

cranes & access

An aerial photograph of a red spider crane on a green lawn. The crane has four legs extended outwards, each ending in a small mat. A large tree is visible in the background. The crane is positioned diagonally across the frame.

www.vertical.net

October 2020 Vol.22 issue 7

**All Terrain
cranes**

**Truck
mounted lifts**

**Rental
software**

**Outrigger
mats**


NEW


WHEN SUCCESS IS YOUR ONLY CHOICE.

Next-level performance. The ATF-140-5.1.

State-of-the-art technology to handle even the most demanding requirements: with its new engine and gear technology in line with EU Stage V standards, the ATF-140-5.1 is more powerful than ever and even saves on fuel. Enhanced lifting capacities, incredible versatility on the road, outstanding handling thanks in part to the additional assistance systems, and exceptional equipment make the crane highly flexible – for you, for maximum capacity utilisation, and for long-term success.

The ATF-140-5.1: optimal versatility for your success.

Max. Lifting Capacity	Boom	Boom Extension	Max. Sheave Height	Max. Radius	Engine (carrier, superstructure)	Gear
140 t	12.8 m – 60 m	3.8 m – 32 m	95 m	72 m	390 kW (530 HP), 129 kW (175 HP)	10 x 6 x 10 (optional 10 x 8 x 10)

On the cover:

The new 17.9m CMC S18F spider lift unveiled last year is now in production.



C&A contents

17

All Terrain cranes



27

Truck mounted platforms



41

Outrigger mats



SUBSCRIPTIONS: Cranes & Access is published nine times a year and is available on payment of an annual subscription of £40.00. If you wish to subscribe, please send a crossed cheque made payable to The Vertical Press Ltd to: Subscriptions, The Vertical Press, PO Box 6998, Brackley, Northants NN13 5VY. Address changes should also be sent to this address. Please include the address label from a recent issue with all correspondence and allow 3 months for changes to be effective.

SUBSCRIBE ONLINE AT:

www.vertical.net/en/journal_subscription.php

BULK DISCOUNTS: These are available to companies wishing to take out multiple subscriptions. Please contact the subscriptions manager for more details.

Tel: +44 (0)8448 155900 Fax: +44 (0)1295 768223

E-mail: info@vertical.net

Kran & Bühne: The Vertical Press also publishes a German magazine which deals with the same issues as Cranes & Access, but is written for German users and buyers. Details available on request.

While every effort is made to ensure the accuracy of information published in Cranes & Access, the Editor and Publisher can accept no responsibility for inaccuracies or omissions. Views expressed in articles are those of the authors and do not necessarily reflect those of the Editor or Publisher. Material published in Cranes & Access is protected under international copyright law and may not be reproduced without prior permission from the publishers.

Comment 5

News 6



Liebherr's new 150 tonner, Palazzani enters spider crane market, Genie Z-62/40 TraX launched, Tadano seeks formal restructuring, Vertikal Days moves to Peterborough, Cargotec and Konecranes to merge, New Klaas trailer crane, Hyva adds 60t/m cranes, Tadano GTC-1800EX telecrawler launch, New Imer spider lift, LGMG tops electric scissor lift range, 26m Comet/Morooka platform, New AMCS tower/mobile crane anti-collision system, New Ascendant platform, plus a roundup of financials and news highlights.

All Terrain cranes 17



In the first of two instalments looking at the 100 to 180 tonne All Terrain crane market, Will North looks at the choices available in the 100 to 120 tonne class and talks to leading manufacturers about the considerations driving their latest developments.

Truck mounted platforms 27

With strong growth at the top end of the big truck mounted lift market, we take a look at the latest models in the 70 to 75 metre range. We also speak with UK based rental group Blade Access - which runs the world's largest fleet of platforms over 100 metres - to learn more about its approach to the market, and survey the operators of the three different 90 metre platforms currently available.



Access and lifting for arborists 37

Given that the use of powered access and mobile cranes in the tree care industry has been growing rapidly over the past 10 years, we conducted a survey of those working at the hard end of the market to gather their thoughts and views on the use of powered access and cranes for tree work.



Outrigger mats 41

In our 15th annual look at outrigger mats, spreader plates and proper outrigger set up, we focus on the importance of spreading outrigger and wheel point loadings, how serious ground related incidents continue to occur, and the importance of understanding how loads are spread on harder ground.



Rental Software 49

We sat down with some of the leading rental software providers around the world to investigate underutilised features and solutions built into their systems that companies in our industry all too often fail to take advantage of.



regulars

Training 57

IPAF Focus 59

ALLMI Focus 61

PASMA Focus 63

CPA 65

Models 67

Letters and obituaries 69

What's on 73

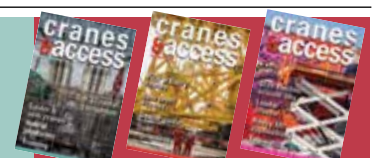
Online directory 76

In the next C&A

The next issue of Cranes & Access, scheduled for the end of November, will include features on alternative lifting and transportation, remote control technology and mast climbers and hoists. It will also include a feature on spider lifts within the arborist sector as well as the second instalment of our look at the 100 to 180 tonne All Terrain market. If you have any contributions or suggestions to make, or are interested in advertising in this issue, please contact us today.

cranes & access

SUBSCRIBE TODAY - the only way to guarantee your copy
WWW.VERTICAL.NET/EN/SUBSCRIPTIONS





Certified IPAF PAL Card is proof
of platform operator training to
the highest standard.

