

Contents

CIMdata News	2
TCS: From Systems Integrator to Systems Innovator: a CIMdata Commentary	2
Acquisitions	5
Stratasys to Acquire GrabCAD, a Leading 3D CAD Collaboration Platform	5
Company News	6
Agilent Technologies Announces CEO Transition: Mike McMullen to Succeed Bill Sullivan in March 2015	6
Autodesk and Local Motors Collaborate on First Spark 3D Platform Implementation	7
Barry-Wehmiller International (Formerly BWIR) Announces Its New Identity	8
Boston Engineering Named a PTC Reseller for New York, New Jersey, and Pennsylvania	9
BuildIT Software & Solutions Ltd. to Offer Siemens PLM Software's NX CMM and DPV	10
Capricot is Now Representing Eagle Point's Pinnacle Series in India	10
Detroit Lions & Tata Technologies Launch STEM Programs in 2 Detroit Schools	11
IMAGINiT Technologies Challenges Design Engineers to Enter IMAGINiT's RENDERiT Contest	12
Infor OEM Licenses Aras PLM Platform and Solution Suite	13
Lectra Appoints Edwin Ingelaere as Director, Lectra Northern Europe	13
Missler Software Joins the European Project FibreChain for the Control of Robots	14
N+P and Stabiplan Strategic Partners for German Market	15
New SENNER Directors for Asia and Pacific	16
PTC Axeda® Technology Named 2014 Innovative Technology of the Year for Internet of Things	17
Simpleware Sign Reseller Agreement for Colombian Market	17
Third Wave Systems, IMS Software Partner	18
Events News	19
Altair to Showcase Oil and Gas Simulation Technology in Houston	19
Delcam to Show Helmet Machining Demonstration on Four Stands at BIMU	20
Delcam's PartMaker 2015 to have UK Preview at Tornos Event	20
ITI TranscenData Features "Migrate, Integrate and Validate" Solutions at PLM Europe 2014	21
New Polygonica Features on Display for TCT Show + Personalize 2014	22
Pointwise Announces Presenter Lineup for User Group Meeting	23
TopSolid 7 Live at AMB, Stuttgart, September 16-20, Stand 4C46	24
Vero Software Strongly Represented at MICRONORA 2014 Trade Fair	24
Financial News	25
ESI Group: Revenue for the 1 st Half of 2014	25
Infor Reports Q1 License Revenue at Double-Digit Growth	27
Implementation Investments	28
Ben Ainslie Racing Using STAR-CCM+ Simulation Software to Design 35th America's Cup Racing Boat	28
Elmos Selects Synopsys' Custom and Digital Design Solutions	28
Leading Russian Water Company Selects AVEVA for Advanced 3D Modelling	29
Major Taiwanese DMS Company Pegatron Establishes New PCB Design Flow through Technical Cooperation with Zuken	30
Mountain Equipment Co-op (MEC) Selects Visual 2000 PLM	31
RLM Welcomes Three New FashionManager Clients	31
Scotch & Soda Selects Centric Software Product Lifecycle Management	32

CIMdata PLM Industry Summary

Ukrainian Research Lab Adopts C3D's Kernel for Analysis Software	33
Product News	34
Altair HyperWorks® 13.0 Advances Current Product Design Trends	34
Aras Announces OEM Licensing Program for Advanced PLM Suite and Underlying Platform Technology	36
ASCON Adds Functional Enhancements to KOMPAS-3D V15	37
Ashampoo 3D CAD Architecture 5 – Computer Aided Design for Everyone	38
BobCAD-CAM Releases New V27 CAD-CAM Software Series	39
Dassault Systèmes Introduces SOLIDWORKS 2015	41
Delcam's New FeatureCAM More Powerful and Easier to Use	43
Dremel Builds On Legacy of Easy-To-Use Tools with Introduction of 3D Printer	44
IC3D Introduces IC3D Steel 2.0 with Improved Management Features	46
Infor and Aras Deliver Transformative Cloud PLM Solution	47
Mentor Graphics and Lumerical Unify Optical Design and Simulation Flow	48
MSC Software & e-Xstream Engineering Announce New Release of Digimat 5.1.1	49
Nemetschek Vectorworks Releases Vectorworks 2015 Software	50
QuadriSpace announces 2014 products with Solid Edge compatibility for 3D Publishing and Collaboration	50
The Future of Making Things Just Got Easier With Autodesk Fusion 360 and the Mac App Store	51
TraceParts Releases a New Free 3D Mobile Application to Bring More Flexibility and Freedom to Design Professionals	52
VCollab Enhances CAE Results Comparison	53
ZW3D 2014 SP Released with Enriched 3D Modeling and CNC Machining Advancements	53

CIMdata News

TCS: From Systems Integrator to Systems Innovator: a CIMdata Commentary

18 September 2014

Key takeaways:

- *Tata Consultancy Services (TCS), a global systems integrator, grew 16 percent to \$13.4 billion in its most recent fiscal year, and is a solid and growing player in the market for product lifecycle management (PLM) services and technology*
- *TCS is developing business platforms and associated technologies around the digital five forces driving information technology: social media, mobility & pervasive computing, big data & analytics, cloud computing, and artificial intelligence/robotics*
- *The TCS Co-Innovation Network (COIN™) provides the framework for uniting stakeholders on high-value problems and leading-edge solutions, leveraging a wide range of stakeholders and TCS' global talent pool*
- *This collaborative, innovation-centric approach is powering TCS' journey from a systems integrator to a systems innovator*

Companies of all sizes rely on enterprise software to help manage many aspects of their business. These solutions are often implemented by systems integrators (SIs), service firms specializing in the organizational and technological consulting necessary to adapt and connect software to meet corporate

CIMdata PLM Industry Summary

needs. For many SIs, this includes enabling product lifecycle management (PLM) strategies. CIMdata tracks this aspect of the services market as part of our global PLM Market Analysis Report (MAR) series.

Over the last several years, many large SIs have had mixed results both in PLM and in their broader services businesses. A bright spot has been Tata Consultancy Services (TCS), a global firm that posted a 16 percent gain to \$13.4 billion in its most recent fiscal year. With headquarters in India, TCS has over 300,000 consultants (of 118 nationalities) that work in 46 countries around the world. Its PLM-specific consulting has also produced solid gains, in part through its alliances with Dassault Systèmes, Oracle, SAP, and Siemens PLM Software. CIMdata had the opportunity to learn more about the firm at its 10th Annual Innovation Forum in Cincinnati, Ohio, on May 21 through 22, 2014, and at a subsequent visit to its Silicon Valley Customer Collaboration Center (SVCCC) in Santa Clara, California.

These interactions made clear that TCS is much more than a systems integration firm, illustrating the breadth of its vision, strategy, and execution. About fifteen years ago, TCS decided to expand its efforts on innovation. This is common among SI firms, as they seek to capture more of the value they add for their industrial clients, beyond just delivering services. For example, in the PLM economy, TCS is known for developing Teamcenter-based industry solutions in medical devices and retail for Siemens PLM Software.

TCS takes a much broader view, looking to create its own intellectual property, with a focus on collaborative innovation. The vehicle for its collaborative efforts is COIN, the [TCS Co-Innovation Network](#). Led by TCS's Innovation Labs and leveraging TCS's global talent pool, the network includes academic institutions, start-ups, venture funds, strategic alliance partners, multilateral organizations, key clients, and other companies from the Tata Group. TCS has done quite well using this approach, with 129 patents granted to date. Their efforts are being recognized in the business world. For example, the most recent Forbes "Most Innovative Companies" list ranked TCS 57th, the top-ranked IT services firm. TCS's current emphasis is on what it calls Digital Reimagination™, a trademarked phrase that is central to its strategy. TCS spoke about the "Digital Five Forces": mobility and pervasive computing; big data and analytics; social media; cloud computing; and artificial intelligence (AI) and robotics. Using a combination of these digital five forces to reimagine business will drive fundamental change in business models and processes, products and services, customer segments, channels, and in the workplace. TCS believes that the winners in the next era in business will be those who reimagine themselves to best leverage these innovative solutions. TCS also believes that working with leading customers and through COIN, it can provide sustainable differentiation and competitive advantage.

The TCS Innovation Forum served to highlight its collaborative innovation efforts. Over 220 attendees heard presentations from a comprehensive mix of customers (from eight different industries, including P&G, Chrysler, Transalta, and Humana), partners (SAP, MIT, Stanford University, Middlesex University, Blumberg Capital), and TCS subject-matter experts. The first evening of the Forum also served as an inauguration of the TCS Innovation Lab – Cincinnati, at its Seven Hills park facility in Milford, Ohio. The 223-acre facility houses about 600 people, and was sighted to both support local customers and to take advantage of what TCS claims is a large local talent pool.

At the evening session, which featured work with two COIN Partners (Sourcemap and Solace Systems), attendees engaged in one-on-one interactions with TCS researchers focused on:

- Improving Lives with Modern Healthcare Techniques
- Reliable & Sustainable Consumer-Centric Utility

CIMdata PLM Industry Summary

- Next Gen Solutions for the Manufacturing Industry
- Reimagining Retail
- Security & Privacy
- Connected Solutions for Connected Opportunities

An example from the Forum illustrates just how TCS is helping its leading customers with a combination of TCS-developed technologies, and targeted services, to rethink its business in light of one digital force, mobility.

Eaton is a global power management company with 2013 revenues of \$22 billion. Its 103,000 employees develop products sold to customers in more than 175 countries. To support that global reach, Eaton must produce and distribute up-to-date product information to employees, partners, and customers, in far-flung locations. Historically that meant printed catalogs. Eaton knew that mobile was the answer for easy-to-access information, and turned to its strategic partner TCS for help.

Eaton wanted to provide timely access to accurate product information to its increasingly mobile audience. The goal was to develop one single global application, providing consistent functionality and user experience for employees, channel partners, and end users to select and purchase electrical products. Eaton established a global mobility council to approve all functionality and to support global deployment that included representatives from both IT and global marketing. This new platform, POWEREDGE™, launched for iOS in December 2011, and now boasts 14,000 users globally, in fourteen different countries and in eleven languages. Users can search catalogs, view product videos, find local channel partners, and launch product-related tools, like calculators and selectors. Users can also tailor the content, building their own custom libraries and favorites. Usage is fairly balanced between iPhone (54 percent) and iPad or iPod (46 percent).

Eaton's success with POWEREDGE did not go unnoticed. In 2012, CIO Magazine named Eaton to its CIO 100, referring to POWEREDGE as "indispensable." Internally, Eaton estimated they saved \$2 million in printing costs and improved sales force productivity while also improving customer satisfaction. Going forward Eaton plans global rollouts to thirteen new countries in three new languages in 2014. An Android version will also be released in 2014. New versions will support improved product data hub integration and enhanced functionality. For TCS, it was work with customers like Eaton and others for which TCS was recognized in 2014 as a leader in mobile development and deployment by [IDC](#).

Following the TCS Innovation Forum, CIMdata visited the TCS Silicon Valley Customer Collaboration Center in Santa Clara, California, which drove home just how central that collaborative innovation is to the TCS strategy. Our sessions graphically illustrated how TCS is leveraging the energy, ideation, and spirit of the Silicon Valley to provide a "garage" for its customers—providing access to the best and brightest, brainstorming on ideas, and backing this up with its vast global talent pool. Some customers work on site, but most collaborate remotely. The management team in Santa Clara has a very strong background: solid technical skills, experience with start-ups and new industries, while maintaining its connections to work the network for the benefit of TCS and its customers. The Collaboration Center includes an in-house incubator for early-stage firms, a user experience design lab that partners with the design school at Stanford and includes advanced eye tracking, and other leading edge research tools.

In summary, this deep dive with TCS illustrated how its focus on innovation is really staging an organizational and technological platform that anticipates its clients' needs. Its solutions are going far beyond just services improvements to build business platforms for the industries it serves. This focus on

CIMdata PLM Industry Summary

platforms is consistent with CIMdata's recent work emphasizing the importance of business platforms in the PLM economy. Building consistent platforms and tools helps put quality into the solutions delivered that is less affected by staff turnover, delivery location, and other issues associated with the SI business. TCS' business platforms will help clients innovate faster, getting to market earlier to capture first-mover advantages. Collectively these actions have helped to reimagine TCS itself, powering its evolution from a systems integrator to a systems innovator—a company that builds intellectual property as a means to an end, not just for license fees. These early returns bode well for the future. This approach should continue to serve TCS, its customers, and the broader economy well, as those incubated businesses and technologies take root and grow.

About CIMdata

CIMdata, an independent worldwide firm, provides strategic management consulting to maximize an enterprise's ability to design and deliver innovative products and services through the application of Product Lifecycle Management (PLM). CIMdata provides world-class knowledge, expertise, and best-practice methods on PLM. CIMdata also offers research, subscription services, publications, and education through international conferences. To learn more about CIMdata's services, visit our website at <http://www.CIMdata.com> or contact CIMdata at: 3909 Research Park Drive, Ann Arbor, MI 48108, USA. Tel: +1 734.668.9922. Fax: +1 734.668.1957; or at Oogststraat 20, 6004 CV Weert, The Netherlands. Tel: +31 (0) 495.533.666.

