. I think we are in a period of 'wait and see'. The next six months are going to be very important for Europe as a whole, and the UK in particular.

LOW MARGINS HAVE BEEN A PROBLEM FOR ESTA MEMBERS FOR MANY YEARS NOW.

HOW CAN THEY BE IMPROVED?

Margins have been an issue for a long time. The industry is simply not as profitable as it should be and that impacts our ability to invest and to train the next generation.

One of the problems is that in the past many clients did not understand what we do.

In my more optimistic moments, I think that is beginning to change. I have seen some signs that transport is moving up the agendas of our clients as they realise that it is a fundamental part of the planning of any project.

Obviously, the earlier we as an industry are involved in the process, the safer and more efficient that project is likely to be. As I said, I think we are seeing signs of change in that regard – I hope I am right.

We work in a tough market in a tough industry and I do not believe that there is any simple solution to the issue of low margins. It is all about making small gains to steadily improve our performance, increase our efficiency and professionalism and make sure that our clients understand that cheapest is often not the best value.

HOW ARE PLANS FOR THE EUROPEAN CRANE OPERATORS LICENCE BEING RECEIVED BY THE INDUSTRY AND YOUR CLIENTS?

ECOL is without doubt the biggest and most complex project ESTA has ever undertaken. ESTA director Ton Klijn and the ECOL working group deserve a huge thanks from the entire industry. It has already been a fantastic achievement to get it to the stage it is at today.

We are now in the position where the final trials are being conducted and support for the project is growing among the crane manufacturers, among ESTA's member associations and among major European and global companies, for example, Mammoet and Sarens. The focus now is garnering support among our industry's major clients – especially in the oil and gas, wind energy and major construction sectors. The signs are already good with strong expressions of interest from many companies. One client told us, 'My industry needs operators we know are properly qualified. Across Europe, it would be so much easier – and safer – if there was a clear and common language and understanding of the qualifications and skills required to operate a crane.'

SAFETY DURING THE TRANSPORT AND ERECTION OF ONSHORE WIND TURBINES HAS BEEN A GROWING CONCERN AMONG ESTA MEMBERS. HOW ARE PLANS FOR A NEW BEST PRACTICE GUIDE PROGRESSING?

We are a little behind schedule, but not by much, and only because of problems

“ The industry is simply not as profitable as it should be and that impacts our ability to invest and to train the next generation. ”

DAVID COLLETT,
President of ESTA
and managing director
at the Collett Group



JOIN ESTA IN MUNICH



Winners of the 2018 ESTA Awards

Networking remains central to ESTA and its members – through the section meetings in the spring and autumn and the hugely successful annual awards run jointly with International Cranes and Specialized Transport magazine.

David Collett says they are the best networking events for the whole European mobile crane and heavy transport industries and, through the awards themselves, a chance to celebrate some outstanding companies and projects.

"If you have not been involved before, I strongly suggest you come along," Collett concludes. See ESTA and KHL websites.

arranging meetings, not because of any fundamental disagreements. We should have the first draft ready before the summer.

This is another project that has taken a huge amount of effort and commitment. Importantly, it has had the active support of many of the wind turbine manufacturers themselves through the involvement of VDMA Power Systems, part of the German engineering federation.

As readers will know, safety concerns have been growing among our members with the development of bigger turbines with greater hub heights and the increasing use of hard-to-access sites with difficult ground conditions. To get the debate going, we held a series of conferences in Hamburg which were the springboard for moves to produce a new best practice guide.

Today, the scope of the document has been agreed, a lot of the engineering work has been done and our next meeting with our colleagues at the turbine manufacturers should see us take another big step forward.

ESTA, the crane manufacturer members of FEM and VDMA Power Systems, plans to produce a core best practice document, backed up by other more detailed technical guidance documents, for example, the FEM 5.016 Guideline – Safety Issues in Wind Turbine Installation and Transportation (EN – 2017). The guidelines are expected to include subjects that include common



Collett & Sons using its 550 tonne capacity Scheuerle girder bridge in a 66 metre long combination

dimensions and standards for access roads, contractual considerations for operating companies and the methods of calculating the ground bearing pressure and construction features for crane pads. We are getting there. The first draft should be out soon and the final document later this year.

ESTA'S TRANSPORT MEMBERS HAVE LONG BEEN FRUSTRATED BY THE NUMBER OF PETTY AND DIFFERENT REGULATIONS ACROSS EUROPE, ALONG WITH THE POOR STATE OF THE CONTINENT'S INFRASTRUCTURE. ARE THERE ANY SIGNS OF IMPROVEMENT?

It is a slow process but we are making progress. We are working to raise our profile and influence with the European Commission and international road transport authorities. Last year we joined the international road transport industry association (IRU) to help us in that aim and we will be taking any opportunity to lobby authorities directly whenever the chance arises.

We have launched an initiative to persuade European authorities to harmonise standards governing lighting and marking on heavy transport. The 11-strong group behind the work is chaired jointly by ESTA's Section Transport president André Friderici, technical director at Friderici Special and vice president Iffet Türken, executive board member of Kässbohrer. They have been collecting and analysing information about the current rules in force across Europe on cargo and vehicle marking, rotating beacons, side marker lighting and conspicuity marking. At the same time, they have started drafting what a common ESTA position might look like with the aim of eventually lobbying national associations and their governments to amend their current rules and regulations, creating a common European position. There will be more news on this work in the near future.

In addition, we will have another go at persuading more authorities to adopt the European Best Practice Guidelines for Abnormal Road Transport, first published in a European Commission Transport Directive

back in 2005. The directive contains SERT, the Special European Registration for Trucks and Trailers, and was intended to reduce paperwork and bureaucracy.

Finally, we are pressing the European Union and other transport authorities to agree heavy transport corridors throughout Europe. At the request of NATO, the EU is already looking at plans to help military equipment move around more easily and we hope that these routes will be open to heavy transport.

I have long said that from the point of view of many ESTA members the single market is more fiction than fact, such is the huge variety of different regulations we have to deal with and the poor state of much infrastructure.

It is a situation we have been campaigning on for many years. There is a huge amount of work underway and these are not battles that can be won overnight – but I am sure that in the end we will prevail. ■

A CALL FOR NEW MEMBERS

David Collett has issued a call for new members, "I would like to make a direct appeal to all companies in our industry to join us in our work by signing up as an ESTA supporter.

"The reasoning is simple. I believe that being active in ESTA is a very valuable experience. And the more supporters we have, the more resources we have, and the more we can achieve on behalf of the industry as a whole.

"I am sure that the networking and contacts you make will help you professionally and in your business, and being involved in ESTA gives you a voice on the European issues affecting the industry today. Go to our website at www.estaeurope.eu for more details and to find out if your company is eligible, or contact the ESTA main office."



Modulift®

working between the hook and the load

Your partner for standard and custom designed manufactured lifting equipment

- Modular Spreader Beams up to 600t in stock and available worldwide for distribution
- Modular Spreader Beams for 6–5000t and spans up to 100m/330ft
- Adjustable Lifting/ Spreader beams stocked as a boxed product for immediate shipping
- Load Monitoring Spreader Beams with an integrated Load Cell giving you instant wireless data logging
- Experts in custom designed and manufactured lifting equipment and projects requiring high QA standards
- All MOD beams are fully tested and certified with DNV Type approval as standard

Spreader Beams



Adjustable Lifting/ Spreader Beams



Load Monitoring Spreader Beams



Trunnion Spreader Beams



Spreader & Lifting Frames



For more information contact

+44 (0)1202 621511
sales@modulift.com
www.modulift.com



bauma On your marks

EVENT DETAILS

WHAT:

Bauma 2019

WHERE:

Messe München trade fair centre,
Munich, Germany

WHEN:

Monday 8 to Sunday 14 April 2019

OPENING HOURS:

Monday to Friday 09.30 to 18.30

Saturday 08.30 to 18.30

Sunday 09.30 to 16.30

www.bauma.de

The new floor plan for the show, which will be held in Munich, Germany, in April

Start preparing for the Bauma construction show now. A visit to Germany for this vast event would be worth it for anyone with even a passing interest in the industry. ICST reports

Not only is it the biggest construction show in the world, it is the world's largest trade fair of any kind.

This will be the 32nd iteration of the trade fair for construction machinery, building material machines, mining machines, construction vehicles and construction equipment. It is difficult to convey to anyone who has not attended a Bauma in Munich just how enormous it is and how important it is to the industry.

Growth has been huge, even since the last one in 2016. With the addition of two more

halls and an optimised layout planning of the outdoor areas, the 2019 show will cover 614,000 square metres, up 1.5 per cent from 605,000 m² last time.

Bauma organiser, Messe München, also expects more visitors than the 583,736 at the last show. More than 5,500 exhibitors from 55 countries will be showing their latest wares.

Digitalisation

A dominant topic in the general construction industry is digitalisation and this will make its mark at the 2019 show. Cloud-based infrastructure, digital services portfolios and security solutions will all be on view. Bauma promises that the world's leading manufacturers will present their developments and offer discussion on the opportunities and challenges that new technologies offer.

Commenting on the subject, Mareile Kästner, exhibition director, said, "The digitalisation of the construction industry is becoming increasingly important. Many construction machines are already equipped with communication interfaces that provide comprehensive data, for example, on location and [fuel] consumption."

Kästner said visitors would be able to find out about technologies like the co-ordination of activities on several construction sites, perhaps located thousands of miles apart, as well as controlling and managing construction site vehicles.



FACTS AND FIGURES

The 2019 event will be larger than the last one in 2016 which will again be a new record. Bauma 2016 in numbers:

605,000

square metres of exhibition space

3,425 exhibitors
from **58** countries

583,763 visitors
from **219** countries.

Two new halls have been added to the Bauma show and there is some additional outside space





Well over half a million visitors attended Bauma 2016

Another element of the event is the Bauma Forum where exhibitors, trade associations and partners present the latest product developments, trends and market analyses in presentations, press conferences and panel discussions. The Forum will be in Hall C2 and is free of charge.

A major emerging trend highlighted this year will be alternative power systems for construction machinery. Electromobility and driverless vehicles in particular are important in the industry's future. Manufacturers will showcase their developments while discussing opportunities and challenges presented by new technology and demands for less environmental pollution.

Kästner said, "We won't only be showcasing the diverse range of possible applications of leading exhibitors' products but also providing a platform for discussing the aims, potential and sustainability of new technology."

More and more construction machinery manufacturers are upgrading their smaller machines in the lower power range with electric drives. Interest is also growing in hybrid vehicles and it will be exciting to get the latest on this at the show.

CHANGES

Mareile Kästner, exhibition director at show organiser Messe München, talked to Sandy Guthrie, editor of ICST sister magazine Construction Europe, about some major changes to the 2019 Bauma

As Kästner explained, for a start, there are new halls which will be open for the first time. She commented, "The construction of the new halls C5 and C6 marks the completion of the original plans for the Munich trade fair site. This strategic decision by Messe München also influences the planning for Bauma, a trade fair that spreads across the entire fairground."

As a result of the two new halls, the open-air exhibition ground area in the centre is being eliminated. The area used for components is being expanded to five halls. "We decided to add a hall to this area (hall A2/orange) because the waiting list was very long in the past, particularly in the component area, and many exhibitors in these halls needed more space. We will use the second hall for the classic Bauma area of construction machinery and accessory equipment as a way of offsetting the loss of the open-air exhibition ground area with hall space."

This will mean transferring open-air exhibitors to the hall and making a small change in the exhibitor areas will be made in the process.

The former hall B3 (construction machinery and accessory equipment) has been integrated into halls B5 and C5. The hall freed up by this move will be used by frameworks and scaffolding, which is a transfer from A2, and will make room for the additional component hall in A2.

Kästner said steps were being taken simultaneously to cover the loss of the open-air exhibition area that will serve as the site of the two new halls. First, there is the transfer of exhibitors from the open-air exhibition ground area to the hall. Then there has been an expansion of the open-air exhibition ground area F5 north of the new C5. Also, there has been an expansion of the open-air exhibition ground area North, and more efficient use of the existing space.