- ✓ Annually updated course content based on feedback from instructors and trainees

- ✓ Global database of all valid PAL Card holders

- ✓ Complies with legal requirements



- ✓ Training delivered by highly qualified instructors

- ✓ Focus on safety & efficiency

- ✓ Online verification of PAL Cards:
www.ipaf.org/checkpal

- ✓ Over 30 years of industry experience

- ✓ Smart technology & fraud protected

- ✓ Comprehensive range of training courses

- ✓ Now able to carry the CSCS logo in the UK

- ✓ Courses available in multiple languages

- ✓ Used by manufacturers of equipment worldwide

- ✓ Reassurance: A valid PAL Card proves the holder has passed an approved and audited IPAF theory and practical test within the past five years

- ✓ Optimal instructor-to-candidate ratio

- ✓ Operator theory module can be taken remotely via eLearning

✓ Safe. ✓ Audited. ✓ Internationally recognised.

The IPAF Powered Access Licence or PAL Card is recognised worldwide across industries as proof of platform operator training to the highest standard. It is issued by the International Powered Access Federation (IPAF) to platform operators who successfully complete a training course and pass a test at an IPAF-approved training centre. Ask for the PAL Card as proof of operator training!

Find your nearest IPAF approved training centre at www.ipaf.org

Certified by TÜV
as conforming to
ISO 18878



Editorial team

Ed Darwin - Editor
editor@vertikal.net

Associate editors

Rüdiger Kopf (Freiburg)
Alexander Ochs (Freiburg)
Leigh Sparrow

Consultant editor

Mark Darwin

Sales & customer support

Pam Penny
Clare Engelke
Karlheinz Kopp

Production/Administration

Nicole Engesser

Editorial data specialist

Poppy Horne ph@vertikal.net

Subscriptions

Lee Sparrow

Publisher

Leigh Sparrow

Advertising sales

UK-based

Pam Penny pp@vertikal.net
Tel: +44 (0)7917 155657
Clare Engelke ce@vertikal.net
Tel: +44 (0)7989 970862

Germany-based

Karlheinz Kopp khk@vertikal.net
Tel: +49 (0)761 89786615

The Vertikal Press

PO box 6998 Brackley NN13 5WY, UK
Tel: +44(0)8448 155900
Fax: +44(0)1295 768223
email: info@vertikal.net
web: www.vertikal.net

Vertikal Verlag

Sundgaullee 15, D-79114,
Freiburg, Germany
Tel: 0761 8978660 Fax: 0761 8866814
email: info@vertikal.net
web: www.vertikal.net

Vertikal Press

MEMBERS OF:



ISSN: 1467-0852

© Copyright The Vertikal Press Limited 2020



New technology a blessing or a curse?

New technology can be a blessing or a curse. It can revolutionise the way you do something, but it can also result in complete frustration and disrupt the very activity it was meant to streamline.

As an example I have just purchased a new tumble dryer, to replace a state of the art machine with a heat pump, condenser and all manner of sensors, timers and fancy programmes. Unfortunately didn't do what it was supposed to do – dry clothes quickly and efficiently. Even when it did my wife complained that it took too long or - three times longer

than the washing machine or simply decided that the clothes were dry when they weren't – result a bottleneck!

The manual was scrutinised for clues, the sensors and filters were checked, cleaned and rechecked, we spoke to the manufacturer, went on tech forums, but it seems these machines take longer, and the sensors can be fickle. So we shopped around for a new machine, the advice was – if you want a dryer to be fast and reliable you need a conventional machine! Back to the future? The choice of old school vented dryers is limited these days, and they are blissfully cheap. So I held my nose and ordered a brand new machine with a 'C' energy rating! My wife's theory is as it only takes an hour it will be more efficient than the A++ model that takes over three hours. I'm not sure I buy her logic unless Volkswagen is testing tumble dryers these days?

The lifting industry has also been dogged with technology introductions before they were quite ready. Thankfully most have become reliable and have changed the way we do things. The first All Terrain cranes were hideously unreliable, Grove's AT180 – a Gottwald rip off – was among the worst, at a time when the company had no experience of unreliability. Grove CEO Martin Benchoff ordered his engineers to buy a Liebherr LTM1025 to learn the German's secret. The engineers soon reported that the Liebherr was almost as bad as the AT180 in terms of break downs.

Benchoff decided that the technology was not fit for purpose and would never catch on, pulling Grove out of the market – only to be forced to buy back in by acquiring Krupp acquisition after All Terrains had become the cranes of choice. Other technologies that had had their challenges include work platform overload systems, electrohydraulic controls and please don't talk to me about early boom pinning systems!

In our tree worker survey (page 37) several respondents claimed that lift reliability has prevented their wider usage. Rental software has also had its challenges in the past, along with diesel emission technology. However I've yet to hear negative feedback on variable outrigger sensing and load chart/working envelope calculation, even though it is highly sophisticated technology.

While new technology can be hugely disruptive, it invariably comes of age and transforms our lives. I am pretty sure I'm not 'ahead of the curve' buying a 'C' rated dryer and look forward to replacing it with a reliable A+++++ model.

Leigh Sparrow

Comment and feedback is most welcome via post, email, fax or phone stating if we may publish them or not: editor@vertikal.net