 [Click here to return to Contents](#)

Acquisitions

Stratasys to Acquire GrabCAD, a Leading 3D CAD Collaboration Platform

16 September 2014

[Stratasys Ltd.](#) today announced that it has entered into a definitive agreement to acquire privately-held GrabCAD, Inc. in an all-cash transaction. Terms of the transaction were not disclosed. The transaction is expected to be completed by the end of September, subject to the fulfillment of customary closing conditions. Upon completion of the transaction, GrabCAD will operate as a unit within the Stratasys Global Products and Technology Group. Hardi Meybaum, Co-founder and Chief Executive Officer of GrabCAD, will continue to lead GrabCAD within the group.

Founded in 2010 and led by Mr. Meybaum, an entrepreneur and pioneer in 3D CAD cloud collaboration tools, GrabCAD is helping engineers get products to market faster by connecting people, content and technology. GrabCAD offers GrabCAD Workbench, a cloud-based collaboration tool that enables engineers and designers to share, view and manage CAD files and other design data. GrabCAD is also home to a community of more than 1.5 million members from around the world who can access a large public CAD file library as well as connect with other engineers.

The acquisition is expected to enable Stratasys to provide its customers with enhanced collaboration tools and improved accessibility relating to 3D CAD content. The addition of GrabCAD Workbench provides Stratasys with an opportunity to drive communication and ease of use throughout the 3D printing process and grow its technology solutions and user communities.

"The addition of GrabCAD provides Stratasys with a leading cloud-based collaboration platform for

CIMdata PLM Industry Summary

engineering teams to manage, share and view CAD files," said David Reis, Stratasys Chief Executive Officer. "By increasing the collaboration and accessibility of 3D CAD files, we believe we can further accelerate the adoption of 3D printing solutions and Stratasys' product offerings. Together with GrabCAD, we believe that we will accelerate innovation and provide increased value to a growing universe of customers seeking to utilize 3D printing solutions. We also welcome GrabCAD's active and important community to the Stratasys family. The potential within our 3D ecosystem is very exciting."

"GrabCAD was founded to bring the world's engineers together and help them collaborate to bring better products to market faster," said Hardi Meybaum, Chief Executive Officer of GrabCAD. "By joining forces with Stratasys, a global leader in 3D printing and additive manufacturing, we believe we can extend the reach of one of the most exciting and innovative design collaboration technologies available. With its broad and growing customer base and worldwide presence, Stratasys can provide more customers around the world with exciting new solutions to meet their design needs."

Benefits of the Transaction

Through its acquisition of GrabCAD, Stratasys expects to gain:

- **Knowledge:** With the addition of GrabCAD, Stratasys gains an industry leading team of software professionals with a deep understanding of the needs of designers and engineers.
- **Products:** GrabCAD's cloud-based collaboration platform, Workbench, will enable Stratasys to offer customers a solution to drive communication and ease of use throughout the design and 3D printing process. GrabCAD also provides Stratasys with the opportunity to further partner with CAD vendors and other ecosystem partners while offering innovative collaboration tools related to 3D CAD.
- **Community:** GrabCAD has built a global, leading and fast growing community of mechanical engineers and designers, with 1.5 million users who are passionate about design. This includes a large online community of M-CAD users and a significant public online repository of free CAD files, with more than 500,000 CAD designs available for download and nearly 50,000 file downloads per day.

 [Click here to return to Contents](#)

Company News

Agilent Technologies Announces CEO Transition: Mike McMullen to Succeed Bill Sullivan in March 2015

18 September 2014

Agilent Technologies Inc. today announced that Mike McMullen, senior vice president, Agilent, and president of the company's Chemical Analysis Group (CAG), will succeed William (Bill) Sullivan as CEO on March 18, 2015. Sullivan will remain as an advisor through the end of the company's fiscal year, Oct. 31, 2015, when he will retire.

As a first step in the transition, Agilent's board of directors has appointed McMullen president and chief operating officer, effective immediately.

CIMdata PLM Industry Summary

"This transition is the culmination of our succession planning, and comes at a time of strength as Agilent begins to deliver the shareholder benefits of the recent spinoff of its electronic measurement business," said James Cullen, chairman of Agilent's board of directors. "Bill has been an excellent CEO, providing strong leadership in evolving Agilent's portfolio from diversified technology to its current focus on life sciences, diagnostics and applied markets. He has exceptional vision and an extraordinary drive to achieve outstanding results."

Sullivan, 64, has been president and CEO of Agilent since March 2005. He joined Hewlett-Packard, Agilent's predecessor company, in 1976.

"I am very proud of what our teams have accomplished over the past 10 years," said Sullivan. "Agilent's re-launch is the perfect time to begin the CEO transition. Mike is an excellent choice to lead the company. He transformed CAG, reshaping its portfolio and championing key acquisitions that have resulted in a consistent, market-leading record of profitable growth."

"Mike has the depth of experience, market knowledge and inspiring leadership style that will make him an outstanding CEO," Sullivan added. "It is a great opportunity to further leverage the skills of an Agilent executive with an exceptional track record."

McMullen, 53, has been senior vice president, Agilent, and president of the company's CAG since 2009.

As president and COO, McMullen will be responsible for the company's businesses, CAG and Life Sciences and Diagnostics Group, Order Fulfillment and the newly formed Agilent CrossLab Group, as well as the global organization that houses IT, workplace services, global sourcing and logistics.

McMullen joined Hewlett-Packard Co. in 1984 as a financial analyst in the Analytical Products Group. Since then he has served in various senior management positions. As president of Agilent's Chemical Analysis business, he was responsible for companywide organizations in the chemical and energy, food and environmental markets, as well as the services and consumables business for CAG and Life Sciences.

"It is an honor to have been asked to lead Agilent and our very talented teams into the future," McMullen said. "Agilent is a great company that is well positioned to tap new opportunities in life sciences, diagnostics and applied markets. Our strategy is compelling and will create value for our shareholders. I am excited about working with the teams to execute on our plans."

"Our focus remains where it has always been—on our customers, supporting their everyday goals in the laboratory as well as their big, world-changing breakthroughs," he said.

 [Click here to return to Contents](#)

Autodesk and Local Motors Collaborate on First Spark 3D Platform Implementation

15 September 2014

Earlier this year, [Autodesk announced](#) plans to introduce Spark, a new open platform for 3D printing, aimed at making it simpler and more reliable to print 3D models and easier to control how that model is printed. Now, Autodesk is collaborating with [Local Motors](#), a leader in open-source hardware innovation, to utilize the Spark platform as Local Motors continues to develop the Strati, the world's first 3D printed car.

CIMdata PLM Industry Summary

“The Spark platform is set to accelerate manufacturing innovation,” said Alex Fiechter, head of community management for Local Motors. “From capturing our ideas more accurately to guiding Design for Additive Manufacturing (DFAM) and simplifying the creation of machine code, Spark will help us to turn digital models into an actual physical production parts far faster than was previously possible.”

The recently unveiled Strati is being developed by Local Motors team at the DOE’s [Manufacturing Demonstration Facility](#) (MDF) at [Oak Ridge National Laboratory](#) (ORNL), one of the nation’s leading innovation centers around additive manufacturing. The Strati vehicle design was chosen from entries submitted by Local Motors’ global co-creation community and as the project progresses Local Motors plans to use the Spark platform, which will make it the first large-scale industrial application of Spark.

“Local Motors recognizes the capabilities of the Spark platform for industrial manufacturing projects,” said Samir Hanna, vice president and general manager, Autodesk. “This collaboration is a natural fit to push the boundaries of large format 3D printing to fundamentally change how things are designed and made.”

ORNL and [Cincinnati Incorporated](#) created a BAAM (Big Area Additive Manufacturing) machine similar to a fused deposition modeling (FDM) printer by taking a 6.5’ x 13’ foot bed laser cutter adding custom hardware to transform it into a massive 3D printer. Spark will help connect automobile digital design information to the 3D printer in a streamlined way for easier visualization and optimization of 3D prints.

According to Local Motors, the Strati simplifies the automotive assembly process and is a result of leveraging the contributions of community, advanced manufacturing tools, and software, like the Spark platform. This could bring many advantages, including reduction in the number of parts in a vehicle’s Bill of Materials (BOM) from 25,000 components to less than 50. The on-demand nature of 3D printing means that automotive manufacturers can change aspects of their design—or even come up with an entirely new one—with little or no additional cost in tooling or time.

 [Click here to return to Contents](#)

Barry-Wehmiller International (Formerly BWIR) Announces Its New Identity

15 September 2014

Vasant Bennett, Managing Partner of Barry-Wehmiller International Resources (BWIR), announced a new identity for the organization, which will now be called Barry-Wehmiller International (B-WI). Along with the new name, the organization also proudly unveiled a new logo, color palette and a re-designed website. These new changes emphasize the organization’s global reach and people-centric values without losing its strong association with the Barry-Wehmiller family of companies.

The company’s global reach is embodied in the logo’s circular design, while the three segments of the arrow represent B-WI’s defining elements: Enterprise, Engineering and Technology. In combination with the white dot, the arrow forms the “I” for “International”, another nod to its global focus. The signature blue color represents B-WI’s depth and stability, while the gray represents reliability and professionalism.

“The new identity is a result of the company’s journey, which began 20 years ago in the United States and in India, and has resulted in a total transformation. To move ahead on this remarkable journey, there

CIMdata PLM Industry Summary

emerged a need for a new identity which represents who we are today – a trusted, global, people-centric, ‘Total Solutions’ provider with a rich heritage in manufacturing,” said Bennett.

“Today we are able to provide solutions that meet the strategic business needs of our customers by increasing profitability, revenue growth and sustainable competitiveness at the enterprise level and enhancing productivity, efficiency and customer lifetime value at a functional level,” said Senthilkumar Devasigamany, Executive Partner responsible for the Engineering Services Business Unit.

From humble beginnings as an IT and engineering service provider to its parent company Barry-Wehmiller, B-WI’s history is marked with imposing milestones. The organization’s first major milestone occurred in 2002, when it expanded its client base beyond Barry-Wehmiller to offer services to third-party manufacturing companies. More recently, in 2011, the company transformed itself to a total solutions provider through multiple organic and acquisition initiatives.

“Barry-Wehmiller International has become who we are today thanks to a strong manufacturing focus and the expertise gained by supporting our parent, Barry-Wehmiller,” said Balachandran Anantharama, the Executive Partner responsible for Enterprise Consulting.

Over the last 20 years, Barry-Wehmiller International has touched over 1200 satisfied manufacturing companies from across 25 different countries. The new identity positions the company to further expand on these feats and reach for newer heights.

 [Click here to return to Contents](#)

Boston Engineering Named a PTC Reseller for New York, New Jersey, and Pennsylvania

18 September 2014

Boston Engineering announced today that it has been selected by PTC Inc. as its new reseller for New York, New Jersey, and Pennsylvania. The expanded PTC sales territory makes Boston Engineering the Northeast’s largest [PTC® ChannelAdvantage™ reseller](#) with service throughout New England and the Middle Atlantic.

“Boston Engineering has an impressive track record providing PTC services, and has the expertise that customers need to optimize their product development teams and unlock new business opportunities,” said Corey Pratte, senior director of channel sales, North America, at PTC Inc.

“Companies in New Jersey, New York, and Pennsylvania can now partner with Boston Engineering to accelerate the pace and precision of their new product initiatives,” said Bob Treiber, president and co-founder of Boston Engineering.

“We are excited to expand our PTC services into the Middle Atlantic and to provide organizations in this area with measurable results,” said John Driscoll, general sales manager for PTC products and services at Boston Engineering. “We have a deep understanding of PTC technology and the product development process because we also use PTC software internally for product design and engineering consulting projects.”

Boston Engineering, a PTC ChannelAdvantage VAR, offers sales, training, support, and services for PTC products including PTC® Windchill, PTC Windchill® Quality Solutions, PTC Creo®, PTC Pro/ENGINEER® (Pro/E), PTC Mathcad®, and PTC Arbortext®. Boston Engineering’s expertise spans

CIMdata PLM Industry Summary

PTC's computer-aided design (CAD) software, service lifecycle management (SLM), and product lifecycle management (PLM) solutions portfolio.

Additionally, Boston Engineering's [Product Development Systems Services](#) provides consulting and technology integration services to optimize product development teams and align product development with core business activities.

 [Click here to return to Contents](#)

BuildIT Software & Solutions Ltd. to Offer Siemens PLM Software's NX CMM and DPV

16 September 2014

BuildIT Software announced that it will now offer solutions from Siemens PLM Software: NX CMM—a programming, inspection and analysis solution for Coordinate-Measuring Machines (CMMs)—and Dimensional Planning & Validation (DPV)—a solution for Statistical Process Control (SPC) from the Tecnomatix® portfolio, the industry-leading digital manufacturing software.