"As part of this work," she said, "we have already spoken with several exhibitors about reduced exhibition space. This was done in consideration of position and space needs. Our priority was to provide our customers with the necessary background information and to come up with a joint solution. During many conversations, we outlined the most important points in the respective case and

focused on carrying them out."

One particularly important change, according to Kästner, is the enlarged exhibition area for construction machinery and accessory equipment on the open-air exhibition ground area North directly on Bauma Boulevard.

Kästner said, "Many of our exhibitors on the open-air exhibition ground area North, Centre and F5 are basing their trade fair planning on a new position and new booth design. Because such a broad number of changes are rarely made, the key anchors for future Baumas have now been put in place."

The new layout planning will be a major issue to be covered in visitor communication, she added. "Our fairgrounds plan provides new orientation, something that is also facilitated by the colour code and icons." Messe München is also drawing on various aspects of digital media, including a video about the new layout, and exhibitor media that display the hall layouts and booth positions of each exhibitor.

"A key factor will be the sign system used on site. It will help visitors easily find their way around the fairgrounds. The Bauma app also helps visitors find the booth they are looking for," Kästner added.

A large number of exhibitors of construction machinery and accessory equipment (the yellow section on the fairgrounds map) in the halls and in the open-air exhibition ground area will have a new position.



Mareile Kästner



WORLD PREMIERE

The new 130 t telescopic crawler



OPEN-AIR AREA FM 712

Visit us at the
#greenheartofbauma

bauma APRIL 8 - 14 MUNICH



Telehandler
5,5 t

Balancer
130-300 t

Material Handling
17-390 t

Duty Cycle Crane
13,5-300 t

Crawler Crane
50-300 t

Telescopic Crane
16-130 t

Mobile Harbour Crane
300 t



Bernhard Kraus



SENNEBOGEN
Maschinenfabrik GmbH

Sennebogenstraße 10
94315 Straubing, Germany

➔ bernhard.kraus@sennebogen.de

SENNEBOGEN

Fully extended
Goldhofer Vantum
trailer for Enercon

Enercon chooses Goldhofer

German wind energy company Enercon has added six flatbed semitrailers from Goldhofer to its heavy haulage fleet.

The Vantum trailers are for transporting rotor blades more than 70 metres long. They have pendular axles and a five-section telescopic deck with a fully extended length, including the gooseneck, of 72 m. A rail-mounted BladeX lifter for the tip of the blade can also be specified.

"The new Goldhofer Vantum flatbed semitrailers enable us to master all the

challenges of long-distance journeys with these exceptional loads," said Hans-Dieter Kettwig and Simon-Hermann Wobben, Enercon managing directors.

Vantum was the first five-fold extendible semi-trailer on the market, Goldhofer said. Its pendular axles are designed to allow "fast and safe passage over bridges and round tight bends and roundabouts as well as easy manoeuvring on confined construction sites," claimed Goldhofer. The hydraulic gooseneck can be lowered so rotor blades with large hubs can negotiate tunnels and underpasses.

Loading height is 1,250 mm and the pendular axles have a suspension stroke of +/-300 mm. For extra ground clearance two support legs facilitate extension and retraction of telescopic tubes which mean the deck behind the gooseneck can be extended from 13.5 m for empty running to more than 68 m.

Its adjustable steering lets the vehicle be driven at its 13.5 m basic length without a second person in the cab. Rainer Auerbacher, Goldhofer board member and head of

transport technology, said, "With a steering angle of up to 60 degrees and the user-friendly SmartControl remote control system, Goldhofer provides outstanding support for drivers in their task of safely transporting loads of this enormous size to their final destination."

TALBERT TO BUILD MILITARY MOVERS

Heavy haul trailer and specialized transport equipment manufacturer Talbert Manufacturing has secured a US\$360.2 million contract from the US Army.

USA-based Talbert will produce M872A4 semitrailers and related materials. Work is scheduled to finish in five years, on 16 January 2024. Army Contracting Command will determine funds and location details with each order under the firm-fixed-price contract, according to the US Department of Defense.

The M872A4 is designed to handle large containers and breakbulk cargo.

FAYMONVILLE ACQUIRES STÜRZER



The 2,500 m² servicing workshop in Bavaria

Luxembourg-headquartered specialized transport equipment manufacturer Faymonville Group took over commercial vehicle dealer Stürzer Heavy Trucks on 2 January 2019. It resulted in the creation of Faymonville Trade and Services, headquartered at the former Stürzer site in Landsberg am Lech, southwestern Bavaria, Germany. Faymonville said this will extend its presence in south Germany, Austria and Switzerland.

The newly created company will become a hub for sales of specialist vehicles from the Faymonville Group's Faymonville, Max Trailer, and Cometto brands. Heavy-duty tractor units from other manufacturers will also be available.

Vehicle servicing will also be carried out at the 2,500 square metre workshop in Landsberg am Lech, with vehicle leasing and finance packages available, too, added Faymonville.

Mammoet transports giant splitter vessel

International heavy lift and transport specialist Mammoet transported a splitter vessel weighing more than 800 tons (725 tonnes) in Canada.

According to Mammoet, the 300-foot-long load was the biggest load to date to be moved on the highways of Alberta. It was moved from its construction site in Edmonton to Fort Saskatchewan – a distance of around 25 km. The journey took three days and the splitter was moved using six trucks for pushing and pulling, and two double-26 Scheuerle Intercombi trailer lines.

The splitter vessel will be used at the \$3.5 billion Heartland petrochemical complex, owned by petroleum transportation, storage

and natural gas liquids processing business Inter Pipeline. Once complete the complex will convert propane into polypropylene recyclable plastic pellets which will then be used to make items such as computers, medical equipment and food storage containers.

The splitter weighed
725 tonnes



Double challenge for MONPE

MONPE Ventures combined its orange ModulMax axle lines from Faymonville for a job in Ghana to move a huge suction pile.

MONPE Ventures is a specialised transport



MONPE Ventures moving a 125 tonne suction pile on Faymonville axle lines

and heavy haul contractor operating in Ghana since 2005. Commenting on the project, Peter Everett from MONPE Ventures, said, "When I first got the request to move the suction pile in a vertical position, I was sceptical; I had seen this been done before but much smaller."

This suction pile was 8 metres in diameter, 16 m high and weighed 125 tonnes. For the transport configuration, 16 Faymonville modular axle lines were assembled side-by-side in a four-file configuration.

Everett explained how MONPE worked with Faymonville, "Their engineers came up with this solution. At first, the tipping limits were barely acceptable, so we added 44 tonne counterweights, which reduced the height of the centre of gravity a lot and thereby extremely improved these values."

The piece was fabricated by Belmet 7 inside Takoradi Port. MONPE transported it 3 km to the quayside. Everett continued,

"There are chambers and ruts on the road, but it was extremely stable. The client was so impressed that a local company had the equipment and support from the manufacturer to do such a job."

At the quayside, it was loaded on a vessel to be dropped on the sea bed for use as an anchor for the FPSO oil production and storage vessel in the Ghana oil and gas fields.

Prior to starting work the MONPE Ventures team received full practical training provided by Faymonville.



On 6 January the 41st Dakar Rally started from Magdalena Beach in Lima, Peru.

More than 100,000 supporters gathered to give the competitors an enthusiastic send-off. The rally is known for being tough on competitors and vehicles alike. It covers 5,000 kilometres, 3,000 of which are races, through Peru from Lima down to Tacna and back to Pisco. The first of 11 days of endurance racing was in the 'Sandbox of Peru' – 84 km of dunes and tough terrain from Lima to Pisco. The MAMMOET Rallysport entry for 2019 was two Renault trucks. In the first was driver Martin van den Brink, navigator Wouter de Graaff and mechanic Mitchel van den Brink. In the second was driver Janus van Kasteren, accompanied by navigator Erwin van den Bosch and mechanic Frank van Hoof.

Ferns aims to increase safety with new trucks

Having a better view of something is likely to improve safety. To this end, utilities contractor Ferns Surfacing in the United Kingdom has added two new Mercedes-Benz Eonic trucks to its fleet.

The 32 tonne tippers with Epsilon grab cranes were put to work on reinstatement and road resurfacing duty in and around London. The Eonic series has low cabs with a deep panoramic windscreens and fully glazed passenger doors, designed to give the driver a better view of pedestrians, cyclists and so on in congested city streets.

The Eonic 3235L ENA models have single front steer axles, double-drive bogies and

rear-steer axles. Power is from a 7.7 litre six-cylinder diesel engine producing 260 kW. It drives through a six-speed Allison automatic gearbox. The Epsilon M125L cranes have clamshell buckets and offer a maximum outreach of 8.2 metres.

Additional safety features include audible left-turn alarms and all-round CCTV to help drivers with images of both sides and the rear. Ferns said it anticipates adding up to 10 more over the next year for its London operations.



Mercedes-Benz Eonic 3235 with Epsilon crane

VOLVO MARKS AYLESTONE CENTENARY

A Volvo tractor unit has joined the fleet of Aylestone Transport to mark a 100 years of operation for the haulier.

The Leicester, UK-based haulier's new FH-540 has a Globetrotter cab, 6x2 pusher axle and is powered by a Volvo D13K engine rated at 540 hp. It also has the I-Shift dual clutch automated manual transmission and Volvo's Dynamic Steering System.

Aylestone owner Richard 'Bodge' Ward said, "The new 100-year Volvo FH now means we have two I-Shift dual clutch vehicles on our fleet and four trucks fitted with Volvo's Dynamic Steering. Both are fantastic systems that we are now standardising."

Extras on the FH-540 include side skirts, Alcoa alloy wheels, and Kelsa light bars. Inside the Globetrotter cab its driver, Joe Clarke, benefits from a full leather interior, microwave oven, fridge and television.

Aylestone bought its first Volvo truck in 2006



Goldhofer

MADE FOR YOUR MISSION



WORLD PREMIERE – THE NEW ARCUSPK UNBEATABLE FLEXIBILITY

THE VEHICLE AT A GLANCE

- » Steering system of friction and force-steered pendular axles (patent submitted)
- » Low loading height of 790 mm
- » Lowest deadweight in its class on the market
- » Easier operation through »SmartControl«
- » Loading of front bogie onto rear deck without use of additional equipment



bauma

APRIL 8-14, 2019, MUNICH

VISIT US AT
BOOTH FN 823

WWW.GOLDHOFER.COM



Messe München
Connecting Global Competence

THE HEARTBEAT OF OUR INDUSTRY

bauma, Munich,
April 8-14, 2019

bauma is more than the world's leading trade fair: it is the heartbeat of the industry. With around 600,000 participants, additional halls and larger space. For even more business.



YOUR VISIT.
YOUR BUSINESS.
YOUR TICKET.



www.bauma.de

bauma

SAVE THE DATE

WORLD CRANE AND TRANSPORT SUMMIT 2019

NH GRAND HOTEL KRASNAPOLSKY
AMSTERDAM, THE NETHERLANDS

13 AND 14 NOVEMBER



SUPPORTING ORGANISATIONS



GOLD SPONSOR

DEMAG.
BY TEREX

TEREX.

SILVER SPONSORS

GROVE®
by Manitowoc

LIEBHERR

SUPPORTING SPONSORS

BLOKCAM **SP** **Modulift®**
straightpoint

CREATED AND ORGANISED BY

INTERNATIONAL
CRANES
AND SPECIALIZED TRANSPORT

AMERICAN CRANES & TRANSPORT
ACT&T

khl

FOR MORE INFORMATION AND TO BOOK VISIT

www.khl-wcts.com



MIKE CHALMERS previews the SC&RA's 2019 Annual Conference – a must-attend event that will take place in Carlsbad, California, USA

Annual spectacular

In 2019 the SC&RA Annual Conference is back again at the Omni La Costa Resort in Carlsbad, California, USA. Taking place between 23 and 27 April, the event will attract industry owners, CEOs, top managers and world leaders in the lifting and specialized transportation industry.