BuildIT brings extensive expertise in the field of 3D metrology to the table. Their years of experience developing and deploying their inspection solutions for the advanced manufacturing industry make them an ideal distributor for Siemens Quality Control products. "The addition of the NX CMM and DPV products from Siemens PLM Software is complementary to our existing software solutions," said Vito Marone, Vice President. "We are very pleased to be able to offer this leading PLM technology to our current and future customers. It is now possible for our customers to use the same industry-leading technology that top manufacturing companies throughout the world depend on every day."

 [Click here to return to Contents](#)

Capricot is Now Representing Eagle Point's Pinnacle Series in India

16 September 2014

Capricot Technologies announced that it has entered into a partnership with Eagle Point Software - developer of the Pinnacle Series.

The Pinnacle Series is a productivity solution, which uses multiform resources to help organizations overcome the everyday challenges they face in using Autodesk software. This cloud-based solution enables users to get the most out of their Autodesk Solutions with desktop and mobile applications that provide 24/7 access to workflow, training and support resources. Pinnacle Series is fully customizable with unlimited cloud storage, allowing organizations to house their corporate best practices and standard operating procedures.

"Capricot was looking for a strategic partner with a cloud-based solution focused on Autodesk products. We knew of Eagle Point's reputation for solving problems that Autodesk customers face and found the Pinnacle Series to be just what we were looking for to help our customers," said Chakresh Jain, Chairman of Capricot. Jain also stated "By offering Eagle Point solutions to our clients, we're providing more than just e-learning. We are providing a localized combination of content and services that connect

our customers to answers."

An Autodesk Developer for over 30 years and currently an AEC Industry Partner, Eagle Point recently enhanced the Pinnacle Series solution by allowing Partners to append the already robust content, making room for enhanced workflows, cheat sheets, how-to videos and training classes. This new release is also the platform for content localization and translation within the local time zone for live training and support services.

"Eagle Point and Capricot are on the same page, philosophically. We're committed to improving our client's productivity throughout the entire design experience," said Randy Ambrosy, Executive Vice President for Eagle Point. "It makes sense for us to partner with the leading reseller and primary source of Autodesk products for the country of India."

 [Click here to return to Contents](#)

Detroit Lions & Tata Technologies Launch STEM Programs in 2 Detroit Schools

18 September 2014

Athletes for Charity, Tata Technologies and the Detroit Lions have joined forces to expose Detroit Public School students to embrace Science, Technology, Engineering and Math (STEM), while also developing their skills in reading and writing.

"The demand for skilled workers in science, technology, engineering, and math is on the rise while the availability of qualified applicants is on the decline because students are not pursuing degrees and careers within the sector," said Alisa Harewood of Tata Technologies, a global engineering services company with North American headquarters located in Novi.

The program aims to improve learning outcomes and student interest in science, technology, engineering and math, while creating pathways to success in post-secondary education and 21st century careers.

Two schools have been selected for the inaugural launch of the STEM Youth Literacy Program: Clark Preparatory Academy—visited on Sept. 9—and Dixon Educational Learning Academy. Representatives from Tata Technologies, Athletes for Charity and the Detroit Lions are set to visit Dixon on Tuesday, Sept. 23 from 10 a.m. to 2 p.m.

"Our goal is to invest time and resources into the development of creative and effective approaches to STEM education," said Cathleen Laporte, founder and president of Athletes for Charity. "Our partnership with Tata Technologies and the Detroit Lions represent an innovative way to fuse the nonprofit, corporate and sports sectors, to motivate students in the areas of STEM."

The curriculum will include monthly book distributions by various Detroit Lions players, coordinated by Don Carey of the Lions, to deliver age-appropriate STEM-related titles to students. Introductions to STEM literature and careers will be a recurring theme throughout the 10-month long program. Tata Technologies staff and various Detroit Lions players will volunteer their time to serve as STEM Readers.

The titles to be distributed as part of the literacy component will include Dr. Seuss' Cat in the Hat Learning series for Pre-Kindergarten and Kindergarten grades; DK Eye Wonder's Space, Human Body, Weather and Cars for 1st grade; Disney's Wonderful World of Space, Earth, Dinosaurs, Nature,

CIMdata PLM Industry Summary

Animals, and Sharks for 2nd and 3rd grades; and the DK Pocket Genius series or Penguin Group's Who Is...? or Who Was...? titles for 4th and 5th grades. The program will feature monthly vocabulary development and drawing contests for Pre-Kindergarten through 1st grades and essay contests for 2nd through 5th grades to help develop reading and comprehension skills.

Academic incentives will include tickets to Lions, Pistons and Tigers games; autographed items from sports professionals i.e. autographed footballs, basketballs and baseballs; photos; t-shirts; etc.; LEGO product to foster hands-on learning; and field trips to local educational institutions.

Detroit Lions Safety Don Carey is a founding member of the program and serves as a liaison to the team and his teammates who have elected to volunteer for the initiative. Invitations have been extended to Tigers, Pistons and Red Wings players to join the team as STEM supporters.

Additional supporters of the STEM Youth Literacy Program include The Helen L. Kay Charitable Trust and support from athletes such as Detroit native Anthony Adams, a retired nine-year NFL veteran who most recently played for the Chicago Bears. Adams currently serves as a host of Inside the Bears.

 [Click here to return to Contents](#)

IMAGINiT Technologies Challenges Design Engineers to Enter IMAGINiT's RENDERiT Contest

18 September 2014

[Rand Worldwide](#) announced that with less than one month left to enter [IMAGINiT Technologies' RENDERiT Contest](#), the time to upload a rendering of your favorite design is now. Top design, civil and mechanical engineers and architects using Autodesk software across the building, civil and mechanical fields are competing to win one of three prizes. Winners will all be chosen through public voting via IMAGINiT's Facebook Page.

"We typically work with our clients to recommend technology, help them implement it and then ensure the effective adoption of this technology into their workflows and design processes," says Tim Johnson, senior vice president, IMAGINiT Technologies. "When we partner with customers, we don't often get to experience the truly innovative designs that our clients are creating on the frontlines with Autodesk 3D design software. IMAGINiT's RENDERiT Contest allows us to see the powerful ideas that these design tools bring to reality. We truly enjoy exposing the work of the brightest designers to a like-minded community and soliciting feedback from this peer group on their designs."

How to Enter

1. Designers simply [upload](#) their best rendering that was developed using software or products from either Autodesk or IMAGINiT Technologies. The contest is free to enter.
2. IMAGINiT will share all entries across their social networks and entrants are encouraged to do the same.
3. The submission deadline is October 1, 2014.

Prizes

The public will determine the three winners by voting for their favorite rendering on [IMAGINiT's RENDERiT Contest Facebook Page](#).

Voting closes on October 7, 2014 and winners will be announced on October 8, 2014.

CIMdata PLM Industry Summary

Voters will also be eligible for a prize as everyone who votes will be entered into a drawing for a US\$100 Apple gift card.

First prize: MakerBot Replicator Mini 3D Printer

Second prize: Polaroid Socialmatic

Third prize: Pebble Steel Smartwatch

 [Click here to return to Contents](#)

Infor OEM Licenses Aras PLM Platform and Solution Suite

17 September 2014

Aras® today announced that Infor has licensed the Aras PLM platform and solution suite. Infor will offer Aras rebranded as *Infor PLM Innovator – powered by aras*, integrated with the Infor 10x platform and industry-leading ERP systems.

Infor PLM Innovator goes beyond the capabilities of standalone PLM products to unite the entire product lifecycle for a single view of the truth, enabling global enterprises to accelerate product realization from design and manufacturing to purchasing, quality, the supply chain and beyond.

“This relationship is a real win for everyone,” said Peter Schroer, CEO of Aras. “Infor is able to get to market quickly with a highly scalable and flexible PLM offering, we are able to expand the Aras community and reach a wider range of customers with our technology, and global enterprises are able to take full advantage of a seamlessly integrated experience.”

Infor PLM Innovator – powered by aras:

Advanced - A single, modern web framework with an open architecture and a comprehensive PLM solution suite that extends beyond product data management to provide end-to-end product lifecycle management throughout the enterprise and extended supply chain.

Flexible - Innovative platform technology in Aras enables drag & drop customization of the industry best practice solutions to adapt to company specific requirements with real-time agility and the ability to change at the speed of business.

Scalable - Scales up and scales out to keep pace with expanding requirements and global growth whether adding tens of thousands of users around the world and across the supply chain or managing petabytes of complex CAD data and documentation with ease.

Secure - Compliance-grade security protects valuable intellectual property with customizable role-based permissions, authentication and access control functionality that enables sharing of information across the enterprise and with suppliers, partners and customers, confidently

 [Click here to return to Contents](#)

Lectra Appoints Edwin Ingelaere as Director, Lectra Northern Europe

18 September 2014

Lectra is pleased to announce the appointment of Edwin Ingelaere as Director of Lectra Northern

CIMdata PLM Industry Summary

Europe. Based in Destelbergen, Belgium, Edwin Ingelaere is in charge of a team of 35 people spread across nine countries: Benelux (Belgium, the Netherlands), Scandinavia (Denmark, Finland, Norway, Sweden) and the Baltics (Estonia, Latvia, Lithuania).

A truly transnational company, Lectra has developed privileged relationships with numerous customers in more than 100 countries over the past 40 years. It contributes to their operational excellence, in the fashion and apparel, automotive and furniture industries, as well as a wide variety of others.

Lectra Northern Europe is composed of a mosaic of countries with a large variety of cultures, languages, industries and markets. Such diversity is an exciting challenge for Edwin Ingelaere. With help from his team, he will support Lectra customers in the region with their production optimization, quality improvement, cost reduction and go-to-market acceleration.

“Lectra recently invested 50 million Euros in a global transformation plan for the future, including a 60% headcount increase in marketing, sales and consulting, and an accelerated R&D plan” stated Daniel Harari, Lectra CEO. “Edwin’s mission is to accelerate our development in Northern Europe, a region where we have been market leader for more than 35 years, thanks to our experienced and multi-lingual team.”

“My aim is to support our customers in the optimization of their design, product development and manufacturing processes”, said Edwin Ingelaere. “Today, Lectra has several assets: its consulting activity based on lean manufacturing principles, intelligent industrial equipment, integrated software covering the whole production cycle, and unparalleled customer service”.

With 20 years’ experience, Edwin Ingelaere began his career with Telindus Group, an IT solutions integrator. He then joined Vasco Data Security as Strategic Marketing Director, before being recruited by telecommunications company Verizon as Key Account Director. More recently, the Belgian company Option, specialized in Wi-Fi communications networks, offered him various sales responsibilities. Before joining Lectra, Edwin Ingelaere was Business Development Director for the machine-to-machine (M2M) market. Edwin Ingelaere is a graduate of Artesis University College, Anvers (telecommunications and electronic engineering), and Vlekho Brussels (business management). He also attended strategic management courses at Vlerick Business School in Leuven.

 [Click here to return to Contents](#)

Missler Software Joins the European Project FibreChain for the Control of Robots

18 September 2014

The FibreChain project addresses manufacturers' growing need for innovative processes to optimize the production chain and reduce costs.

Lightweight, durable components are in high demand from manufacturers as they combine performance and high quality. Only highly specialized production chains currently supply multilayer components and lightweight 3D carbon fibre components. To this day, their use in the industrial world remains very limited, hence the reason for there being no integrated production chains capable of mass production.

The aim of the FibreChain project, which means the integration of the process chain for the automated and flexible production of carbon fibre components, is to develop the first automated manufacturing system for mass production of high-performance, lightweight and recyclable carbon fibre components.

The project took shape thanks to an interdisciplinary consortium of 17 partners from 7 European

CIMdata PLM Industry Summary

countries, consisting of research institutes, such as the German Fraunhofer Institute, manufacturers, such as Nikon Metrology and Trumpf, and universities. The partners* have used their skills in various fields, such as engineering, manufacturing, laser measurements and control and simulation technologies, for the benefit of the project. Their main objective was to improve the manufacturing process of carbon fibre components, with the aim of reducing both production costs and manufacturing time, while creating a high-performance 3D fibre structure.

Missler Software was tasked with piloting robots in order to control the production chain from the creation of the material, i.e. the laying of carbon fibre strips in the raw state, up to dimensional inspection, through the definition of machining and calculation phases.

The project received recognition for its three years of intensive development work last October when it was awarded the *JEC Americas* innovation award from the largest European components organization, JEC.

 [Click here to return to Contents](#)

N+P and Stabiplan Strategic Partners for German Market

18 September 2014

IT consultants and systems specialists N+P Informationssysteme GmbH (N+P) and Stabiplan, the Dutch specialist for home automation software, will be working closely together in the German market. The aim of the partnership is to combine the expertise of both companies and thus push the concept of building information modeling (BIM) to the next level.

Stabiplan is European leader in the development of CAD-based design software for home automation. Points of interest: Stabicad is compatible with multiple platforms, with functionality available for both Autodesk® Revit® MEP and AutoCAD®. In addition, Stabiplan offers a web platform at MEPcontent.eu that provides current graphical product information for leading manufacturers and suppliers. The company collaborates with more than one hundred European companies on this project. Thanks to the partnership agreement with N+P, users of Autodesk® Revit® MEP and AutoCAD® can now purchase Stabiplan software in Germany and use all of its features. Noteworthy here is the seamless exchange of data between platforms without the loss of data, perfect for building information modeling.

“No matter how valuable knowledge and experience are, putting these into practice on a daily basis is about going one step further. It’s all about information. BIM requires that parties share their information. This leads to other forms of cooperation, new business models and eventually changes in the relationship with clients. This is why we’re making our solution available on the two market-leading platforms AutoCAD® and Autodesk® Revit® MEP,” says Edwin Schalk, Business Development Director at Stabiplan, describing the current situation.

Stefan Schrenk, Head of the AEC department at N+P and active for many years in the field of BIM, adds: “What our customers really want to know nowadays is what building information modeling is going to mean for their business. Our job as a systems specialist, therefore, is to accompany the process with technically clean-cut advice and deliver precisely tailored and intelligent IT solutions for the tasks at hand. Stabiplan’s software lets us seamlessly integrate TGA planning into building information modeling, both in the areas of planning and in construction. Moreover: further integration of the data into N+P’s own CAFM software SPARTACUS Facility Management® means the BIM philosophy is

supported by us on the software-side right to the point of operation.”

 [Click here to return to Contents](#)

New SENER Directors for Asia and Pacific

16 September 2014

Alfonso Cebollero has been appointed as SENER's Regional Director for Asia and Pacific, while Guangwu Liu has become SENER's new Country Manager in China. Both will coordinate the Engineering and Technology Group's projects in the above-mentioned geographical areas where SENER's activity is especially remarkable in the shipbuilding sector.

SENER has strengthened its presence in Asia with new appointments to head its local premises. The Company has appointed Alfonso Cebollero as new Regional Director for Asia and Pacific, where SENER's main activity is focused on [marine projects](#), both for marketing the [FORAN System](#) – SENER's shipbuilding CAD/CAM software, whose [new V70R3.0 release](#) has just been launched – and for developing engineering projects. Alfonso Cebollero is a Naval Architect graduated from the Polytechnic University of Madrid (UPM) and holds a Master's Degree in Business Administration (MBA) in Marine Business from the ICADE business school, in Spain. He carries out his new responsibilities based in Busan (South Korea).

Meanwhile, Guangwu Liu has been appointed as SENER's Country Manager in China, reporting to Alfonso Cebollero, with the mandate to develop business in this country and enhance the contact with domestic customers. Guangwu Liu is a Naval Architect graduated from the Wuhan University of Technology (WHUT), in China, and holds a PhD in Systems Engineering from the Huazhong University of Science and Technology, also located in Wuhan. He joined SENER's Marine Systems Department as Commercial Manager for China in 2008.

China, Japan and South Korea are currently the worldwide leaders in shipbuilding; combined, the three countries produce 90% of the world's ships and SENER estimates that, in 2016, 40% of the Marine revenue will come from this region, which gives an idea of its strategic importance. For this reason, SENER's Marine Unit is strengthening its presence in Asia, where it has signed licensing and service agreements for FORAN with shipyards, classification companies and engineering centers from CSIC and CSSC in China, Sanoyas, Tsuneishi and Class NK in Japan, and Udin and Posco Plantec in South Korea. It also performs engineering projects, such as the contract for a fishing stern trawler in China, a 1,200-passenger ferry and a maintenance vessel for offshore wind turbines, all of them in Korea. In addition, SENER has also established contacts with universities and technological centers such as the University of Hiroshima and the Nagasaki Institute of Applied Science (NiAS) in Japan, the Korea Maritime and Ocean University (KMOU) as well as Chinese centers such as the WHUT, the Harbin Engineering University (HEU), the Jiangsu University of Science and Technology (JUST) and the Shanghai Jiaotong University (SJTU) in order to provide training courses in FORAN and develop research projects.

In parallel with the coordination of shipbuilding projects, both managers will be responsible for identifying business opportunities in the other three business areas of SENER in the field of Engineering and Construction, ranging from [Aerospace](#) to [Infrastructures and Transport](#) as well as [Power and](#)

[Process.](#)

 [Click here to return to Contents](#)

PTC Axeda® Technology Named 2014 Innovative Technology of the Year for Internet of Things

16 September 2014

Continuing with its Internet of Things strategy to enable customers to bring smart, connected products to market faster, [PTC](#) today announced that its [Axeda Machine Cloud®](#) technology was named 2014 Innovative Technology of the year for the Internet of Things by the Mass Technology Leadership Council (MassTLC) during the 2014 Technology Leadership Awards.

PTC acquired Axeda in August 2014 for its leading-edge Internet of Things (IoT) technology. The PTC Axeda Machine Cloud® enables customers to cost-effectively and securely connect products to the cloud and then leverage the remote connectivity and data to provide world-class service, gain new business insights and deliver new innovative applications.

“The MassTLC awards showcase the incredible innovation that takes place every day in Massachusetts that can then be adopted around the globe,” said Bill Zujewski, executive vice president, Axeda strategy, PTC. “The world is moving to smart connected products, and now as part of PTC and combining forces with ThingWorx, we can accelerate that trend and help even more companies innovate, differentiate and leverage the power of the Internet of Things.”

MassTLC’s 17th [Annual Leadership Awards](#) program celebrates and showcases the region’s best leaders, companies, and technologies. With over 300 nominations each year, it continues to prove that Massachusetts is a dominant force throughout the globe.

“The 17th annual MassTLC Leadership Awards shines a spotlight on the vibrancy of the state’s position as both pioneer and leader in technologies that are fueling Massachusetts’ economy and changing the world,” said Tom Hopcroft, president and CEO of MassTLC. “PTC should be proud of being recognized as among the elite innovators from the Bay State’s deep talent pool.”

 [Click here to return to Contents](#)

Simpleware Sign Reseller Agreement for Colombian Market

18 September 2014

Simpleware is pleased to announce a new distribution deal with Componentes Electrónicas Ltda. for the Colombian market.

Simpleware offers high-quality solutions for converting 3D image data (taken from MRI, CT, micro-CT...) into robust computational models suitable for Finite Element Analysis (FEA), Computational Fluid Dynamics (CFD), CAD and 3D printing. The software includes comprehensive image processing, analysis and mesh generation capabilities, enabling a straightforward route from scan data to simulation-ready 3D models.

Componentes Electrónicas Ltda. have over 25 years of experience in providing engineering and technical services to clients, and represent a number of prestigious hardware, software and electronic

CIMdata PLM Industry Summary

companies and products. The company has strong relationships with both industrial and academic clients within Colombia, and has developed an excellent understanding of how to market and sell advanced software.

The partnership with Componentes Electrónicas increases Simpleware's reach in South America, and follows a number of important distribution deals for the company this year in markets such as China, Malaysia and the United States. Simpleware are planning to further develop reseller agreements through the remainder of 2014 and into 2015.

 [Click here to return to Contents](#)

Third Wave Systems, IMS Software Partner

16 September 2014

Third Wave Systems and IMS Software announced a partnership at the International Manufacturing Technology Show in Chicago. The two companies have partnered together to provide a capability to model new machines within Production Module, Third Wave Systems' machining modeling and optimization product.

The partnership comes from Third Wave Systems responding to the needs of its Production Module customers who have been waiting for the capability to model the latest in machine tools and machine tool controllers. Third Wave Systems will integrate IMS Software's extensive capability to interpret CNC machining toolpaths for turning and milling machines, including multi-axis milling and the latest in machine controllers.

"We're excited to include this capability that allows Third Wave Systems customers to model and optimize the most complex machined components using Production Module," Kerry Marusich, Third Wave Systems president, said. "This new capability allows customers to model forces, stresses and temperatures in difficult to machine metals on more components than ever before."

Production Module will retain the same functionality and core capability as before, but through the partnership with IMS Software, Third Wave Systems users will have the ability to model more machines and optimize a larger number of parts than ever before. Third Wave Systems will embed IMS software within Production Module for improved toolpath interpretation so Third Wave Systems customers can easily model more machines with better results, have more accurate simulations and a faster setup time. By modeling and optimizing more components with Production Module, customers will be able to create an even larger and faster improvement in profitability for their machined components.

"We're delighted to enter this partnership with Third Wave Systems," Dan Wrenn, president and co-founder of IMS Software said. "The synergy between our products will benefit customers immediately, and the alignment of our respective development strategies will deliver even greater capabilities in the future."

The capability will be released with the new version of Production Module, scheduled for a fall release.

 [Click here to return to Contents](#)

Events News

Altair to Showcase Oil and Gas Simulation Technology in Houston

18 September 2014

[Altair](#) will host a technical seminar on simulation and high-performance computing (HPC) solutions for the oil and gas industry next Wednesday, September 24 in Houston. Scheduled customer presentations from Chevron, Wood Group Kenny, ConocoPhillips, Baker Hughes, and Sundrop Fuels will provide an overview of computer-aided engineering (CAE) methods and best practices for mechanical earth modeling, subsea and offshore design and analysis, reliability-based design optimization, equipment performance simulation, and more.

The oil and gas industry faces a myriad of challenges, including exploration and operations in some of the harshest environments in the world. Economic viability is dynamic and continually scrutinized, while safety and reliability remain critical to every aspect of product and system design. These factors, along with the rising cost and complexity of physical tests, are making up-front numerical analysis more important than ever.

Accurately representing reality for oilfield production analyses involves a variety of disciplines. Altair HyperWorks®, with its comprehensive CAE suite of pre- and post-processing tools, multiple solvers and an open architecture, enables engineers and scientists to safely and efficiently develop innovative solutions to the challenges of hydrocarbon recovery from increasingly complex environments.

"Our existing pre-processor did not give us the desired control over mesh quality. HyperMesh® operates directly on the mesh resulting in better quality models in a shorter timescale," said Ian Probyn, Senior Structural Analysis Engineer at DUCO Ltd., Technip, UK.

Altair's focus on innovation through simulation-driven design has led to the development of not only leading computational solvers, but also best-in-class multiphysics capabilities. Coupled fluid-structure interaction may be modeled by coupling AcuSolve®, Altair's computational fluid dynamics solver, with OptiStruct®, a structural analysis solver for linear and nonlinear structural problems under static and dynamic loadings. Risk analysis may be conducted through the integration of design of experiments (DOE) and stochastic studies with HyperStudy®, an open platform for use with nearly all 3rd party solvers. For the analysis and optimization of machinery kinematics and other mechanisms, multibody dynamics solver MotionSolve® may be utilized.

HPC is making it possible to leverage numerical simulation for a wider array of analysis and optimization tasks than ever before. Complex geologies like subsurface salt domes and extreme drilling depths require the integration of multiple numerical solvers with uncertainty analysis as well as advanced visualization and simulation techniques. Such engineering applications generate immense amounts of data, and are generally deployed on large clusters or in the cloud. These and other compute-intensive processes like seismic processing and reservoir simulation may be accelerated using Altair PBS Works™, a leading HPC workload management suite with web-based submission, analytics, and remote visualization products.

Please visit <http://altairatc.com/atcxhouston> for more information, including a detailed agenda and registration link.

 [Click here to return to Contents](#)

Delcam to Show Helmet Machining Demonstration on Four Stands at BIMU

19 September 2014

Delcam will demonstrate the five-axis machining capabilities of its PowerMILL CAM system by producing a complex cycle helmet on four stands at the BIMU exhibition to be held in Milan from 30th September to 4th October. The demonstrations will be on the stands of Mazak, D14 in Hall 16, CMS Industries, D13 in Hall 9, and Ispier, C01 in Hall 9, as well as on Delcam's own stand, F47 in Hall 11.

BIMU visitors will also be able to see reverse engineering of the CAD model of the helmet from the Rudy Project original on the Delcam stand.

Franco Calloni, General Manager of Delcam Italia, chose the helmet for the demonstrations after seeing it used by a cycling team that is sponsored by his company. "I was looking for a single object to demonstrate the complete Delcam solution," he explained. "I needed something that would be recognised instantly by visitors and that would show how easily Delcam's software can model and machine complex shapes."

On the Delcam stand, visitors will see how PowerSHAPE Pro is used to convert a sample helmet into a CAD model. By offering a combination of solid, surface and direct modelling, together with reverse engineering functionality, PowerSHAPE Pro provides the most comprehensive range of design techniques available in a single CAD program. Having all the different technologies in the same package reduces the need to transfer data between multiple programs and so streamlines the whole product development process.

The various machining demonstrations then show how the five-axis capabilities of PowerMILL allow even a part as challenging as the helmet to be machined quickly and efficiently in a single set-up.

PowerMILL 2015, which will be demonstrated in Italy for the first time at BIMU, offers new options for positional or continuous five-axis machining, including improvements to the collision checking within the software. Firstly, collision checking has been changed so that warnings can also be flagged for near misses. Secondly, the display showing the list of collisions has been updated to be easier to read, making it simpler to extrapolate the coordinates at these points.