This year's conference will offer more than 700 attendees the opportunity to meet and discuss industry products and opportunities, while also attending education sessions, committee meetings, receptions, golf and tennis tournaments, a fundraising event, a 5K fun run/walk, the job of the year competitions, safety awards and the extensive products fair.

In addition to the President's Reception, the Annual Conference features the First-Timer's Reception, International Members Reception and the Guitar Reception.

On the final evening the Annual Awards and Recognition Dinner will take place.

Not to be missed

The event programme includes an impressive range of speakers throughout the week.

JAKE HARRIMAN, founder of Nuru International, will present

the opening session – *Building Great Leaders: How to Unlock Hidden Potential*. It will talk audience members through how to identify and nurture the unique qualities that make a leader.

As a Bronze Star recipient and Stanford University alum, Harriman was inspired to found Nuru – a USA-based social venture that empowers individuals living in remote and rural areas to combat extreme poverty in their communities – after being faced with the effects of poverty in war-torn regions of the world during four tours of duty.

Honoured as a White House Champion of Change and selected as a Dalai Lama Unsung Hero of Compassion, Harriman will explain why it is better to invest in leaders than

infrastructure and how to unlock potential in your current ranks.

While Harriman will get you thinking, **JOHN HEFFRON** will keep you laughing with his presentation: *Middle Class Funny*. Heffron, winner of NBC's reality competition *Last Comic Standing*, will share experiences from childhood through life



as a married father. Audience members will relate to his enthusiastic, hard-won wisdom, recognising how often the path to maturity is marked by universal triumphs and failures. Heffron's appearances include *The Tonight Show*, *The Late Late Show*, HBO, VH1, A&E and CMT.

National Geographic

photographer **STEVE UZZELL** will give plenty to contemplate when he presents: *Open Roads Open Minds – An Exploration of Creative Problem Solving*. Uzzell believes the open road never fails to open our mind; and once our mind is open, the boundless power of imagination is unlocked. Showing his work, which has been featured on and within »

“ The Conference will offer more than 700 attendees the opportunity to meet and discuss industry products and opportunities ”



The 2019 SC&RA Annual Conference will take place at the Omni La Costa Resort in Carlsbad, California, USA

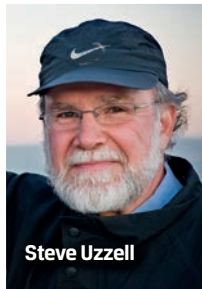
PREPARE FOR BATTLE



Entertainment will include a duelling pianos show, Noche de los Dueling Pianos. Admission includes Mexican food and a Margarita bar.

major networks and magazines, Uzzell uses his photography as metaphors for possibility and creativity. His presentations inspire audiences to be open to unexpected solutions and share how to prepare for that kind of eye-opening experience.

As far as entertainment value is concerned, conference-goers will have the closing night ceremony's act: **SAL VALENTINETTI**. Sal 'The Voice' Valentinetti – Heidi Klum's 2016 Golden Buzzer recipient and finalist of America's Got



Steve Uzzell

“ A hub of instrumental networking activity and stands as an example of SC&RA membership value ”

Talent (AGT) – will close out the conference in style. Since picking up more than 150 million views worldwide with his captivating AGT audition, the crooner has been invited to perform in countries around the world, appearing in solo performances on stages from Madison Square Garden, to opening for Jay Leno in Las Vegas, to selling out the legendary NYCB Theater at Westbury.

The event's entertainment will also include a duelling pianos show called Noche de los Dueling Pianos. The proceeds from this new event will be used to benefit the SC&R Foundation.

Peer recognition

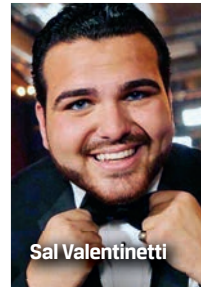
A presentation from **MAX FARRELL**, WorkHound

co-founder and CEO, **JEREMY REYMER**, DriverReach founder and CEO, and **AUSTIN ROWSEY**, manager, digital specialist, Post and Courier called *Modern Recruitment & Retention Strategies: Battling the Labor Shortage* will address one of the biggest issues facing companies today: how to attract, hire and retain exceptional employees.

Attendees will learn from these three experts on each step of the hiring process, as well as how to motivate their current employees and leverage their peer networks. The panel will discuss: how to create a better applicant experience; how to provide impactful



International networking at the products fair



Sal Valentinetti

human interactions from the very beginning; and how to use simple, modern technology to support these efforts.

The products fair promises to offer members and exhibitors a chance to meet in person and discuss industry products and opportunities that apply directly to business on both sides of

the exhibit table. It is a hub of instrumental networking activity and stands as an example of SC&RA membership value around the world.

Closing out the Annual Conference as part of the final night ceremony will be the presentation of awards.

This part of the programme includes awards for membership longevity, job of the year awards in eight categories, the environmental award, the golden achievement award and the president's award. The prestigious hauling and rigging job of the year awards buttress the end of the evening and provide an opportunity for members to recognise their fellow industry professionals for accomplishments in both innovation and application.

The good news is that there is still time to submit entries for the awards. The deadline for the safety and job of the year awards is 5 March 2019.

For more on SC&RA events see: www.scranet.org/SCRA/Events and for more on the awards go to: www.scranet.org/awards, where you can to view all the categories and eligibility criteria.

ATTRACTING, HIRING AND RETAINING STAFF

Speakers for the presentation *Modern Recruitment & Retention Strategies: Battling the Labor Shortage* include:

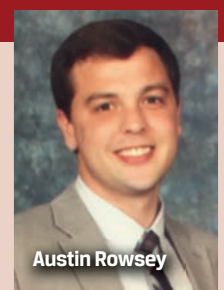
- **MAX FARRELL**, co-Founder and CEO, WorkHound
- **JEREMY REYMER**, founder and CEO, DriverReach
- **AUSTIN ROWSEY**, manager, digital specialist, Post and Courier



Max Farrell



Jeremy Reymer



Austin Rowsey

READY FOR ALL CHALLENGES



SAVE THE DATE!
bauma
APRIL 8-14, 2019, MUNICH
OUTSIDE AREA
FN.829

Your trailer manufacturer for payloads
from 15t to 15,000t ... and beyond.

MAX TRAILER

FAYMONVILLE
TRAILERS TO THE **MAX**

COMETTO
PROPELLED TO THE **MAX**

faymonville.group

Powered by **FAYMONVILLE**
GROUP

Sarens relocating an overhead crane in France

As some industries grow, others decline; however, both situations provide work for lifting and transportation companies. CHRISTIAN SHELTON reports



Industrial evolution

The steel industry continues to be a fruitful source of lifting and transportation work. For example, multinational steel and mining company ArcelorMittal required a 360 tonne capacity, 36 metre overhead crane to be relocated at a steel manufacturing plant in Dunkerque, France. To do this it commissioned international heavy transport and lifting specialist Sarens.

Sarens used two 12 axle lines of Kamag self propelled modular transporter (SPMT), its in-house designed CS1000 and CS250 climbing systems, bracing, 14-metre HEM300 steel mats, as well as forklifts and cherry pickers. Sarens says it used the CS1000 climbing system because, although it was larger than required for the job, it didn't need a bracing system.

The relocation was carried out while the plant was shut down. To move the crane from inside to outside an opening was made in the side of the steel hall. Then the CS1000

was assembled onto SPMT and jacked 200 mm to avoid contact with the rails. It then picked up the overhead crane inside the hall, rotated it 90 degrees, and lowered it onto the waiting CS250. The CS1000 and SPMT were then transferred outside of the hall where the CS1000 was temporarily unloaded. The SPMT were brought back inside the hall to pick up the overhead crane and transfer it outside, along with the CS250. Outside the hall, the CS250 was re-installed and positioned to remove the SPMT. The CS1000 was assembled back onto the SPMT. The CS1000 then picked up the overhead crane and jacked it to its intended height. Once the overhead crane was correctly positioned, the SPMT lowered to release it onto the rails.

Mexican steel mill

In Mexico, a new steel mill is being built in Silao, in the northern state of Guanajuato. As part of this modules, ranging from roof panels to plant modules and weighing up to 300 tonnes, needed to be lifted. For this, international heavy lift and transportation specialist ALE was commissioned.

To lift the parts ALE used its Liebherr LR 11350 crawler crane with the Liebherr PowerBoom add-on – which is designed to increase the crawler's load capacity.

By using this configuration and a small footprint, ALE says it was able to minimise congestion on site and enable construction work to continue, thus reducing overall costs and optimising the build schedule.

Power industry

Like the steel industry, the power generation industry is a well-established source of work for lifting and transport companies.

Poland-based energy, civil and industrial construction specialist MKL Bau

commissioned UK lifting specialist Rope and Sling Specialists (RSS) to carry out a series of tests and inspections at King's Lynn Power Station, in the east of the UK.

The work included the proof load testing of a lifting beam and inspection of a 2.5 tonne capacity Hadeff chain hoist installed on a 52 metre runway, which had been installed by another company.

The beam and hoist were located 25 metres up, in an air-cooled condenser (ACC) building, and are used by the power station to remove motors for service and repair.

RSS used a steel structure in the power station to pull against, using chain slings as an alternative to live weights, to carry out a deflection test. According to RSS site engineer Gary Coleman, "This method saves a substantial amount of money in transportation and time."

RSS used a manual chain block and an electric chain hoist to achieve deflection with a load and hoist weight. A load cell was also incorporated to measure the safe working load. At ground level, a telehandler was employed to carry out a deflection test of a cantilevered beam, again to save the costs associated with the use of live weights.

Two months after this work was completed, RSS then carried out onsite



ALE's Liebherr LR 11350 with Power Boom



testing of a temporary lifting beam to facilitate assembly of ACC ducting. According to RSS, the requirement for specialist lifting and rigging services has been a constant during a long-term investment programme into new flexible power plants across the country.

Plant maintenance

Heavy lift equipment specialist, Enerpac Heavy Lifting Technology, has developed a 'Pick, Skid and Drive' strand jack gantry system for power plant maintenance. With a lift capacity of 450 tonnes, Enerpac says the strand jack gantry has been designed to allow generators and turbines to be swapped out for maintenance while keeping any disruption to power generation capacity to a minimum.

According to Enerpac, the gantry achieves this by enabling the generator or turbine to be effectively picked up and transported over obstacles and replaced with another generator or turbine within 24 hours, thus maintaining power generation capacity.

The system comprises an aerial track of skid beams and support legs, a strand jack gantry (combining skidding and strand jack technologies), and a SPMT or electric trolley system.

With the strand gantry skidded into position, the turbine generator is disconnected and lifted off its foundation using four Enerpac HSL2000 strand jacks. Once clear of any turbine hall obstacles, the generator is skidded using four HSK1250 skid beams below the strand jack gantry to the far end of the skid beam track. It can then be lowered onto either SPMT or an electric trolley system mounted on steel tracks and moved to a maintenance area. Installing the replacement generator is the reverse of the pick, skid and drive process and allows generator exchange within 24 hours, Enerpac claims.

"The ability of the strand jack gantry system to effectively 'pick, skid and drive' the generator out of the turbine hall for maintenance is much quicker than other methods and less disruptive to power generation capacity," says Mart Hinnen, managing director at Enerpac. "It gives

RUBBER-TYRED GANTRIES

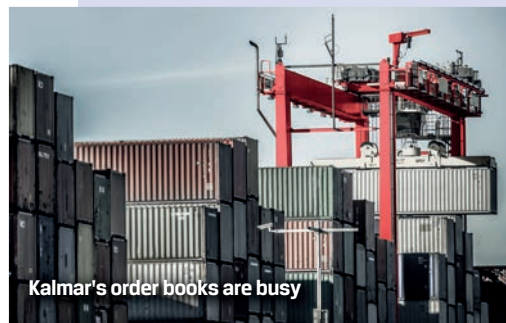
Finland headquartered cargo handling solutions provider Kalmar has enjoyed a slew of orders around the world for its rubber-tyred gantry (RTG) cranes.

In the USA, transportation company Norfolk Southern Corporation ordered four Kalmar SmartPower RTGs to extend capacity at its intermodal terminals at Landers, Chicago, Illinois, and Rossville, Memphis, Tennessee. Two cranes will be installed at each terminal with a span of approximately 25 metres and will be equipped with Kalmar's electro-mechanical anti-sway system and a rotating Bromma spreader. Kalmar says the SmartPower RTG uses up to 10 litres less fuel per hour than most diesel RTGs on the market, due to its smaller diesel engine and power management systems.

Argentinian cargo and container handling company Exolgan SA has ordered four Kalmar RTGs with hybrid drivelines for its container terminal in Buenos Aires. The order includes a spare parts package for the machines. Carlos Mancini, engineering manager at Exolgan says, "Kalmar's Hybrid RTG solution was the ideal choice for us since it will both help us reduce fuel costs and improve sustainability by reducing noise and airborne emissions."

And in Northern Ireland, Belfast Container Terminal (BCT) ordered a complete AutoRTG

system from Kalmar comprising eight automated RTGs controlled by the Kalmar Terminal Logistic System and new-generation remote control desks. The AutoRTG system will replace the manually operated rail-mounted gantry crane system currently in use. The cranes will be factory pre-tested and they will be delivered to BCT fully erected.



Kalmar's order books are busy

specialist heavy lift contractors the ability to assist power equipment suppliers and power station operators in a wide range of maintenance tasks without the need for expensive and time-consuming civil engineering works."

Power station maintenance work has also been undertaken by German crane and transport company Maximum Kran- und Schwerlastlogistik, which used its Liebherr LTC 1050-3.1 wheeled mobile telescopic crane to aid refurbishment work at a power plant in Saxony, Germany.

A large forced draught fan needed to be dismantled, refurbished, and replaced. The space in which the crane could operate was restricted but the compact dimensions of the crane, combined with its ability to telescope with a six-tonne load on its hook, meant that it was particularly suitable for the job, says Liebherr. The fan was partly manoeuvred by retracting the crane's telescopic boom.

In the USA, energy company Dominion Energy Virginia purchased a 135 tonne capacity (150 US ton) Link-Belt RTC-80150 Series II to be used at North Anna Power Station in Mineral, Virginia. It will be used for maintenance work during scheduled 30-day shutdowns, which happen at the power station every 18 months. The shutdown enables repairs and maintenance to be carried out around the clock and, according to Dominion Energy Virginia, the purchase of the crane



RSS carrying out an inspection at King's Lynn Power Station in the UK

has helped speed this work up. "It cut our time down to a fraction of what we were spending before," says Kenneth Boyd, North Anna facilities support superintendent. "Days before a lift, we would have to spend a lot of time and effort just moving components to fit a truck crane in. The RTC-80150 has the capacity for a valve replacement, or the reach for all of our preventative maintenance."

According to Link-Belt, prior to purchasing the RTC-80150, Dominion Energy Virginia would hire up to nine cranes to carry out the maintenance work; now it only requires three.

Dismantling work

While some power stations are being built or refurbished others are being dismantled. »

Enerpac's pick, skid and drive' strand jack gantry system



Chain of evolution



Evolve your safety and efficiency with Green Pin Tycan® Chains

Welcome to the fibre age: a new era of safer and more efficient lashing and lifting. An era that is powered by Green Pin Tycan® Chains, made with Dyneema® fibre. Green Pin Tycan® is up to eight times lighter than steel – yet just as strong. Join leading heavy-lifting companies in experiencing the superiority of our award-winning Green Pin Tycan® Chain. Learn more at tycan.com



DISCOVER MORE AT BAUMA 2019, MUNICH #C4.339

**Dominion Energy
Virginia's
Link-Belt
RTC-80150
Series II**



German crane, transport and industrial assembly specialist Wasel has been particularly busy in this field. The company used two 500 tonne and two 250 tonne Liebherr cranes on a two week project to help dismantle the Voerde Power Station in the Lower Rhine region of Germany. The powerstation closed down in 2017 and was dismantled in November 2018.

The first stage of the dismantling project involved the removal of a former overhead line tower. The cranes were then repositioned and used to dismantle a coal conveyor bridge weighing nearly 100 tonnes. The conveyor bridge stretched over the Frankfurter Strasse road and so this stage of the project was completed using a tandem hoist.

In 2018, Wasel also dismantled another coal conveyor bridge for coal mining company Ruhrkohle AG in the German city of Gelsenkirchen. This was also a two-week project in which Wasel used up to five cranes on site. According to Wasel, a key part of the project was the removal of a segment of the bridge, weighing 80 tonnes, which crossed a four-lane main road and the nearby S-Bahn suburban train line. Two mobile cranes, with load capacities of 750 and 500 tonnes, were used for another tandem hoist using a radius of up to 42 metres. A video of the project can be seen at: <https://bit.ly/2MFEL4m>



Nuclear decommissioning

Also in Germany, the government is decommissioning many nuclear power stations. One such job carried out by German crane specialist Innokran is the subject of our site report on page 21. Another example is energy company Energie Baden-Württemberg (EnBW) commissioning Mammoet Germany to lift and remove three steam generators, each weighing up to 283 tonnes and a 90 tonne pressure vessel from the Neckarwestheim I (GKN I) nuclear power plant, north of Stuttgart. Mammoet will use its DHS-500 lifting system, which was developed for use in nuclear power plants. It will be adapted to the requirements of the GKN I and fitted to the in-house crane. In this way no extra load will be added to the structure of the building, Mammoet says.

Sebastian Albrecht, Mammoet Germany operations director, says, "Mammoet has deep and long-standing expertise in dismantling and decommissioning nuclear plants. A flawless execution under the highest safety requirements in nuclear facilities has top priority. For this, we exclusively use our highly qualified and experienced Mammoet nuclear sector specialists."

Future work

As some industries decline, others grow. One area that has the potential to become a lucrative source of work for lifting companies is the construction and deployment of data centres.

According to a report by industry research provider Insight Partners the value of the international data centre construction market has been estimated at US\$43 billion, and is predicted to rise to US\$92 billion by 2025.

Data centres are currently being built by technology giants, both onshore and offshore. One offshore datacentre project underway is Project Natick. It is owned by tech giant Microsoft and is located off Orkney Archipelago. To deploy the data centre, Microsoft commissioned French company Naval Group – a specialist in naval defence and marine renewable energy – to implement Phase 2 of the project.

Ben Cutler, Project Natick manager at Microsoft Research comments, "Half the world's population lives within 200 km of the sea, so placing data centres offshore increases the proximity of the cloud to the population, reducing latency and providing better responsiveness. And by deploying in the water we benefit from ready access to cooling – reducing the requirement for energy for cooling by up to 95%."

Maximum Kran's Liebherr LTC 1050-3.1



**bauma
2019**

Stand FS 903/6
Outdoor Area



JF365

Light and powerful

Compact size for
multiple applications
and versatility.

MINICRANES | MINIPICKERS
ARTICULATED CRAWLER CRANES
TELE-CRAWLER CRANES
VACUUM & TOOLS

www.jekko-cranes.com



SMART SHACKLE

The first ultra-rugged weighing system

- Read your values on your smartphone
- Water, Dust & Drop Resistant
- High Accuracy
- On-line monitoring & Data-recording



FREE SMART PHONE
USING THE CODE ICST
ON WWW.SMARTJOBSITE.COM

www.smartjobsite.com

JOIN & ATTEND FOR FREE



750+ ATTENDEES. 90 EXHIBITORS.
ENDLESS NETWORKING.

Join SC&RA and attend the Annual Conference for **FREE**.
Visit www.scranet.org/join to get started.

ANNUAL CONFERENCE

April 23-27, 2019
Omni La
Costa Resort
Carlsbad, CA

Positioning part of the new lattice support under the existing bridge; (inset) both cranes side by side lifting in tandem



Double choice

Heavy lift and specialist Mammoet chose a pair of wheeled mobile cranes over a floating type for a river bridge job near Berlin in Germany. ICST reports

Instead of a floating crane for a bridge job Mammoet in Germany used a pair of large wheeled mobile telescopic cranes operating from one bank of the river.

Three lattice supports weighing around 80 tonnes for a railway bridge were installed using 1,200 and 750 tonne capacity Liebherr cranes. Space restrictions made the job on the River Spree near Berlin a logistical challenge, Liebherr reported. Only one bank of the river was available as the other was already occupied by a tower crane.

The floating crane option was dismissed because a suitable unit was unavailable in

the required time frame. Crane specialists at Mammoet's office in Leuna came up with the alternative solution. With mobile cranes the job would be done sooner and for less money.

Looking for large

Ironically, however, Mammoet's 1,200 tonne wheeled mobile telescopic crane was occupied elsewhere and unavailable in time for this job. Mammoet job planners René Xyländer and Tom Schladitz sourced one from Bremen-based rental house Megalift. The Liebherr LTM 11200-9.1 crane was rigged with a 48 metre luffing jib. It made it possible to reach the opposite bank. A load of 40 tonnes was lifted to a radius of around 50 metres.

To lift the other end of the supports a 750 tonne capacity Liebherr LTM 1750-9.1 wheeled mobile crane from Mammoet was set up near the first crane to lift the other end of the supports. Its outrigger base spread of 10 by 10 metres filled the available space to

A tight fit over the water for the bridge beam loads each weighing up to 40 tonnes



Crane operators Rainer Schmidt, left, from Mammoet and Heiko Bischoff from Megalift

the extent that the ends of the supports had to be placed under the existing structure.

Lifting in tandem, the steel lattice sections were swung out over the water. The main difficulty was with the end phase of the hoists, as the ends of the supports had to be placed several metres under the existing bridge connection on the opposite side of the canal. Heiko Bischoff, however, operating the larger crane, and the crane operators in the Mammoet machine, Rainer Schmidt and Daniel König, precisely followed the commands issued by the marshalling fitters and moved the components into their final positions. ■



bauma
FS.1004/1

GEDA®
ORIGINAL

THE NEXT LEVEL

www.bauma-geda.de

YOUR GEAR DESERVES SMART ENGINEERING

bauma

APRIL 8-14, 2019, MUNICH

COME AND MEET US
AT BOOTH FM.814/3

ROPEBLOCK

THE RIGHT LIFTING PRODUCTS WHENEVER AND WHEREVER YOU NEED THEM

Ropeblock hardware can be found worldwide wherever lifting components in cranes are in contact with the wire rope. Our products are designed to contribute to consistent safety and efficiency in any type of lifting & rigging application. By combining extensive knowledge of blocks, sockets, and rigging gear, with a unique approach we call Smart Engineering, we deliver products that will fit any bill, both functionally and financially. **Engineered for efficiency.**

ROPEBLOCK.COM

Improving productivity

A well-developed, well-managed sales cycle is critical to the health of any business. It gives you clear visibility of what deals you have at each stage of the process – and where the hold-ups are.

A sales cycle can vary greatly among organisations, products and services, and no one sale will be exactly the same. Identifying key steps and stages, however, improves sales efficiency, helps salespeople sell more and speeds up the process of on-boarding new sales hires.

Variations considered, most sales cycles will have the following common elements: prospecting, contact initiation, need identification, the offering, managing objections, closing the sale, repeat sales – and collect referrals.

Cash flow

The shorter the process the better the company is financially because less cash is tied up in working capital to fund operations. The longer the sales time frame, the more cash is needed to pay the bills.

According to Andy Bailey, CEO and head coach with business coaching firm Petra Coach, poor cash flow is the leading cause of failure for small- and medium-sized businesses. In a recent piece for *BOSS Magazine*, Bailey listed five tips to help salespeople close more clients faster.

BUILD A 'DREAM LIST' OF CLIENTS whose needs best match your



product or service. Examine your current client list and identify common reasons as to why they chose you and not your competitors. Compare those attributes to the prospects you're working. Sales reps will close faster when they have a clear profile of their dream client – and prospects will buy faster when their needs best match the seller's profile.