Another improvement in the new release will help companies using four- or five-axis machines with trunnions or similar tilting tables. Previous PowerMILL toolpaths could exhibit unwanted changes of azimuth as the cutting tool approached a position vertical to the part. This would slow down the machine, often to the extent that a witness mark would be left on the surface. New options are now available to re-distribute the toolpath points so that the machine's gimbal-lock position is avoided and a smoother motion results.

 [Click here to return to Contents](#)

Delcam's PartMaker 2015 to have UK Preview at Tornos Event

12 September 2014

Delcam will give the first previews of the 2015 version of its PartMaker CAM software at the Tornos

CIMdata PLM Industry Summary

Technology Centre in Coalville, Leicestershire, from 14th to 16th October. Delcam will be at Tornos as part of the Think: Production event being run in association with Matsuura, Fanuc and Nikken.

The major highlights of PartMaker 2015 include improved support for today's latest breed of multi-tasking machine tools, more powerful milling and turning functionality and a unique approach to post-processing for multi-axis turn-mill centres and Swiss-type lathes, among other productivity enhancements.

"The innovations in PartMaker 2015 further cement the software's position as the preeminent CAM system on the market for programming of multi-tasking machining applications," said PartMaker Division President, Hanan Fishman. "PartMaker 2015 extends support of the product's patented approach to programming multi-tasking machine tools to support today's latest breed of multi-function machines."

"Additionally, the power of the machining algorithms driving PartMaker will be enhanced in Version 2015, giving our users even more capability while retaining the software's trademark ease of use," continued Mr. Fishman.

PartMaker 2015 includes specialist support for a new breed of machine tools that has been growing steadily in popularity in recent years called vertical mill-turns. These machine tools are unique because they combine the functionality typically found on a vertical-turret lathe with that of a five-axis vertical machining centre. PartMaker 2015 will also offer support for turret-based Swiss lathes with programmable B-axis live tooling attachments.

Also headlining PartMaker Version 2015 is a unique approach to post-processing for multi-tasking machine tools. This new approach includes a variety of improvements to the software's post-processing technology and new software functionality to help guide users on how to best take advantage of the unique capabilities their specific multi-tasking machine tools.

 [Click here to return to Contents](#)

ITI TranscenData Features "Migrate, Integrate and Validate" Solutions at PLM Europe 2014

12 September 2014

ITI TranscenData announced their sponsorship of [PLM Europe – the Siemens PLM Connection 2014](#) event in Berlin, Germany, 6 – 8 October. This year ITI TranscenData will be featuring their "Migrate, Integrate and Validate" approach for NX and Teamcenter clients, as described in a recent [article](#) in the August edition of the PLM Europe Newsletter.

Peter Heath, ITI's PLM Business Development Manager, comments, "PLM Europe is one of the highlights of the year. We have worked with many Siemens PLM customers on successful PDM migrations to Teamcenter, and support hundreds of customer implementations of the IPDM and SWIM integrations. PLM Europe provides a fantastic opportunity for us to meet with customers in an open and engaging environment, where we are able to review migration projects and offer advice and guidance. I look forward to another great event this year."

ITI TranscenData is pleased to be a Gold Sponsor of the event. ITI has been a Siemens PLM partner for over 18 years, providing complementary solutions and services for Siemens PLM customers. ITI TranscenData is actively engaged with Siemens PLM customers deploying interoperability solutions such as Proficiency®, CADIQ® and CADfix® to streamline migration and collaboration processes,

CIMdata PLM Industry Summary

ensuring they get optimum value from their PLM investments.

Experienced ITI TranscenData consultants will be at stand #27, where customers can learn more about how to Migrate, Integrate and Validate their Siemens products:

Migrate your CAD data with Proficiency and CADfix:

- Feature based CAD migration into NX including from CATIA V5, Inventor, Solid Edge and SolidWorks
- Enable effective OEM compliance and collaboration within a multi-CAD supply chain
- Effective BREP translation between CAD, CAM and CAE applications
- Support JT collaboration and translation with JT import and export interfaces

Integrate and Migrate your PDM:

- Solidworks (SWIM) and Pro/Engineer (IPEM) integrations to Teamcenter (*SWIM & IPEM are Siemens PLM Products*)
- Migration Services – PDM and PLM to Teamcenter with a business focus
- Implementation Services – Install, configure, and develop the right use cases for SWIM & IPEM

Validate your Engineering Data and Processes with CADIQ:

- Ensure the stability of CAD model geometry and PMI data within a 3D MDB environment
- Validate CAD model translation into NX within a multi-CAD supply chain
- Validate corporate CAD system migrations to NX
- Validate JT, STEP or Parasolid exports and collaborative processes

 [Click here to return to Contents](#)

New Polygonica Features on Display for TCT Show + Personalize 2014

18 September 2014

MachineWorks Ltd will be demonstrating some of the exciting new features of Polygonica at the TCT Show + Personalize at the NEC, Birmingham, UK from the 30th September to 2nd October 2014, stand F28.

Polygonica v1.2 - to be released at the show - represents a milestone in development for polygon mesh processing technology. Some of the new features to be included in this release are as follows:

Individual Hole Closing with Smooth Blending

One of Polygonica's core strengths was the automatic hole closing algorithm, a primary step in preparing CAD models for 3D Printing. This has now been extended to allow users finer control over how holes are closed. The curvature of the model at the edge of the hole can be taken into account to produce smooth hole closing. This often provides a much cleaner model than simple planar closing, and is often essential for models that have been generated from scan data, for example.

Full Support for Texture Mapped Models

Polygonica 1.2 extends support to models with full colour defined by texture maps. The texture

coordinates are carefully preserved and interpolated during the mesh healing, Boolean and offsetting processes. As it seems likely that 3D Printing in full colour will become more widespread in the short term, it is vitally important that software keeps in touch with the latest hardware developments.

Fast Large Model Collision Detection

Collision detection and interference analysis was added in Polygonica 1.1. But the new release goes even further by adding highly optimised collision detection for large numbers of complex solids. This feature is highly targeted towards CAD and BIM developers, allowing clash analysis of thousands of static and dynamic parts in less than a second.

 [Click here to return to Contents](#)

Pointwise Announces Presenter Lineup for User Group Meeting

18 September 2014

Presentations representing a wide range of computational fluid dynamics (CFD) applications and techniques will highlight the Pointwise User Group Meeting 2014 on 29-30 October in Anaheim, California. The event will mark the company's 20th anniversary.

Topics range from heat transfer to aeroacoustics to mesh sensitivities for internal aerodynamics.

The presenters are

- Dr. Michael Böttcher, Karlsruhe Institute of Technology
- Michael Ni, AeroDynamic Solutions
- Kyle Graham, Northrop Grumman Systems Corporation
- William Humber, AeroDynamic Solutions
- Andy Luo, TotalSim LLC
- Jeremy Shipman, CRAFT Tech
- Bruce Hilbert, SimCenter: National Center for Computational Engineering, The University of Tennessee at Chattanooga
- Dr. Rob McDonald, California Polytechnic State University
- Thomas Economon, Stanford University
- Dr. Amar Potturi, Metacomp Technologies
- Jeff Slotnick, Boeing Research & Technology
- Nick Wyman, Pointwise, Inc.
- Travis Carrigan, Pointwise, Inc.

A complete list of presentations is available at the user group meeting website.

The meeting, which brings together engineers and scientists from around the world, will be at the Embassy Suites Anaheim - South. For information about registration and other activities, see www.pointwise.com/ugm.

 [Click here to return to Contents](#)

CIMdata PLM Industry Summary

TopSolid 7 Live at AMB, Stuttgart, September 16-20, Stand 4C46

18 September 2014

The AMB - International exhibition for metal working - is considered as the leading industry event with more than 1,300 exhibitors and 100,000 visitors. AMB will present the latest developments in machine tools, precision tools and associated products for metal working.

The fair takes place from 16 to 20 September in Stuttgart. Along with its German distributors (Adequate Solutions, Moldtech and NCDATA), Missler Software will be running, on the stand 4C46, live demos to showcase the new features of TopSolid'Cam 7.8.

Let's introduce the main advantages of TopSolid'Cam 7.8:

Reduce machining times by 50% with VoluMill TopSolid Edition

Missler Software has chosen to integrate Volumill machining strategies into TopSolid'Cam 7.8 to be able to offer its customers the best algorithms on the market for toolpath calculation. VoluMill toolpaths use smooth, flowing motion, eliminating sharp directional changes and variances in tool load. Using VoluMill in place of traditional roughing routines will reduce your cycle times, extend the life of your cutting tools, and place considerably less stress on your machine tools, thereby reducing your costs while increasing your productivity. Depending on the material and topology in question Missler Software has observed significant time gains in machining operations (up to 70% in the best of cases), extended tool and machine life thanks to the use of VoluMill. Completely integrated with TopSolid'Cam, VoluMill is available as an option in TopSolid'Cam 7.8.

TopSolid'NC SIMUL for perfect G code simulation

Missler Software integrates the well-known G code simulation software, NCSIMUL Machine, as an option which can be used directly within TopSolid'Cam. The combination of the two will leverage an incredible security and insurance throughout the machining process and programming stages for the customer, especially required when the part is a very expensive one, or when the machining cycle takes hours as well as the final tuning of the tool path, close to the machine in the workshop.

TopSolid'NCSIMUL is positioned as an affordable solution that is well positioned both in terms of technology and pricing. TopSolid'NCSIMUL offers substantial time savings thanks to error detection and CNC programs validation.

Increase of the CAD/CAM productivity thanks to the integration of Adveon in TopSolid 7

Smart software with all the necessary functions for the management of cutting parts, collisions and driven points, Adveon provides access, via the Internet, to any supplier's tool library, CAD/CAM productivity is thus increased thanks to the provision of the catalog including all the relevant information (geometry and cutting conditions). The target is potentially manufacturing engineering and company workshops equipped with numerically controlled machine tools. The library allows a whole database of tools to be quickly built and provides automatic access to 3D CAD models for precise simulation and visualization. Manual entry is minimized, ensuring the consistency and quality of data.

 [Click here to return to Contents](#)

Vero Software Strongly Represented at MICRONORA 2014 Trade Fair

15 September 2014

Three leading Vero Software brands will be demonstrating their latest releases at the forthcoming French microtechnology trade fair, MICRONORA 2014.

Edgecam, VISI and WorkNC will present new features and improvements in their latest versions, on Stand 402 in Hall C at the Exhibition Centre Micropolis in Besançon, from 23rd to 26th of September. Vero Software, recently acquired by Hexagon AB, a leading global provider of design, measurement and visualization solutions, has seen its position as market leader confirmed. A CIMdata analysis report on market shares in the CAM solutions business sector shows Vero as having more than twice as many licenses installed than other CAM competitors.

With Micronora's cross-technology slant, focusing on the microtechnology sector, from R&D to subcontracting and production technologies, it is an ideal show for Vero to showcase its latest versions of CAD/CAM, Viewer-Analyzer and Trade-oriented ERP software solutions. The wide range of applications to which its products can be applied offers the perfect solution to industries such as automotive, electronics, medical equipment, household appliances and aerospace.

- With unparalleled ease of use and intelligent toolpath generation, Edgecam Workflow is the only CAD/CAM system needed for milling, turning or a combination of both. Edgecam Workflow is designed to drive down production costs, improve quality and shorten delays. The software recognizes part topology and identifies the most appropriate production environment which speeds up the toolpath generation process. Time spent on preparing and programming toolpaths is significantly reduced. In addition, the learning curve is much shorter thanks to the software's ease of use.
- VISI offers a wide range of complete solutions for injection mold design, including surface and solid modeling along with 2, 3 and 5 axis trade oriented machining routines, along with material flow analysis and die stamping tools incorporating progressive unfolding, blank form development and springback.
- WorkNC is the outstanding CAD/CAM solution for 2 to 5 axis machining of complex forms. WorkNC generates high-performance, automated toolpaths offering reduced machining times, longer tool service life, high quality surface finish, better use of machine resources and quick and simple CNC programming. Spectacular gains in productivity have been achieved, which contribute to making WorkNC the closest system to a 'one click CAM solution'.

 [Click here to return to Contents](#)

Financial News

ESI Group: Revenue for the 1st Half of 2014

15 September 2014

Alain de Rouvray, ESI Group's Chairman and CEO, comments: "The growing use of our Virtual Prototyping solutions, illustrated notably by the strength of New Business in the Licenses activity, was mitigated in the first half by adverse economic effects such as the persistence of significant foreign exchange impacts, the effects of the refocus of non-core Services and the one-off deferral of significant License contracts at year-end. These effects, which will attenuate during the second half, are not

CIMdata PLM Industry Summary

expected to undermine the Group's business momentum, leaving intact the potential for revenue growth over the full year. We will therefore continue to follow with confidence our roadmap as a strategic and critical partner of major OEMs who aim to accelerate the elimination of physical prototypes in the development of innovative industrial products.”