CREATE A WRITTEN PLAN FOR YOUR SALES CYCLE. There are two things you need to know when you're planning any journey: where you are now and where you want to go. If you don't have a written sales process, do it now. It will help your sales team stay on task as they work with prospects. While every sale is unique the process should be repeatable and scalable. In addition, writing down the process will help your sales team recognise and remove roadblocks that cause the cycle to lengthen, such as too many requests for modifications to the contract, product or scope of service.

KNOW THE DECISION MAKERS. It is almost a given that more than one person will be involved in the decision to purchase your product or service. Sales reps must understand the roles and motivations of all key individuals involved, anticipate their needs and provide meaningful information that will facilitate the prospect's purchase.

AGREE TO A PURCHASE TIMELINE EARLY IN SALES DISCUSSIONS. Every written sales cycle should outline timelines and milestones, including deadlines for product/service delivery and, where applicable, installation, implementation and client onboarding. Your reps should work closely with prospect decision-makers to build a timeline that all parties can agree to – and then stick to it as closely as possible.

AUTOMATE REPETITIVE TASKS. A top sales rep may spend several hours every week sending e-mails to prospects, following up on previous discussions, inputting data into a CRM, writing proposals or preparing presentations. That's precious time they could spend establishing and strengthening relationships with prospects and closing on new clients. List all the key tasks your team does repeatedly and look for ways to automate those activities.

Streamlining your sales cycle will not only improve cash flow for the business, it will positively impact the overall financial health of your business. It's never too late (or early) in the year to hit the pause button and look for ways to improve your team's productivity. ■

“ If you don't have a written sales process, do it now. It will help your sales team stay on task as they work with prospects ”

SC&RA LEADERSHIP

SPECIALIZED CARRIERS & RIGGING ASSOCIATION CHAIRMAN

Terry Young

Construction Safety Experts,
Cary, North Carolina, USA

PRESIDENT

Gary Stang

Anderson Trucking Service,
St. Cloud, Minnesota

VICE PRESIDENT

Tom Bennington

Duncan Machinery Movers, Inc.,
Lexington, Kentucky

TREASURER

Delynn Burkhalter

Burkhalter, Columbus, Mississippi

ASSISTANT TREASURER

Jay Folladori

Bennett International Group,
McDonough, Georgia

ALLIED INDUSTRIES GROUP CHAIRMAN

Lester Evans

Aspen Custom Trailers,
Gatesville, Texas

CRANE & RIGGING GROUP CHAIRMAN

Kenneth Goddard

International Industrial
Contracting, Sterling, Michigan

TRANSPORTATION GROUP CHAIRMAN

Ray Morgan

Perkins STC, Northfield, Minnesota

LADIES GROUP CHAIRWOMAN

Denise Claton

Midwest Specialized
Transportation, Rochester, MN

SC&R FOUNDATION OFFICERS PRESIDENT

Jim Sever

PSC Crane & Rigging,
Piqua, Ohio

VICE PRESIDENT

Dave Wittwer

Hays Companies,
Salt Lake City, Utah

TREASURER

Geoff Davis

Unified Logistics Operating
Group, Bethesda, Maryland



CHIEF EXECUTIVE OFFICER

JOEL DANDREA

5870 Trinity Parkway
Suite 200
Centreville, VA 20120, USA
Tel: +1 703-698-0291
Fax: +1 703-698-0297



Workforce development is an industry issue that will be a major part of SC&RA's strategic plan for 2019. MIKE CHALMERS reports

A strategy for success

In 2019 SC&RA has positioned itself to take a leadership role in what it considers the top industry issue at the moment.

Workforce development is a key component of the Association's new strategic plan. The Association will continue to address and attack this overall issue in an ongoing effort to cultivate the collective long-term success of its industry partners and member companies both in the USA and around the world.

"Our strategic planning committee certainly addressed workforce development and the labour shortage as the number one strategic objective for 2019 to 2024," said Joel Dandrea, SC&RA CEO, "and the Association has made a three-year commitment to be the anchor sponsor for Lift & Move USA at US\$150,000 per year."

Dandrea pointed out that SC&RA is leading the charge to separately incorporate the Lift

& Move careers event with an independent board of directors – to spearhead growth and improvements after learning a great deal over the last two and a half years. "While we've made great progress, the programme is still in its infancy and there's much work to be done with regards to communications, the database between students and employers and bringing together training and apprentice opportunities. Greater co-ordination, communication and integration through potential partnerships with unions and training organisations will only serve to strengthen and evolve the endeavour, which is our ultimate aim."

2018 was a productive example of how far that aim has come, noted Tracy Bennett, Lift & Move director. "Last year, Lift & Move USA established a relationship with the Association for Career and Technical Education [ACTE], providing the programme with access to ACTE resources, visibility for Lift & Move to ACTE professionals and opportunities to push the crane, rigging and transportation workforce development agenda to the Department(s) of Labor and Education."

Bennett said Lift & Move USA was invited to participate in both the ACTE Workforce



Superior Cranes awarded prizes to the students for completion of the chain falls competition at its job registry event

Development Summit and NCCCO Industry Forum on Personnel Qualifications last year, providing exposure and networking opportunities for the programme beyond what had been done previously. "By leveraging contacts with SkillsUSA and ACTE state directors, attendance at hosted events came from highly qualified student segments, with the majority being students who are already enrolled in welding, metals, manufacturing, mechanics and carpentry programmes. More than five hundred students and teachers attended two events in fall 2018."

Battle plan

On the worker retention side, Dandrea indicated the importance of providing Association members with more information on best practices. "What we have to do is develop a whole 'Lift & Move in a can' – and deliver the strategies, the process, the ideas that will enable individual companies from around the country and the world to establish partnerships with schools and training centres... to essentially replicate the programme in their immediate area."

Dandrea added that the reality is



Students attending a recruitment event hosted by NessCampbell Crane + Rigging in Oregon, USA, represented high school or post-secondary career and technical education programmes



Industrial Training International provided a VR simulator for students to try crane operation at a recruitment event hosted by NessCampbell Crane + Rigging



SC&RA member companies are competing with all types of other industries for the same talent so, if the Association doesn't make this effort and continue to work with member companies and partner organisations to evolve their own efforts similarly, then other industries will.

"And, yes, there are questions on how we quantify the investment into something like Lift & Move USA but it's really difficult at this early stage," Dandrea noted. "But if we don't implement it like we are, we don't stand a chance at ever attracting and retaining that talent – because they'll just go elsewhere."

"We've been told by career counsellors in schools and technical centres that once these kids go through and attend an event – while it may seem like they're young and may not have an interest – it might be a few years down the road before they get to a point of sitting back and focusing on what they want to do. They remember these events – it leaves an impression on them. We've got to keep developing a database of these people that attend, keep communicating with them, keep promoting. We know the platforms they use, particularly social media, allow them to share that information with others, so that's part of the battle plan."

Next level

Lift & Move USA is one aspect of a larger push for SC&RA to research and find solutions to the worker shortage industry-wide. According to Jason Bell, SC&RA membership director, "It's as simple as taking a proactive stance on multiple levels to address the collective lack of skilled labour and individual development on behalf of our members. It's a multi-tiered approach; Lift & Move USA is the entry-level gateway for skilled crane operators, truck



Superior Cranes demonstrating crane transport work (a Link-Belt crawler crane on a Nicolas 10-axle in-line platform trailer pulled by a 1979 American General M920 prime mover) at its job registry event

drivers, welders, dispatchers and mechanics to enter our industry.

The Leadership Forum programme then operates on the next level to help those who are growing beyond the controls of a crane or getting out of the cab to move into management and-or the next levels of their company's leadership growth through the Association."

Bell explained that both programmes are critical to long-term expansion in the industry and factor heavily into SC&RA's overall planning objectives over the next five years – for a reason: "Frankly, there are many trade and professional organisations that are simply taking a hands-off approach to developing the next generation which could leave the future of their Association's membership, let alone their industries, vulnerable collectively both in the short and long term."

To that end, SC&RA held its first Emerging Leaders Summit in the Washington, D.C., area of the USA. It is a programme designed to piggyback onto the SC&RA Leadership Forum, for young and emerging leaders in the industry.

"The summit served as a next step as far as advocacy and leadership is concerned," Bell continued. "We invited all of our previous fifty-three Leadership Forum graduates to come together for a closed networking event near our offices. Thirteen graduates attended, spending considerable time with SC&RA's senior staff, Steven Todd and Beth O'Quinn, as well as individuals from NCCCO and FMCSA."

In addition, Summit attendees took part in a two-hour session with Dr John Hillen, an American business executive and the former U.S. Assistant Secretary of State for Political-Military Affairs. "Dr Hillen spoke to the group about reinventing themselves as leaders, and how to operate as a leader when your

business is outpacing you," said Bell. "Overall, the turnout and support were fantastic, with great feedback from participants, which sets a positive tone for further establishing future Association leaders who will help advance both SC&RA and the industry in coming years."

Dandrea added, "It was very much a positive, back-and-forth experience for all involved. Everyone walked away with an enhanced network and a greater understanding of both advocacy and leadership opportunities by way of SC&RA programmes."

Global communication

A future role for one or more of the Summit attendees might one day involve representing SC&RA membership while working with the Association's international partners – like ESTA (European Association of Abnormal Road Transport and Mobile Cranes).

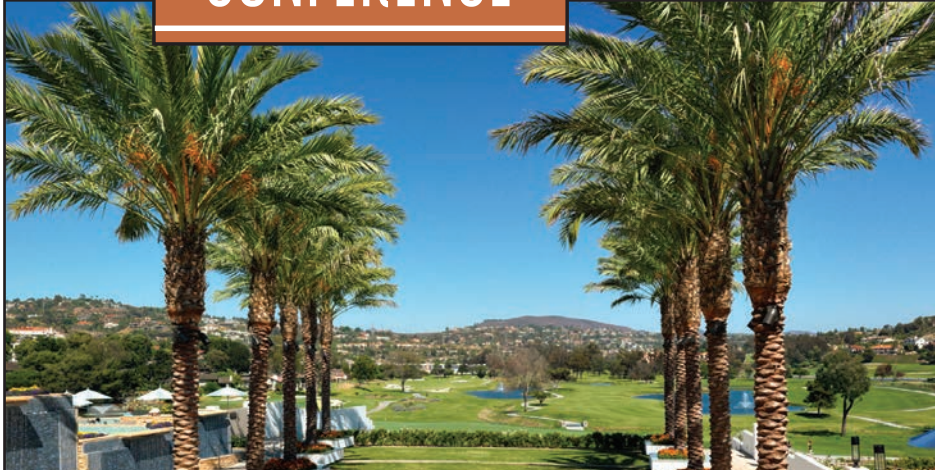
Dandrea highlighted that, within SC&RA's focus on workforce development, the hope is to also continue to advance communications with its sister organisations around the world. "We want to cultivate and exchange best practices. Moving forward, we certainly want to dig a bit deeper – over the next year or two – and see what has been successful in other countries in regards to workforce development. With the hope of having more sophisticated conversations down the road as the process evolves."



Jason Bell from SC&RA speaking to students at a job registry event hosted by Superior Cranes in Rockingham, North Carolina, USA

2019 ANNUAL CONFERENCE

APRIL 23-27
Omni La
Costa Resort
Carlsbad, CA



- ▶ Expert Panel on Recruitment & Retention
- ▶ World-Renowned Speakers
- ▶ Products Fair
- ▶ Networking Receptions
- NEW** ▶ Dueling Pianos Show
- ▶ Job of the Year Competitions



REGISTER TODAY AT WWW.SCRANET.ORG/AC2019

INTERNATIONAL iC TOWER CRANES CONFERENCE AND NETWORKING

SAVE THE DATE
**26 AND 27
JUNE, 2019**
HOTEL SAVOYEN,
VIENNA, AUSTRIA

PARTICIPANTS IN VIENNA WILL INCLUDE:

Jörg Hegestweiler, managing director, BKL Baukran Logistik
Nigel Brewis, managing director, Safety Check Engineering
Henrik Nielsen, managing director, Krøll Cranes
Patrick Rickerby, technical director, Skeye (drone specialist)
Theodor Strohal, head of BIM.5D, Vienna, Strabag
Martin Seban, senior consultant – economics and country risk,
 EMEA, IHS Markit

ASSOCIATION PARTNER



SUPPORTING ASSOCIATION



TO FIND OUT MORE OR TO BOOK YOUR PLACE VISIT
www.khl-its.com

GOLD SPONSOR



GOLD SPONSOR

LIEBHERR

GOLD SPONSOR



GOLD SPONSOR

WOLFFKRAN

CREATED AND
ORGANISED BY

**INTERNATIONAL
CRANES**
AND SPECIALIZED TRANSPORT

AMERICAN CRANES & TRANSPORT
ACT

SILVER SPONSOR



SILVER SPONSOR



SILVER SPONSOR



SUPPORTING SPONSORS



Safety without tag lines

Australian crane rental firm Universal Cranes is the first company to use a new remote load management system designed to improve safety in crane operations and to boost productivity.