Second-quarter 2014 revenue: buoyant Licenses revenue

Second-quarter 2014 revenue amounted to €22.5 million, a slight increase of 1.6% at constant exchange rates on a purely organic basis compared with the same period in 2013. Change in the product mix continued to shift towards Licenses, which represented 68.8% of revenue, compared to 67.5% in Q2 2013.

Licensing: At constant exchange rates, Licenses revenue grew by 3.6%, reflecting the strength of demand for virtual prototyping solutions and highlighting an improving trend compared with Q1 2014. This trend is reflected in growth in the installed base (+0.6%, despite the impact of the exceptional repositioning of major contracts in the fourth quarter) and the robustness of the rate of recurring revenue in Licenses (+4.1 points). In addition, New Business was buoyant in Licenses (new products, new customers), with a significant 5.6% increase over the period.

Services: The revenue of the Services business continued to consolidate following the strategic refocus on high end services. Services revenue was down 2.7% at constant exchange rates.

Revenue for the 1st half of 2014: impact of the business cycle

Revenue for the 1st half of 2014 amounted to €42.6 million (-0.6% at constant exchange rates). The product mix is changing in favor of Licenses, which represented 69.8% of revenue at constant exchange rates, compared with 67.4% in the same period in 2013.

Licenses: robust business

Licenses revenue amounted to €29.7 million, an increase of 2.9% at constant exchange rates. As was the case during the first quarter, the trend in Repeat Business in Licenses was mitigated by the repositioning of major contracts in the fourth quarter. The rate of recurrence of the installed base was 76% at constant exchange rates, compared with 75.3% in H1 2013. Strong growth was recorded in New Business (new products and new customers) (+9.1% at constant exchange rates), driven by the registration of new accounts, notably in the United States, Japan and South Korea, mainly around our virtual manufacturing and virtual reality (IC.IDO) solutions.

Services: continued refocus focus on high value added projects

At constant exchange rates, Services revenue amounted to €13.3 million, a decline of €1.1 million. This reflects the Group's strategic refocus on high-end projects demanding expertise, more closely aligned with our core business and chiefly in the United States. This effect is expected to ease in the second half.

Geographical mix: strong growth in Asia

Over the period, and at constant exchange rates, the share of revenue by geographical region increased by 1.1 points to 41.3% in Asia and by 0.4 points to 41.5% in Europe, but fell by 1.5 points to 17.2% in the Americas (effect of Services refocus). The share of revenue derived from the BRIC countries reached 13.3% (vs 14.3%) taking into account some repositioned contracts in Russia and China at end of the fiscal year.

To view an unabridged version of this press release, visit: <http://www.esi-group.com/company/investors/news/revenue-1st-half-2014>

 [Click here to return to Contents](#)

Infor Reports Q1 License Revenue at Double-Digit Growth

16 September 2014

[Infor](#) announced on its quarterly Lender Update Friday, September 12, that fiscal 2015 Q1 software license fees and subscriptions revenue increased 22 percent at actual currency rates and in constant currency¹ compared to its fiscal 2014 recast Q1. Non-GAAP Q1 license fees and subscriptions revenue² increased 21 percent at actual currency rates and 20 percent in constant currency driven by strong license sales and continued momentum in software-as-a-service (SaaS) in the first quarter of Infor's fiscal year 2015. The areas of performance that showed the most momentum were the result of the continued drumbeat of Infor 10x product releases including [Infor CloudSuite™](#), which was announced in March of this year.

Bookings of SaaS subscription licenses more than doubled from the same quarter in FY14. This marked the first full quarter of sales for Infor CloudSuite, the first group of industry-specific application suites available on Amazon Web Services' (AWS) cloud. Since its announcement in March, Infor has delivered CloudSuites for [Automotive](#), [Aerospace & Defense](#), [Hospitality](#), and [Industrial Manufacturing](#). Infor now has more than 25 million users of its cloud applications.

This week at Inforum, its annual user conference with more than 7,000 registered attendees, Infor will unveil Infor CloudSuite Healthcare, a particularly important industry for Infor, whose products automate approximately 90 percent of the 25 largest U.S. healthcare delivery networks, and Infor CloudSuite Business, a general business management solution for midsize companies.

"The last three-and-a-half-years have truly marked the rebirth of Infor. We've evolved our product suite at an unprecedented pace and spent more than a billion dollars on engineering to deliver beautiful software, purpose-built by industry, on a modern platform," said Charles Phillips, CEO of Infor. "The strong results of our first quarter are only the beginning, over the next 12 months Infor will deliver a step-change in business software with our next enterprise release, Infor Xi, which is built for the cloud, using mobile-first design, and engineered with science to embrace machine-learning and big data analytics for midsize companies to multinational enterprises."

Infor's vertical approach, delivering industry-specific software that significantly reduces costly customization through built-in feature-rich functionality, continues to contribute to strong growth. In this quarter, Infor experienced double-digit growth in many of its primary business units, including Public Sector, Healthcare, Human Capital Management, CRM, and Financial Management.

To view an unabridged version of this press release, visit:

<http://www.infor.com/company/news/pressroom/pressreleases/Q1FY15Results/>

 [Click here to return to Contents](#)

Implementation Investments

Ben Ainslie Racing Using STAR-CCM+ Simulation Software to Design 35th America's Cup Racing Boat

18 September 2014

CD-adapco today announced its new partnership with Ben Ainslie Racing. The America's Cup team will be utilizing the CD-adapco simulation tool, STAR-CCM+® in the design of its racing boat. Ben Ainslie Racing team just announced its participation in the 35th America's Cup taking place in 2017.

The focus of the 35th edition of the America's Cup is sustainability, the set of restrictive rules means this is likely to be the most challenging America's Cup ever from an Engineering Simulation point of view. The introduction of much tighter design specifications, including "one design" components such as a common wing for all contenders, reduces the scope for large design differences between the boats and will likely mean that victory is decided by the smallest of margins. Since the rules will likely prohibit actual sailing of the boats until about 5 months before the competition, most of the important early design decisions will have to be based on data from CFD simulations.

Dr.-Ing. Rodrigo Azcueta, Design Engineer for Ben Ainslie Racing commented, "The America's Cup is ultimately a design race, and facing a fresh, three-year campaign, the Ben Ainslie Racing team were determined that they would need the best possible CFD package. So we committed to an extensive evaluation period and benchmarked several CFD providers.

"At the end of the day we had a clear winner: the power and flexibility of STAR-CCM+; the new optimisation package 'Optimate' added to the outstanding technical support at CD-adapco. Now we look forward to working closely with them and taking our simulation skills to the next level."

"Hydroplaning America's Cup boats are as much airplanes as they are boats, so the winning team will have to utilize simulation technology that takes account of the combined effect of aerodynamics, hydrodynamics and transient wave impact, in order to optimize their designs," said CD-adapco Executive Vice President Bill Clark. "We call this approach Multi-Disciplinary Design Exploration, and we are delighted that BAR have chosen STAR-CCM+ as a key tool in their quest to win the America's Cup.

 [Click here to return to Contents](#)

Elmos Selects Synopsys' Custom and Digital Design Solutions

14 September 2014

Synopsys, Inc. announced that Elmos has selected Synopsys' comprehensive custom and digital tools to increase the engineering productivity of its mixed-signal design teams. Elmos' decision to switch to Synopsys' solutions is based on the superior results delivered by Synopsys' Galaxy™ Design Platform and mixed-signal verification tools. The tools selected by Elmos include Galaxy Custom Designer® for custom layout, Design Compiler® for synthesis, IC Compiler™ for place and route, PrimeTime® for static timing, StarRC™ for extraction, IC Validator for physical verification, CustomSim™ for circuit simulation and VCS® AMS for mixed-signal verification. The platform delivered up to 10 times faster

mixed-signal verification and up to 10 percent smaller silicon area compared to Elmos' existing tools and methodologies. Adoption of Synopsys' solutions will enable Elmos to further extend its leadership in development of mixed-signal semiconductors for the automotive, industrial and consumer markets.

"After extensive evaluations, we concluded our search for a long-term technology partnership for high-performance analog mixed-signal designs with the selection of Synopsys' Galaxy Design Platform," said Jorg Gondermann, vice president of product development at Elmos. "The Galaxy Design Platform provides a unified custom and digital solution that enables us to perform comprehensive, accurate, and up to 10 times faster verification while keeping our schedule with good silicon correlation, all of which are critical for us to meet our customer requirements."

Faster Unified Co-design and Mixed-signal Verification

Synopsys' Galaxy Custom Designer and IC Compiler solutions are seamlessly integrated to provide lossless roundtrip custom editing at any stage of the implementation flow. Design teams can realize faster turn-around-time by easily moving between digital and custom implementation flows while maintaining complete design data integrity. The unified solution accelerates the design development cycle by enabling quick and reliable custom edits at any stage of development, including the time-critical tapeout phase. VCS AMS delivers industry-leading performance and capacity to accelerate regression testing of mixed-signal SoCs up to transistor-level accuracy. VCS-AMS is based on tight integration of VCS functional verification solution and CustomSim FastSPICE simulation engines. It supports complex design architectures mixing SPICE, Verilog, VHDL, SystemVerilog, Verilog-A, and Verilog-AMS.

"We welcome Elmos to our growing list of customers who are pushing the technology limits of mixed-signal designs," said Paul Lo, senior vice president of R&D in the Design Group at Synopsys. "We are committed to helping our customers accelerate their innovation by delivering significant gains in design and verification productivity for advanced mixed-signal designs through innovative EDA solutions."

 [Click here to return to Contents](#)

Leading Russian Water Company Selects AVEVA for Advanced 3D Modelling

18 September 2014

AVEVA announced today that Vodokanal Engineering, an important provider of water supply and wastewater projects in Russia, has chosen AVEVA PDMS as its 3D design modelling solution. AVEVA PDMS will provide much greater design efficiency while allowing Vodokanal to meet the increasingly high standards demanded by key clients.

'AVEVA technologies are advanced and powerful,' said Alexander Terentyev, Chief Engineering Officer, Vodokanal-Engineering. "Our customers' design standards are getting increasingly more sophisticated which was a problem for our current software. One such client is KINEF LLC, which operates the largest oil refinery in North-West Russia. As part of its project management framework, KINEF encourages its contractors to invest in the most advanced technologies to create more efficient project deliverables. This is particularly true for projects involving 3D design and modelling software, where AVEVA's PDMS solution has long been the industry standard.

'In the past, we were never required to check the model for clashes, to issue intelligent deliverables or to create a powerful digital asset for ongoing real-time collaboration with the operator. This is rapidly

CIMdata PLM Industry Summary

changing. Our clients now have ever more complex projects with demanding engineering requirements and we recognise the need for more advanced 3D design technology. Given KINEF's decision to use AVEVA solutions, we were both confident and impressed enough to implement PDMS ourselves; not just for this client but across our entire project portfolio. Interoperability, flexibility and collaboration are important to our business and AVEVA technology will help us meet project challenges for years to come.'

Dmitry Smeltsov, Vice President for Sales, AVEVA, Russia, commented: 'We have finally reached the point when operators and their engineering contractors work together in a more collaborative and effective manner. AVEVA has long been a proponent of solutions that support collaboration across the entire life cycle of major projects. We are always pleased to see the success that our software and support brings both to operators and to their contractors. This particular example is becoming more and more common. Operators are now ready to openly share their needs with engineering contractors in order to ensure the long term, efficient operation of their assets. It's a real step towards reducing risk and boosting efficiency for all parties.'

 [Click here to return to Contents](#)

Major Taiwanese DMS Company Pegatron Establishes New PCB Design Flow through Technical Cooperation with Zuken

16 September 2014

Zuken Inc. has announced that major Taiwanese Design and Manufacturing Services (DMS) company has built a new design environment centering on [CR-8000 Design Force](#) based on a technical partnership with Zuken.

Pegatron adopted Zuken's CR-8000 in 2012, and through technical cooperation with Zuken they integrated advanced automated design functions into CR-8000 Design Force based on design, verification and manufacturing know-how cultivated through many years of experience. As a result, remarkable achievements have already been made in terms of shortened project lead times and quality improvements. Based on these results, Pegatron has determined that their new PCB design flow based on CR-8000 exhibits performance far superior to that of other existing design systems and, moving forward, the company plans to accelerate full-out deployment efforts.

Pegatron is now offering contracted design and manufacturing services to its customers through direct utilization of CR-8000 and [CR-5000](#) data. They will exchange design data with their customers in CR-5000/CR-8000 data format. In addition to circuit board patterns, use of CR-8000 and CR-5000 data enables the direct transfer of design constraints specified by Pegatron customers, and detail such as circuit board technical information to achieve advantages such as significantly increased design and manufacturing quality, and a reduction in iterations which cause design changes. This has enabled Pegatron to offer customers even higher quality as well as faster design and manufacturing services in pursuit of greater numbers of orders from major electronics companies who use Zuken's CR-8000 and CR-5000 in Japan and other parts of Asia, the Americas, and Europe.

They received the following comment from Mr. Steven Huang, Senior Director RD Center-EA, SIM & CAE Division of Pegatron: "Previous CAD architecture had already become dated and we were encountering limitations in our ability to respond to new circuit board technologies, and in keeping up with the latest software technologies. We have nothing but high praise for the Zuken development team,

CIMdata PLM Industry Summary

who produced results through active efforts under Pegatron proprietary technical requirements, and the outstanding flexibility of CR-8000, which has enabled us to pursue expanded functionality on our own. We are confident that utilizing this data and transferring design data will help us to expand our company's business.”

Moving forward, Zuken will continue to serve as a technical partner to Pegatron by contributing towards further expansion of their contracted design and manufacturing service operations.

The accomplishments at Pegatron are scheduled to be announced at [Zuken Innovation World 2014](#), which will be held on October 16 and 17 at The Yokohama Bay Hotel Tokyu, Yokohama, Japan.

 [Click here to return to Contents](#)

Mountain Equipment Co-op (MEC) Selects Visual 2000 PLM

17 September 2014

Visual 200 International Inc. (<http://www.visual-2000.com>) announces that Canadian outdoor retailer Mountain Equipment Co-op (MEC) has selected its Product Lifecycle Management solution. MEC is planning to use a phased-in approach to implement the Visual PLM.net solution to manage all aspects of the brand manufacturing process for MEC brand apparel and hard goods products.

MEC maintains a hands-on approach to design and manufactures products that are functional, durable and of a high quality. In order to facilitate this strategy for the longer term, it was critical that MEC deploy an integrated solution to replace the multiple-siloed approach to data management and reporting. MEC selected Visual 2000 as their PLM partner because they feel that Visual is best able to support current and future business requirements from a functional and technical perspective.

MEC's Project Leader, Sharon Umbach commented, "We are excited to work with Visual 2000 and are looking forward to the benefits of a modern PLM system that has the ability to significantly improve the integrity, visibility and accessibility of our data throughout the organization. We are pleased to be taking a giant leap forward with a system that allows for greater collaboration between our teams and our factory partners".

Visual 2000 International's Vice President of Research and Development, Charles Benoualid expressed "we are pleased to align ourselves with a company that prides itself in its consumer oriented culture. We are continuously developing our PLM systems in order to match our customers' needs and we are confident that our platform, including newly developed mobile and "quick" functionalities will allow MEC to streamline their processes, and in turn, further their brand."

 [Click here to return to Contents](#)

RLM Welcomes Three New FashionManager Clients

16 September 2014

RLM Apparel Software Systems Inc. is welcoming three popular fashion brands to the fast-growing list of apparel, footwear and accessories companies that have selected the cloud-based FashionManager™

CIMdata PLM Industry Summary

software solution to manage their concept-to-consumer operations.

Thom Browne, a men's and women's wear design house based in New York, started in 2003 with traditional made-to-measure suits that have evolved into designs that have drawn attention from the fashion and design industries worldwide. The company launched men's ready-to-wear in 2004; followed by a women's RTW collection in 2011. The designer has been honored with the CFDA Menswear Designer of the Year Award in 2006 and 2013, GQ Designer of the Year in 2008, and the Cooper Hewitt National Design Award in 2012. Thom Browne collections are available through his flagships stores in NY and Tokyo as well as at designer specialty stores around the world.

Inspired by contemporary art, fashion, music and film, Modern Vintage is a lifestyle brand and fashion footwear collection for men and women that merges both a "Modern" & "Vintage" point of view to create new trends in textures, silhouettes and innovative marketing. The brand aesthetic is defined by the idea of creating an offering, which combines common elements of fashion with redefined design techniques.

In recent years, Los Angeles-based Simon Miller USA has grown from a niche denim supplier to a fully realized collection offering high-end knitwear, shirts, and more; all with the same combination of quality and lived-in style found in their jeans. Simon Miller fashions can be found at Barneys, Bergdorf Goodman and specialty stores in the United States, Canada, Europe, Asia and the Middle East.

"We welcome these three companies to the RLM family of clients," said RLM Partner Andy Lynn. "We are pleased to see that these and other successful brands continue to confirm our commitment to continuous product improvements and dedication to fashion-ready solutions. We are honored with the opportunity to serve these and so many other fashion leaders."

 [Click here to return to Contents](#)

Scotch & Soda Selects Centric Software Product Lifecycle Management

16 September 2014

Scotch & Soda, the Dutch fashion company, has selected Centric Software to provide its [product lifecycle management \(PLM\) software](#).

The Amsterdam-based fashion brand will implement the Centric 8 PLM solution throughout its women's wear, men's wear and children's wear product groups. Users will include styling, product development and sourcing teams. The company also will extend Centric 8 to its agents and suppliers.

Scotch & Soda will use the Centric 8 [PLM software for retail, apparel and footwear](#) companies to support its growth and geographical expansion, according to Duco Habbema, head of sourcing. "Centric 8 will help to expand the product range, streamline the product development process, increase productivity, and improve collaboration within and between internal and external teams."

"Centric provides a solution that allows the design staff to remain creative while providing improved insight into the upcoming collection for buying and production teams," Habbema says. "Additionally, Centric 8 will improve our ability to collaborate with agents and suppliers, a key to Scotch & Soda's continued success."

Scotch & Soda chose Centric as its PLM partner after an extensive selection process, explains Habbema.

CIMdata PLM Industry Summary

“Centric clearly offers the most comprehensive product for this industry,” he states. “Coupled with the best consulting team in the industry, this made the decision quite easy for Scotch & Soda.”

The Dutch company also cited Centric’s mobile apps. “Centric’s mobile application strategy is light years ahead of any other in the market,” says Erik de Graff, head of information technology for Scotch & Soda. Centric has introduced six mobile apps for the Centric 8 PLM solution: Capture It for iPhone Mobile App; Collection Book iPad Mobile App; Sample Review Mobile App; Factory Audit Mobile App; Switchboard Mobile App; and Material Sample Mobile App.

“Centric is proud to have won the trust of a prestigious brand like Scotch & Soda,” says Chris Groves, president and CEO of Centric. “Scotch & Soda will benefit tremendously from the ‘single source of truth’ that Centric 8 offers,” he explains. “The ability to achieve greater alignment between the company’s development and buying teams in Amsterdam, and its agents and suppliers in Asia, will allow Scotch & Soda to move forward confidently.”

 [Click here to return to Contents](#)

Ukrainian Research Lab Adopts C3D’s Kernel for Analysis Software

16 September 2014

C3D Labs is pleased to announce that its geometric kernel is being integrated into software from Dynamics & Structures Lab of Dnepropetrovsk, Ukraine. The research laboratory is developing Belinda Structure as an environment for engineering analysis. Thanks to the intelligence of the C3D geometric kernel, the software gains capabilities in creating and analyzing data, and in importing geometry models from other CAD systems.

Dynamics & Structures Lab specializes in software for calculating the strength of structures like bridges, and is a specialized research center into the dynamics of structures, buildings, and facilities. Belinda Structure is their software that designs and analyzes deformable systems by taking into account dynamic loads, such as on railway bridges that carry high-speed trains. When the dynamics of deformable systems are calculated, it is crucial to take into account the geometry and inertial characteristics, and contact conditions of the structure accurately.

”This is why we decided to use the C3D geometric modeling kernel,” said Vitali Artemov, founder of the laboratory. “It has proven itself by being embedded in a number of ASCON software products, such as KOMPAS-3D mechanical CAD software.”

According to preliminary analysis of the C3D kernel, the laboratory’s experts concluded that the Belinda Structure software will now be able perform these functions:

- Develop, edit, and display the geometry of computational models in Belinda’s visual editor
- Design cross-sections of axial elements made of arbitrary shapes
- Automate the calculations of geometric characteristics of flat sections, and the inertial characteristics of solids
- Apply versatile grid algorithms for sampling models, such as the Delaunay method
- Determine the characteristics of contacts between structures and sources of stress loads

- Share geometry in the most popular formats
- And much more

"We trust that the C3D kernel will provide new impetus for developing the company's commercial software, as well as its research activities in the laboratory," Oleg Zykov, CEO of C3D Labs: "For our part, we will provide all the support the Belinda Structure developers require in integrating their software with our C3D kernel. We are following this project with great interest."

 [Click here to return to Contents](#)

Product News

Altair HyperWorks® 13.0 Advances Current Product Design Trends

16 September 2014

[Altair](#) today announced a new release of [HyperWorks®](#), the most comprehensive version to date of its computer-aided engineering (CAE) software platform, which has set the global standard for enabling its users to create more durable and efficient products.

HyperWorks 13.0 increases engineering productivity in four distinct areas:

- **Performance optimization.** Through a wide array of solvers and multiphysics solutions, engineers are able to quickly predict and optimize product performance.
- **Lightweight design.** Tailored simulation and optimization tools help reduce weight while meeting design goals through the use of effective geometries, new materials, and advanced manufacturing methods.
- **Lead-time reduction.** Process automation, efficient modeling algorithms and advanced visualization capabilities help to dramatically increase simulation throughput to help bring products to market faster.
- **Access to new technologies.** Simulation accessibility has been extended to new categories of users for design and optimization, including open access to specialized third party software from members of the Altair Partner Alliance (APA) and HPC, cloud-based products.

"This release of HyperWorks advances the most current trends in product design," said James Dagg, Chief Technical Officer of Altair. "With an even sharper focus on tools for the analysis and design of composite structures, it facilitates processes for the mass customization of products. HyperWorks continues to offer a broad array of advanced solvers enabling engineers to simulate a wide range of physics, from the analysis of linear and nonlinear phenomena in structures to fluid flow, thermal, and electromagnetic behaviors."

Performance optimization

OptiStruct® can now operate as a strong nonlinear solver, with major improvements that elevate its functionality to simulate large displacement analysis and hyper-elastic materials like rubber with an extremely efficient use of parallel computing to maximize speed. Its optimization capabilities have been enhanced to introduce new response types and multi-model optimization (MMO), allowing one efficient solution for components that are common across different structures.

CIMdata PLM Industry Summary

AcuSolve® can now be coupled with MotionSolve® for a more accurate analysis of the flow of air or other fluids while the structural part is moving. An example would be simulating the effect of an adjustable rear wing on sport vehicle aerodynamic performance. This solver coupling represents one of the suite's many multiphysics capabilities.

RADIOSS® furnishes more physics and even more accurate results for crack-propagation modeling through the extended finite element method (XFEM) and enhanced capabilities for airbag deployment. RADIOSS also offers improved parallelization for multi-domain methods and advanced mass scaling for better performance.

Both HyperStudy® and OptiStruct now offer integration with Excel. An engineer may export tradeoff studies to spreadsheets allowing to do post-processing independent of HyperStudy or, in OptiStruct, include Excel calculations as a response type in the optimization run.

Lightweight design

Altair is well-known for its expertise in designing composites structures. Pre-processing features in HyperWorks have been enhanced for improved usability. New, advanced methods of visualizing composite simulations in both the pre- and post-processing stages are now available, with the ability to visualize material, element and ply systems and overlay them with stresses. Additionally, new material laws and failure criteria for laminated composites and polymers are included.

HyperForm® now moves beyond metal forming to apply its capabilities to composite forming for sandwich and multilayered structures. The HyperMesh® drape estimator calculates thickness and angle variations that result from draping. These are very convenient accessories available to every HyperWorks user.

Lead time reduction

With the latest release of HyperWorks, engineers spend less time on the model build and get solutions more quickly. For instance, mass customization requires manufacturing many different versions of the same product. Altair has completely rewritten the part-replacement tool so that, if engineers are bringing in a new geometry, they can simply exchange the parts and all the connections are updated automatically. A new comparison tool can compare any combination of computer-aided design (CAD) and finite element geometry and highlight the differences. Enhanced direct modeling capabilities in HyperMesh allow users to quickly generate such geometries as reinforcement ribs without needing to go back to a CAD system.

Post-processing enhancements provide users with faster access to results and better ways to analyze them. Bidirectional communication between the HyperWorks desktop and PowerPoint is now possible. Results are now cached so that users may switch quickly between result sets when working on larger models.

HyperMesh, HyperView® and HyperGraph® each feature a new, unified Entity Editor to help modify all parameters of model or post-processing session entities faster. In the HyperMesh Entity Editor, new entities, components, properties and materials may be created much more efficiently. Solver documentation also is implemented into the Entity Editor via tool tips.

Interoperability between HyperWorks, CAD and product lifecycle management (PLM) systems allows engineers and designers to communicate easily and share product modifications in a truly collaborative environment. With HyperWorks 13.0, Altair has added bi-directional support for Windchill and Total Materia to the list of supported PLM systems and material databases.

Particular attention has been paid to the development of solutions for industry-specific use cases.

HyperWorks Virtual Wind Tunnel™, a complete solution for automotive external aerodynamics, is now part of the HyperWorks suite as is a new aerospace user profile. Other solutions for NVH, drop test simulation and more are now available as HyperWorks solutions via an innovative delivery and licensing system.