The safety device was developed by Brisbane-based smart technology company Verton Australia. Called the R-series, Verton said the remote load-management system eliminates the need for human held taglines to control suspended loads. This improves safety and productivity for crane

operations, it claimed.

The system is available in various models and can handle loads up to 20 tonnes. In its most basic format, the system comprises a single pair of gyroscopic modules and a handheld remote controller.

"We're very excited to be able to use the R-series load-management system, which we believe will dramatically reduce the risk of accidents by ensuring no human contact is required for managing suspended loads," commented Albert Smith, Universal Cranes managing director. "With the R-series, tag line use and associated workloads are removed. Workers will no longer be near or under moving loads."

Verton founder and chief technology officer Stanley Thomson said the R-series would increase productivity



Albert Smith, CEO of Universal Cranes, left, and Stanley Thomson, founder and CTO at Verton Australia

and profitability of businesses operating or relying on cranes and hoists for orientating heavy loads. "The R-series will reduce hook time by 50 per cent or more and the overall cycle time by 25 per cent," he said. "This is the biggest improvement in productivity since the crane was invented. We estimate that implementation of the R-series will save worksites millions of dollars over its lifetime with



The Verton R-series tag line eliminator

payback possible within a year. These are significant advantages in our competitive industries."

■ For more information see: www.verton.com.au

REMOTE CONTROLS FOR SALE IN EUROPE



USA-based remote control and electronic systems manufacturer Magnetek has made its Flex Base wireless control system available in Europe. The company claimed that Flex Base is a cheaper solution and less restrictive to operate than hardwired pendant controls.

The system has a wireless pairing capability that allows information and settings to be transferred between two transmitters or a transmitter-receiver system. Magnetek said this makes it possible to quickly start using new systems and minimises spare parts inventory.

Flex Base is also available with programmable functions to suit most types of applications, Magnetek added.

■ For more information see: www.magnetek.com

Approval in principle for wind turbine feeder

London Offshore Consultants, a UK-based independent marine and engineering consultancy and survey organisation, has given Dutch motion compensation systems specialist Barge Master and Netherlands-based offshore equipment manufacturer, GustoMSC, approval in principle for their Steady Top Feeder concept. According to Barge Master and GustoMSC, this is an important step forward in bringing it to market.

The Steady Top Feeder is a modular motion-compensation platform concept that can be installed on any vessel. It is designed to provide a flat surface in sea swells, allowing the contractors installing turbines at offshore wind farms to have the components delivered next to the jack-up and under the hook of the crane.

■ For more information see: www.barge-master.com
www.gustomsc.com



Barge Master and GustoMSC

SPEEDY ADDS REID GANTRIES



Reid Lifting has delivered 75 lightweight gantry cranes to Speedy Hire in the UK.

Speedy has a specialist lifting division offering equipment for material handling and other applications. The company identified the gantries as being ideal for short term rentals.

The order comprised 40 Tall Porta-Gantry cranes, 30 Intermediate Porta-Gantry systems (all 2,000 kg capacity), and five 5,000 kg capacity Tall Porta-Gantry models. As part of the new 'winch ready' range the units can all be converted with the addition of a winch. David Underhill, business development manager at Reid, commented, "The products are used on projects from the maintenance of multi-billion dollar petrochemical facilities to rescuing seals trapped by rocks."

■ For more information see: www.reidlifting.com



Installation and Transportation of 2 STS Cranes which have **2343 tonnes** weights, 90m height, 15m span, 28m length, 100m width.

- ◆ Engineered heavy lift and transport services
- ◆ Project transport
- ◆ Load-out services

- ◆ Cranes, gantries, strand jacks and transport equipment rental
- ◆ Rigging engineering and transport survey consultancy
- ◆ Electromechanical services for the Wind and Solar Industry

Experience on the move... *Since 1957*



www.hareket.com

HEADQUARTER TURKEY: **ISTANBUL** | MENA REGIONAL OFFICE: **UAE** | ASIA PASIFIC REGIONAL OFFICE: **SOUTH KOREA**

EVENTS DIARY

2019

SC&RA SPECIALIZED
TRANSPORTATION
SYMPOSIUM

19 to 22 February 2019

Houston, Texas, USA

www.scranet.org

BAUMA (MUNICH)

8 to 14 April 2019

Munich, Germany

www.bauma.de

ESTA AWARDS OF
EXCELLENCE

11 April 2019

Munich, Germany

www.khl.com/esta

SC&RA ANNUAL
CONFERENCE

23 to 27 April 2019

California, USA

www.scranet.org

LIFT & MOVE USA

9 May 2019

Webster, New York, USA

(Hosted by Boulter)

www.liftandmoveUSA.com

EUROPEAN RENTAL
ASSOCIATION CONVENTION

15 & 16 May 2019

Madrid, Spain

www.erarental.org

LIFT & MOVE USA

30 May 2019

Ontario, Canada

(Hosted by Matcom Group)

www.liftandmoveUSA.com

PLANTWORX 2019

11 to 13 June 2019

Peterborough, UK

www.plantworx.co.uk

INTERNATIONAL TOWER
CRANES (ITC) CONFERENCE

26 & 27 June 2019

Vienna, Austria

www.khl-itc.com

WORLD CRANE AND
TRANSPORT SUMMIT

13 & 14 November 2019

Amsterdam, The Netherlands

www.khl-wcts.com

PICTURE OF THE MONTH

This month it is less about the photo itself and more about exactly what it is. What you can see here is a book that was first published in 1924. It is a recently discovered family heirloom and is now in a somewhat fragile state.

One thing to take from the front cover illustration is that suspending one crane from another is not a new idea, although Liebherr did take it to a whole new level with its multiple version which appeared on the front cover of ICST back in July 2012.

Turning to the inside of the book, the black and white shot of the crane is the only photo in it. Continuing the theme of nothing being a new idea is the fact that this close to 100-year-old crane is electric, something which now of course is coming around to being very much on-trend.

The rail mounted crane worked in a factory loading and unloading a furnace in the manufacture of railway wheels.



TYRE-CHARGING MACHINE. It is driven by electricity and its purpose is to charge the tyres of the locomotives in the course of their manufacture, and to pass them on to the engine in which they are heated. It is called a "charging" machine because it charges the furnace.

See page 121.

PEOPLE NEWS

■ On 17 January US specialized transport giant **Daseke** appointed **CHRIS EASTER** as the



company's chief operating officer. Easter has more than 30 years of experience

from transport and logistics roles at Keen Transport, in the United States Army, at Walmart and at Schneider National. For the last six years he was CEO at specialized carrier Keen Transport. He also serves the industry on the Board of Directors at the Specialized Carriers and Rigging Association (SC&RA). At Daseke Easter's efforts will be driving organic revenue growth, expanding EBITDA margins and maximising free cash flow.

■ **Unic Cranes Europe** has welcomed **JOHN SCHOLTENS** as



European sales manager. He will be responsible for business sales across Europe through the Unic Cranes Europe dedicated dealer network. Scholtens has 30 years of experience in sales and service in the mobile crane and construction Industries. He has worked for distributors and large crane manufacturers.

■ **Ranger Lifting** in Australia

has appointed **WILLIAM ESSEY** as technical sales specialist based at the new Prestons headquarters near Sydney. Before joining Ranger Essey worked in the lifting and rigging sector for 13 years, ten of them at chain and component manufacturer Gunnebo Industries.

Essey said, "I was looking for a new challenge and have known Ashley [Thacker, general manager] and Steve [Thacker, managing director] since I



started in the industry. We share the same approach to business in terms of being customer focused and I'm aware of the value they place on good staff, which further enhanced the appeal of the role."

■ **Select Crane Sales** based in Florida, USA, has appointed **KARL PITRE** as

service manager at its recently opened Branchburg location in New Jersey. Pitre has branch management and spare parts experience in the crane industry.

In addition to selling new and used cranes, Select Crane Sales provides service for all types of crane from routine maintenance to major repairs. Pitre commented, "Customers have become accustomed to our fast response time and ability to handle emergency repairs both in the shop and in the field."



■ Please send picture of the month entries and all other back page-related information to *International Cranes and Specialized Transport*, KHL Group, Southfields, Southview Road, Wadhurst, East Sussex TN5 6TP, United Kingdom, or by e-mail to alex.dahm@khl.com. Entries for Picture of the month should include: the month and year taken, the place, type of crane, owner and project, plus any other relevant information.

OR REGISTER ONLINE AT: www.khl.com/subs/ICST

1 CHOOSE YOUR MAGAZINE/S

- International Cranes and Specialized Transport** ☐
- Access International* ☐
- Access, Lift & Handlers* ☐
- American Cranes & Transport* ☐
- Construction Europe* ☐
- Construction Latin America (Spanish)* ☐
- Construction Latin America (Portuguese)* ☐
- Demolition & Recycling International* ☐
- International Construction* ☐
- International Construction Turkey (Turkish)* ☐
- International Rental News* ☐
- Cranes & Project Transport Turkey (Turkish)* ☐

2 CHOOSE YOUR E-NEWSLETTER/S

- World Crane Week** ☐
- KHL Crane Market* ☐
- Access International* ☐
- Access, Lift & Handlers* ☐
- Construction Latin America* ☐
- Demolition & Recycling International* ☐
- World Construction Week* ☐
- International Construction China (Chinese)* ☐
- International Rental News* ☐

3 ORGANISATION TYPE

- Construction Contractor/Consultant ☐
- Equipment Rental ☐
- Energy / Petrochemical ☐
- Specialized/Heavy Transport ☐
- Industrial Establishment ☐
- Airports / Ports / Docks / Offshore ☐
- Manufacturer of Lifting Equipment ☐
- Distributor / Agent / Equipment Sales ☐
- Government/Defence/International Authority ☐
- Public/Private Utilities ☐
- Windpower ☐
- Other (Please specify): _____

POST TO: KHL Group,
Circulation, Southfields, Southview Road,
Wadhurst, East Sussex, TN5 6TP, UK
E-MAIL: circulation@khl.com



4 YOUR DETAILS

Name: _____

Job title: _____

Company: _____

Address: _____

Town: _____

Country: _____

County/State: _____

Post code/Zip code: _____

e-mail: _____

5 Do you purchase or influence the purchase of construction equipment or services?

YES ☐ NO ☐

6 What is the annual turnover of your company (US\$ millions):

Under \$1 million ☐ \$1-3million ☐

\$3-5million ☐ \$5-20million ☐

\$20-100million ☐ Over \$100 million ☐

7 FORMAT OF MAGAZINE

PRINT ☐ DIGITAL ☐ PRINT & DIGITAL ☐

8 YOUR PREFERENCES

KHL Group Ltd will keep you up to date with industry insight, products and events relevant to you as a professional in the construction or power industry.
If you do not wish to receive such information, please tick the selected boxes below.

e-mail ☐ Telephone ☐ Post ☐

KHL works with other companies in the construction and power industry and will contact you about their products and services.

I would like to receive e-mails from KHL about other third party products ☐

All e-mails will contain a link in the footer to enable you to unsubscribe at any time.
For more information, please see our Privacy Policy: www.khl.com/privacy-policy

9 SIGN AND DATE:

SIGNATURE: _____

DATE: _____

MARKETPLACE

The Marketplace is divided
into easy to read colour
coded sections
to help you
quickly
find what
you need.



PRODUCTS, PARTS & ACCESSORIES

53

Operational aids, communication systems, components, controls, software, crane mats and outrigger pads, crane repair, hydraulics, jacks, attachments, personnel baskets, rigging hardware, rollers, slings and chains, tires, winches, wire rope, batteries, braking systems, and new, used and refurbished parts.

SAFETY, TRAINING & INDUSTRY SERVICES

Training, insurance, inspections, financing, consulting and safety equipment.

SPECIALIZED TRANSPORT

Transportation permits, freight forwarding, heavy haul, pilot car services, trailers, wheels and tyres.

CRANES AND EQUIPMENT FOR SALE OR RENT

54

Crane, rigging and lifting equipment for sale or rent, new or used.

CAREER OPPORTUNITIES

Employee recruitment and job postings.

Contact JULIA BOSSIE on: +44 (0)1892 786204 or e-mail: julia.bossie@khl.com

 **VAN DER HILST** INTERNATIONAL b.v.
EQUIPMENT, COMPONENTS & PARTS FOR HEAVY EQUIPMENT

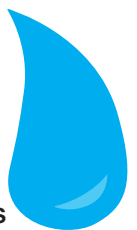
Looking for equipment parts?
Try us!
We deliver anywhere in the
world for more than 30 years!

Van der Hilst International b.v. tel. +31-38-376 28 56
Ampèrestraat 21 Fax +31-38-376 46 65
8091 XX Wezep E-mail info@hilstinter.com
The Netherlands
www.vanderhilstinternational.com



Grove, Manitowoc, Demag, Volvo, Liebherr, Krupp,
P&H, Potain, Cummins, Deutz, Allison, Clark

STUCK FOR
CHOICE?
Don't sweat



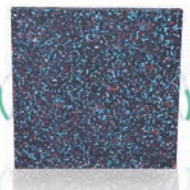
We have a huge range of **Crane Pads**
in stock with **next day delivery** available



MULTI
MAT
SYSTEM



HI-VIZ PADS



PREMIUM PADS

OUTRIGGER PADS



CALL OUR TEAM 01952 671403



BUY ONLINE outriggerpads.co.uk



EMAIL US sales@outriggerpads.co.uk

CRANES AND EQUIPMENT FOR SALE OR RENT

USED CRANES



Brand	TEREX
Model	Challenger 3180
Boom	50 m + 16 m
SLI	IC-1 Plus
Year	2016



Brand	Terex-Demag
Model	TC 2800-1
Capacity	600 t
Configuration	72 + 60 SWSL
Year	2013

REFURBISHED

DEMAG
BY TEREX



+49 6332 83 1529

Sascha.Reischmann@terex.com

More used cranes on
www.terexusedcranes.com

© Terex Cranes 2019

M. Stemick GmbH
Kran- u. Baumaschinenhandel



ALL TERRAIN-CRANES

Make / Type	y. o. m.	Drive	Boom / Fly Jib
35 t Liebherr LTM 1030-2.1	2007	4x4x4	30,00m
45 t Faun ATF 45-3	2006	6x6x6	34,00m + 15,00m
50 t Terex-Demag AC 50-1	2007	6x6x6	40,00m + 17,60m
55 t Terex AC 55 L	2008	6x6x6	44,00m + 15,00m
55 t Terex-Demag AC 55 City	2006	6x6x6	40,00m + 13,80m
60 t Faun ATF 60-4	2005	8x6x8	40,00m + 16,00m
60 t Liebherr LTM 1060/2	2002	8x6x8	42,00m + 17,00m
60 t Liebherr LTM 1060/2	2004	8x6x8	42,00m + 17,00m
60 t Liebherr LTM 1060/2	2005	8x6x8	42,00m + 17,00m
80 t Terex-Demag AC 80-2	2004	8x6x6	50,00m + 17,60m
80 t Terex-Demag AC 80-2	2007	8x8x8	50,00m + 17,60m
80 t Terex-Demag AC 80-2	2007	8x6x6	50,00m + 17,60m
100 t Grove GMK 5100	2002	10x8x10	51,00m + 26,00m
100 t Terex-Demag AC 100	2005	10x8x8	50,00m + 17,00m
130 t Grove GMK 5130-1	2007	10x8x10	60,00m + 18,00m
130 t Grove GMK 5130-2	2013	10x8x10	60,00m + 18,00m
140 t Terex-Demag AC 140	2006	10x8x8	60,00m + 17,60m
160 t Liebherr LTM 1160-5.1	2008	10x8x10	62,00m + 7,00m + 36,00m
160 t Tadano Faun ATF 160G-5	2005	10x8x8	60,00m + 5,40m
160 t Tadano Faun ATF 160G-5	2006	10x8x8	60,00m + 31,20m
200 t Grove GMK 5200	2006	10x8x10	60,00m + 22,00m
350 t Terex-Demag AC 350 SSL	2002	12x8x10	58,00m + 18,10m + 49,10m + 71,50m

RT-TELESCOPIC-MOBILE CRANES

25 t Kato KR 250	1998	4x4x4	26,70m + 7,00m
------------------	------	-------	----------------

HARBOUR-MOBIL-CRANE

120 t Sennebogen HMC 6120	2000	8x4x8	37,00m
---------------------------	------	-------	--------

Tel: +49 2364 108203

Fax: +49 2364 15546

Mobile: +49 172 2332923

e-mail: info@stemick-krane.de

Internet: www.stemick-krane.de

M. STEMICK GMBH

Kran- u. Baumaschinenhandel, Import - Export
D-45721 Haltern / Germany

Import - Export

JRL

LONDON TOWER CRANES

HIRE & SALES

JOIST CRANES
AUTHORIZED
DEALER



YONGMAO

SAEZ
CRANES

TEREX | COMEDIL



Worldwide Sales
Nationwide Hire
Spare Parts Supply
Maintenance & Technical Support

ALL CRANES AVAILABLE

Luffing & Saddle Jibs

Jost

Saez

Yongmao

Comedil



4 Elstree Way, Borehamwood, Hertfordshire, WD6 1RN - Tel: 020 8327 4060 - Fax: 020 8236 9391

sales@londontowercranes.co.uk - Web: www.londontowercranes.co.uk - ISO 9001 Registered Company



Used Cranes from the Market Leader.



LR 1400/2 (2009)



LR 11350 (2010)



LG 1750 (2011)



LG 1550 (2007)



LR 1600/2 (2010)



LTM 1750-9.1 (2013)

Tried and Trusted Quality and Reliability

- Thorough inspection and repair/maintenance
- Guarantee on request
- International delivery service
- Wide selection of used cranes to choose from at used.liebherr.com

Liebherr-Werk Ehingen GmbH
P.O. Box 1361
89582 Ehingen/Do., Germany
Tel.: +49 7391 502-3333
E-mail: gebrauchtkrane.lwe@liebherr.com
www.facebook.com/LiebherrConstruction
www.liebherr.com

used.liebherr.com
**Used machines
from the manufacturer.**

Together. &
Now
Tomorrow.

Visit us at:
bauma
Munich, April 8th–14th
Find out more at
www.liebherr-bauma.com

LIEBHERR

INTERNATIONAL SALES & BARE RENTAL SOLUTIONS

ALL TERRAIN CRANES

2x 80 t	Grove GMK 4080-1	2013
1x 90 t	Liebherr LTM 1090-4.2	NEW!
1x 100 t	Liebherr LTM 1100-5.2	NEW!
1x 200 t	Liebherr LTM 1200-5.1	2016
1x 200 t	Liebherr LTM 1200-5.2	NEW!
1x 220 t	Grove GMK 5220	2014
1x 220 t	Demag AC220-5	NEW!
1x 220 t	Demag AC220-5	NEW!
1x 300 t	Grove GMK 6300L	2015
1x 300 t	Demag AC 300-6	NEW!
1x 450 t	Liebherr LTM 1450-8.1	NEW!

CRAWLER CRANES

1x 250 t	Kobelco CKE 2500-2	2008
1x 400 t	Demag CC 2400 SL	2009
1x 500 t	Liebherr LR 1500	NEW!
1x 650 t	Demag CC 3800 SL + wind kit	NEW!
1x 650 t	Demag CC 3800 SL	2013

ROUGH TERRAIN CRANES

1x	40 t	Grove RT 540E CE	2011
1x	55 t	Tadano GR 550XL-2	2013
1x	80 t	Terex RT780	2016
1x	120 t	TadanoGR 1200XL-3	2019
1x	160 t	Tadano GR 1600XL-3	2017/2019

Galvanistraat 39
NL-3316 GH Dordrecht
The Netherlands
info@hovago.com
+31(0)10 892 04 75

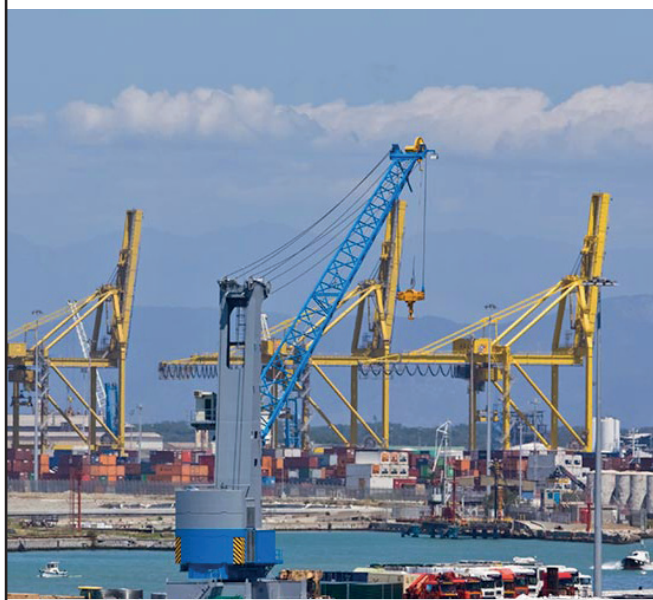


Established in 1946

Member of the ProDelta group

www.hovago.com

HOVAGO
Your global cranes partner



CONTACT

Ohmstraat 18, 3861 NB Nijkerk, The Netherlands
 ☎ (+31) 033 760 17 17 ✉ info@pinarciport.com



LIFTSOURCE MACHINERY LTD

GLOBAL SALES & RENTALS

Houston, TX 77024, USA

Large fleet in stock

Phone: +1 (713) 975-7702

e-mail: info@LSMcrane.com

ALL TERRAIN

LIEBHERR LTM1250-5.1 , 300 TON, '19, 197' BOOM, 69' JIB, RENT/RENT TO OWN.....	CALL
LIEBHERR LTM1160-5.2 , 190 TON, '19, 203' BOOM, 62' JIB, RENT/RENT TO OWN	CALL
LIEBHERR LTM1130-5.1 , 155 TON, '19, 197' BOOM, 62' JIB, RENT/RENT TO OWN	CALL

ROUGH TERRAIN

TADANO GR1600XL , 160 TON, '16 - '19, 200' BOOM, 59' JIB, SEVERAL IN OUR FLEET.....	CALL
TADANO GR1200XL , 100 TON, '18/'19, 184' BOOM, 58' JIB, SEVERAL IN OUR FLEET.....	CALL
TADANO GR1000XL , 100 TON, '14 - '19 154' BOOM, 58' JIB, SEVERAL IN OUR FLEET.....	CALL
TEREX RT780 , 80 TON, '16, 126' BOOM, 57' JIB.....	CALL
TADANO GR750XL , 75 TON, '14 - '18', 141' BOOM, 58' JIB. SEVERAL IN OUR FLEET.....	CALL

CRAWLER CRANES

TEREX-DEMAG CC3800, 715 TON, 315' BOOM,
275' LUFF, S.LIFT **CALL**
LIEBHERR LTR1220, 142 TON, 197' TELE-BOOM
72' JIB, RENT/RENT TO OWN..... **CALL**
LIEBHERR LTR1100, 110 TON, 171' TELE-BOOM,
62' JIB **CALL**

OVER 100 UNITS IN FLEET

CALL FOR ALL YOUR CRANE NEEDS!!



(2)'18 LIEBHERR LTR1100 110T. 600hrs

www.LSMcrane.com



With over 40 years of experience and a crane fleet of over 1000 units deployed globally.

Let's make us your one stop lifting solution provider!

GLOBAL CAPABILITY

LOCAL DELIVERY

SALES : Crawler Crane | Rough Terrain Crane

SERVICES : Crane Rental | Heavy Lifting

 Singapore | Malaysia | Thailand | Vietnam | Hong Kong
Indonesia | Myanmar | Brunei | Sri Lanka | China | Australia

Contact Us **+65-9675 1160 | +65-9666 8667**

Email : thhe@tathong.com.sg | thpl@tathong.com.sg

Website : www.tathong.com | www.ecranes.com



Authorised distributor for

INTERNATIONAL CRANES AND SPECIALIZED TRANSPORT

To advertise in the next issue of

International Cranes

and Specialized Transport

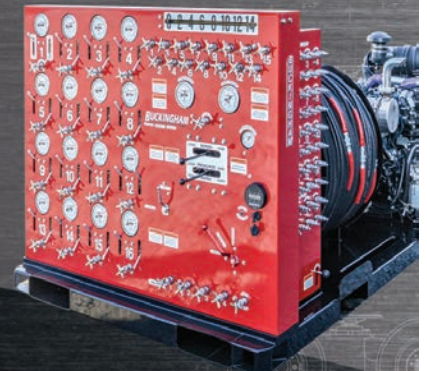
please contact Julia Bossie on:

Tel: (0)1892 786204

Fax: (0)1892 786258

E-mail: julia.bossie@khl.com

**SYNCHRONIZED
HYDRAULIC
LIFTING AND
MOVING
SYSTEMS**



BUCKINGHAM

STRUCTURAL MOVING EQUIPMENT

www.BuckinghamEquipment.com

(610) 488-8969

SMARTSTEER™
ADVANCED DOLLY SYSTEM

Computer-
Controlled
Electronic
Dolly
Steering
System



CRANES AND EQUIPMENT FOR SALE OR RENT



HOMAR B.V.

Import - Export Hydraulic and Lattice Boom Cranes

Tel: +31-341-253982 Web: www.homar.nl
E-mail: info@homar.nl

TELESCOPIC AT-CRANES

Capacity	Manufacturer	Type	Year	Drive/Steering	Boom/jib (m)	Delivery
450 t	Liebherr	LTM 1450 N	1992	16 x 8 x 14	50 / 61 / 84	direct
400 t	Liebherr	LTM 1400	1988	16 x 8 x 12	50 / 61 / 84	direct
350 t	Demag	AC 350	2002	12 x 8 x 10	56/18/49/71,5	direct
300 t	Liebherr	LTM 1300/1	2000	12 x 8 x 10	60/21/42/70	direct
200 t	Terex-Demag	AC 200-1	2007	10 x 8 x 8	68 / 17	direct
200 t	Grove	GMK 5200	2006	10 x 8 x 10	60 / 22+runn	direct
160 t	Liebherr	LTM 1160-5.1	2008	10 x 8 x 10	62+7 / 36	direct
160 t	Faun	ATF 160 G-5	2006	10 x 8 x 8	60 / 31,2 + runn.	direct
160 t	Faun	ATF 160 G-5	2005	10 x 8 x 8	60 / 5,4 + runn.	direct
140 t	Terex-Demag	AC 140	2006	10 x 8 x 8	60 / 17,6+1,5	February
130 t	Grove	GMK 5130-2	2013	10 x 8 x 10	60 / 18	direct
130 t	Grove	GMK 5130-1	2007	10 x 8 x 10	60 / 18	direct
120 t	Liebherr	LTM 1120/1	2000	10 x 6 x 10	56 / 28+runn.	direct
120 t	Liebherr	LTM 1120	1990	10 x 8 x 8	42 / 17	direct
100 t	Terex-Demag	AC 100-4	2010	8 x 8 x 8	50 / 19	direct
100 t	Terex-Demag	AC 100	2006	10 x 8 x 8	50	direct
100 t	Terex-Demag	AC 100	2005	10 x 8 x 8	50 / 17	direct
100 t	Grove	GMK 5100	2005	10 x 6 x 10	51 / 18	direct
100 t	Liebherr	LTM 1100-4.1	2004	8 x 8 x 8	52 / 19	direct
100 t	Grove	GMK 5100	2002	10 x 8 x 10	51/26+2,5+run	direct
100 t	Demag	AC 265	1989	8 x 8 x 8	37 / 17	direct
90 t	Liebherr	LTM 1090-4.1	2006	8 x 8 x 8	50 / 19	direct
80 t	Terex-Demag	AC 80-2	2007	8 x 8 x 8	50 / 17,6	direct
80 t	Faun	ATF 80-4	2006	8 x 8 x 8	48,5 / 16	direct
80 t	Terex-Demag	AC 80-2 (2x)	2004	8 x 8 x 8	50 / 17,6	direct
80 t	Grove	GMK 4075	2001	8 x 8 x 8	43,2 / 17	direct
70 t	Liebherr	LTM 1070-4.2	2011	8 x 6 x 8	50 / 16	January
70 t	Liebherr	LTM 1070-4.1	2007	8 x 6 x 8	50 / 16	February
65 t	Faun	ATF 65 G-4	2008	8 x 6 x 8	44	direct
60 t	Terex-Demag	AC 55 L	2008	6 x 6 x 6	44 / 15	direct
60 t	Faun	ATF 60-4 (2x)	2005	8 x 6 x 8	40 / 16	direct
60 t	Faun	ATF 60-4	2004	8 x 6 x 8	40 / 16	direct
60 t	Liebherr	LTM 1060/2	2004	8 x 6 x 8	42 / 17	direct
60 t	Liebherr	LTM 1060/2	2002	8 x 6 x 8	42 / 17	direct
60 t	Liebherr	LTM 1060/2	2001	8 x 6 x 8	42 / 17	direct
60 t	Liebherr	LTM 1060/2	2000	8 x 6 x 8	42 / 17	direct
55 t	Grove	GMK 3055	2006	6 x 6 x 6	43	direct
55 t	Terex-Demag	AC 55 City	2006	6 x 6 x 6	40 / 13,8	direct
55 t	Liebherr	LTM 1055-3.1	2005	6 x 6 x 6	40 / 16 + 2,5	direct
50 t	Terex-Demag	AC 50-1	2007	6 x 6 x 6	40 / 17,6	direct
45 t	Faun	ATF 45-3	2006	6 x 6 x 6	34 / 15,2	February
40 t	Terex-Demag	AC 40-1 City	2010	6 x 6 x 6	31,2 / 13+1,2	direct
40 t	Liebherr	LTM 1040-2.1	2006	4 x 4 x 4	35	direct
40 t	Terex-Demag	AC 40-1 City	2005	6 x 6 x 6	31,2 / 13+1,2	direct
35 t	Liebherr	LTM 1030-2.1	2007	4 x 4 x 4	30	direct
35 t	Terex-Demag	AC 35 L	2005	4 x 4 x 4	37,4 / 8	direct

ROUGH TERRAIN CRANES

35 t	Grove	RT 540 E	2012	4 x 4 x 4	31 / 13,7	direct
25 t	Kato	KR 250	1998	4 x 4 x 4	26,7 / runner	direct

More machines, crane details and photos on: www.homar.nl

ZWAGERMAN GROUP

WE LIFT YOUR BUSINESS



HITACHI-SUMITOMO
SCX 800 A-3 - 80 T. MACHINE

Proud to announce recently added to our fleet of 30 -300t. crawler cranes for rental and sales:

Liebherr LR 1300 - Liebherr HS 8130 HD - Liebherr HS 8100 HD

Hitachi-Sumitomo SCX 800A-3 - 5 units of Liebherr LR 1160's

Zwagerman Group, Middenweg 81,
1394 AE Nederhorst den Berg, The Netherlands
Telephone: +31 (0) 294 253377 e-mail: info@zw-cranes.com

www.zw-cranes.com

For a wide variety of used cranes look no further than...

KHL CraneMarket

The online market place for buyers and sellers of used cranes

The unique Crane Market package offers you three ways to sell used cranes in one simple to use package.

Online

khlcranemarket.com: unlimited crane listings, pictures, detailed descriptions, contact details and company logo

Digital

e-mail marketing: in the KHL Crane Market e-Newsletter. Your featured cranes in an e-newsletter sent to more than 29,000 potential buyers worldwide every two weeks

Print

A quarter page advertisement in the Marketplace section of *International Cranes and Specialized Transport*



khlcranemarket.com

To find out more see the website or contact Julia Bosie

e-mail: julia.bossie@khl.com • tel: 0044 (0)1892 786204

AMERICAN CRANES & TRANSPORT
ACT

INTERNATIONAL
CRANES
AND SPECIALIZED TRANSPORT

khl

MAMMOET

Used equipment

CRANES FROM 10-5000T

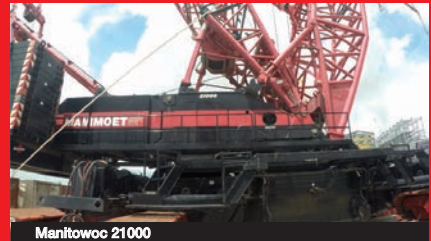
**SPECIAL
OFFER**



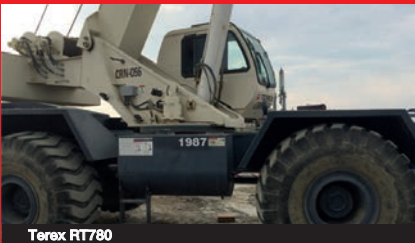
Kobelco CKE1100 (more units available)



Broderson IC-200 (more units available)



Manitowoc 21000



Terex RT780



Mercedes-Benz Actros 4165 SLT 6x4



4- and 6-line Kamag SPMT (more units available)



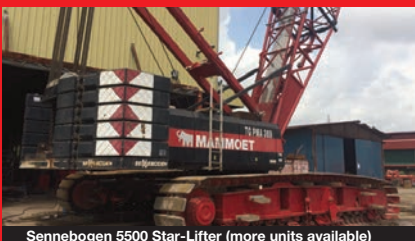
Liebherr LR1200 SX (more units available)



Tadano GR300XL



Liebherr MK80



Sennebogen 5500 Star-Lifter (more units available)



Nicolas trailer (also 2 and 4-lines available)



Tadano-Faun ATF65G-4



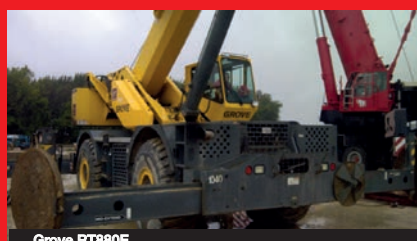
Terex-Demag CC2800-1 (more units available)



Liebherr LR1300 SX (more units available)



Grove TMS900E (more units available)



Grove RT880E



Mammoet Equipment B.V.
Van Deventerlaan 30-40
3528 AE Utrecht
The Netherlands
☎ +31 (0)88 6502324
✉ usedequipment@mammoet.com
🌐 www.mammoetusedequipment.com

www.mammoetusedequipment.com

elebia®

smart lifting solutions



eMAX
REMOTE CONTROL



evo automatic lifting hooks

NEO20 lifting hook

C5 automatic
lifting clamps

elebia, the market leader in automatic lifting solutions and equipment with the patented evo automatic lifting hooks, C5 automatic lifting clamps and NEO20 lifting hook for bell furnaces. Remotely attach and release any load with no handling. Increase productivity, enhance safety and minimise risks in a fail-safe way in all your lifting operations.

elebia does the rigging for you



Stevedore, windpower, steel mills, mining, aeronautics, nuclear, construction... No matter what your industry is elebia will boost the safety and productivity of your cranes.

elebia autohooks s.l.u · Tel. (+34) 93 543 4706 · www.elebia.com · info@elebia.com