Access to new technologies

Altair's optimization technology, which has been available for more than 20 years in OptiStruct, is now part of solidThinking Inspire®, an easy-to-use package designed to make finite element analysis (FEA) accessible to non-experts. SolidThinking Inspire allows for quick and easy creation and investigation of structurally efficient concepts and now includes analysis and geometry simplification capabilities. In addition, more than 50 third-party specialized solutions are available to HyperWorks users at no additional charge through the Altair Partner Alliance. Altair's groundbreaking, token-based user model is evolving continuously to provide more value and enable customers to implement a simulation-driven design process.

 [Click here to return to Contents](#)

Aras Announces OEM Licensing Program for Advanced PLM Suite and Underlying Platform Technology

17 September 2014

Aras® today announced an OEM licensing program for its advanced PLM platform and technology. Under the program, global independent software providers (ISVs) can license, rebrand and repackage Aras's proven capabilities as their own. ISVs can license the entire product lifecycle management suite or a subset of the underlying platform technology. Aras established the program as a growth strategy in response to market demand for its advanced technology.

“As global enterprise software providers move aggressively to enter new markets and deliver new functionality to customers, they have to consider how fast they can get to market with the right capabilities,” said Robert Parker, group vice president at IDC. “What Aras is doing by OEM licensing their platform technology and solutions is quite interesting because it gives ISVs a new option to consider that can help them move quickly and offer a competitive alternative.”

The Aras technology is particularly attractive to global providers of ERP, MES, SCM and other enterprise applications that want to expand their product lines and surpass their competition by offering more advanced technology solutions.

“Instead of taking years to build enterprise application functionality from scratch or acquiring outdated technologies, ISVs have a new option: OEM with Aras – whether it's our entire PLM solution suite or some specific platform functionality – and start generating revenue right away,” said Peter Schroer, President of Aras. “With our OEM program global ISVs have access to modern enterprise software that's market proven and works together with their existing product portfolio.”

Learn more about the Aras OEM Licensing program at <http://aras.com/plm/002660>

Current Relationships

Infor - Aras today announced an OEM partnership with Infor, a leading provider of business application

CIMdata PLM Industry Summary

software serving more than 70,000 customers, whereby Infor will offer the Aras PLM solution suite under its own brand, Infor PLM Innovator – powered by Aras, integrated with its Infor 10x platform technology and industry-leading ERP systems. Read more about Infor using Aras at

<http://aras.com/plm/002661>

PACE Aerospace Engineering and Information Technology - PACE, a global provider of intelligent software solutions for the aircraft industry, has embedded the Aras technology for complex configuration structures, revision & versioning, lifecycle management and file vaulting in the Pacelab product line which provides aircraft cabin interior design to leading aerospace companies including Airbus, Boeing, Bombardier, Embraer and others worldwide. Read more about PACE using Aras at <http://aras.com/plm/002662> and <http://aras.com/plm/002663>

CAE - CAE, a global leader in integrated operational and training solutions, has embedded the Aras technology for configuration management of asset structures along with secure federated integration capabilities which connect Esri GIS mapping package and 6 other applications into an Integrated Emergency Management System (IEMS). Read more about CAE using Aras at

<http://aras.com/plm/002664>

Aras OEM Licensing Program Benefits

Advanced Technology – Open architecture based entirely web services which is Cloud-ready and mobile-enabled that provides federated integration capabilities for seamless connectivity to other enterprise systems, cloud services and data sources. Scales up and out for the largest global enterprises, yet light-weight – less than 1 million lines of code – for applications where footprint size matters.

Proven Capabilities – Sophisticated workflow, lifecycle state management, structure management, configuration management, project management, requirements management, as well as comprehensive virtualization capabilities, robust security, replicated vaulting and more.

Flexible Business Model - Offer subscriptions, sell licenses or monetize based on transactions or other formats. Run a multi-tenant cloud, deploy in either a traditional data center or a hybrid configuration that includes both conventional and cloud resources.

 [Click here to return to Contents](#)

ASCON Adds Functional Enhancements to KOMPAS-3D V15

16 September 2014

ASCON Group is pleased to announce the release of Service Pack 1 (SP1) for KOMPAS-3D V15. This service pack contains improvements and several new functions designed to allow our customers to carry out 3D modeling more effectively.

The most important new functions in SP1 are these:

- Additional thread fitting options
- Third-angle projection method
- Setup dialog box for exporting models in STL format

Additional Thread Fitting Options

The Cosmetic Thread command has been improved with additional fitting options. When a thread is

fitted to a conical or spherical surface (with an axis common to another element), then SP1 enables additional types of fittings. These apply to examples like threaded rods with chamfers or fillets (see figure below), or threaded holes with conical bottoms.

The benefit to users is that they can move the upper border of the thread to preserve the height of the chamfer or fillet; similarly, the bottom border can be moved to retain the length of the thread's base surface. When creating or editing cosmetic threads, SP1 enables these new options through the new Offset 1 and Offset 2 switches in the Properties bar.

Third Angle Projection Method

SP1 makes it possible for KOMPAS-3D to place drawing layouts according to the requirements of ISO 128-30 2001 (E). The two new layouts options are By first angle or By third angle. The layout spacing is specified through the new Projection Method options in the new View Parameter Setup dialog box.

The By first angle method is enabled by default. The view placement scheme is in accordance with the GOST 2.305–2008 standard.

Users benefit by being able to place layouts quickly according to ISO and GOST standards.

Setup Dialog for Exporting in STL Format

The new STL Export Parameters dialog box selects the types of objects to be exported, whether bodies or surfaces. It also allows users to specify the coordinate system, the units of length for the exported triangles, and the precision in which model is saved.

The precision options include these:

- Maximum linear deviation of triangular faces from source surface
- Maximum angular deviation of triangular faces' normal lines from each other
- Maximum length of a triangular face's edge
- These new options give our users greater control of STL exports, such as for 3D printing.

 [Click here to return to Contents](#)

Ashampoo 3D CAD Architecture 5 – Computer Aided Design for Everyone

16 September 2014

With Shampoo 3D CAD Architecture 5, German software developer Shampoo releases a software solution that targets planning and design of buildings and gardens. Faithful to the motto "extensive feature set coupled with intuitive handling", the application is ideal for anyone seeking to visualize interior and exterior design projects on their Windows PCs.

"Over the years, our CAD software has attracted a large fan following that reflects the diverse use cases covered by our software. Apart from ambitious home users, this also includes architects and designers. This clearly shows our software is easy to use but still manages to meet professional requirements while offering an unmatched price-performance ratio." says product manager Tim Schiemann.

Summary:

- **New:** Shampoo 3D CAD Architecture 5

CIMdata PLM Industry Summary

- **New:** 64-bit version
- **New:** Simplified user interface
- **New:** Ribbons
- **New:** Quick access toolbar
- **New:** 2D fill patterns and textures
- Step-by-step project wizard
- 2D, 3D and cross-section views
- Smart input and construction aids
- Integrated roof, staircase and terrain design wizards
- Realistic light and shadow simulation
- Extensive object catalog
- Compatible with Windows XP SP3, Windows Vista, Windows 7 and Windows 8
- Price: \$79.99

New: Get results faster and easier

Version 5 provides two different user interface styles, classic and ribbon. The ribboned interface is suitable especially for beginners and features thematically structured features and buttons.

To help customers get started, Ashampoo offers several comprehensive video tutorials accessible through the startup wizard as well as any browser at <http://www.ashampoo-cad.com/tutorials/?lang=de>

New: 32- and 64-bit version

In addition to the 32-bit version, Ashampoo 3D CAD Architecture 5 also comes in 64-bit to allow the use of more than 3.5 GB of RAM on machines running a 64-bit Windows OS. This ensures a smoother work flow with complex projects. The setup wizard automatically selects the right version for you during installation.

New: Extended 2D fill patterns and 3D textures in 2D views

In previous versions of 3D CAD Architecture, fill patterns were entirely based on drawing routines provided by Windows. In version 5, you can create your own patterns from lines, circles, curves etc. and use them in your projects. To this end, the fill properties for elements displayed in 2D have been greatly extended.

 [Click here to return to Contents](#)

BobCAD-CAM Releases New V27 CAD-CAM Software Series

16 September 2014

BobCAD-CAM, Inc. develops CAD/CAM CNC machining software for manufacturing businesses. They have just released the new v27 series of CAD CAM software ranging from 2.5 Axis to 3, 4 & full 5 Axis simultaneous CNC machining. Their CAD CAM products improve workflow efficiency by streamlining the process of selecting tools, materials and cutting strategies which can be very time consuming and produces the numeric code that the machine requires to actually machine the part fast

CIMdata PLM Industry Summary

and error free. In addition to CAM machining enhancements, the v27 software has received a major overhaul on the CAD design side making the overall performance improvements of the product significant.

“I am just really excited for the users to get their hands on this software as this is our largest and most robust CAD CAM upgrade that we have developed to date,” said Greg Myers, who oversees Software Development at BobCAD-CAM.

The new [v27 CAD CAM](#) release is significant in terms of the major design functionality that has been added to the software more so than any other release they have had in years since their first solid modeling releases over 10 years ago. The v27 provides a new CAD Solid Action Tree that allows users to modify any step of their solid creation. The solid creation tree is fully associative to designed solid model, making editing steps to a drawn model faster and easier than ever before in BobCAD. Dynamic Drawing has been added making simultaneous sketching and editing of values available to users.

“Users now truly have the freedom to really design with this system. Updating and changing your model is so easy, no longer will you dread that new revision sent from engineering!,” added Myers. New surface and solid creation tools have been added giving users on the fly extruding and modifications of solid shapes. A new CAD shape library with 40 shapes to pick from gives users many common shapes to speed up the design process, something the BobCAD software has never offered before. Other CAD enhancements include new 2D Boolean features for faster editing of intersecting 2D geometry. A Project to Z feature allows the user to extract edges from a 3D model and flatten the geometry along the Z plane or a defined axis. Geometry scaling features have also been added. The new Extrude Boss and Extrude Cut features provide added flexibility to designing models along with a new Shelling feature that allows users to hollow out a solid model leaving a thin walled solid on the remaining surfaces. These and other CAD features enhance the design experience form users and offer a faster and easy tool for design innovation.

In addition to the major CAD design upgrades, the v27 software provides new CAM machining benefits. The Mill 3 Axis Pro module enhancements include adding finishing styles to the Advanced Planar option including “up” and “down” cutting which provides the ability to control the cut direction by forcing the tool to cut only in the up direction or down direction on the model. Further control of the toolpath is provided by an Overlap Distance and a Minimum Height Change to handle shallow areas of the model. Another important machining enhancement that was added is the new Adaptive Step-over for Planar surface machining which automatically adds more passes to eliminate steep jumps in the toolpath.

The software now automatically adds additional cuts when the depth between the current pass and previous pass exceeds the step-over value. In addition, the new Trim to Operation Stock option allows you to pick an STL to define the stock for the current operation. The software then trims out all air cutting, so more time is spent making chips. This can also be utilized as a 3D boundary to give you even more control of the toolpath creation. New boundary options have been added as well as a new Planar REST finishing feature.

The Pro module Z-Level Finish operation has been enhanced and now includes Zig, Zig Zag and Spiral cutting options that can be controlled by the user. The Adaptive Depth of Cut option that has been added to the Standard and Pro modules again automatically detects shallow areas on the part and adds extra passes to get a more consistent finish with this strategy. The advanced Z-Level Finishing operation also includes a REST finishing option now. All of these new enhancements allow users to create more efficient programs for 3 Axis part programming.

CIMdata PLM Industry Summary

Other features include the new Project Curves operation added to the Mill 3 Axis Pro module allows you to select one or more chains to project onto a 3D Model with the ability to compensate for the tool. This toolpath has many uses from engraving text, to manually creating your own 3D toolpath from standard 2D geometry. The software also provides the ability to offset the 2D shape automatically on both sides, to the right, or to the left of the chain direction. The v27 series is packed with time saving functionality not available in any of their earlier releases. For example, the Boundary Options provide a significant improvement to user-defined operation boundaries. Previously, the tool center always went to the defined boundary. You can now select whether the tool stays inside the boundary, goes outside the boundary, or cuts with the center of the tool on the boundary. The additional Offset parameter provides even further control of the tool at the boundary when using inside or outside. This results in much less time spent creating CAD geometry to use at the boundary.

A variety of enhancements have been made to the 4 and 5 Axis modules such as the SWARF operation, MultiAxis roughing enhancements and improvements in gouge checking. The Tool Axis control has been improved with several new tilt strategies. The BobCAD development team was also able to make significant improvements to their WireEDM product such as adding automatic setup sheets, the ability to edit wire cutting condition tables, create toolpath patterns and more.

BobCAD-CAM is also proud to announce that their software now supports the 3DConnexion 3D Mouse products.

 [Click here to return to Contents](#)

Dassault Systèmes Introduces SOLIDWORKS 2015

18 September 2014

[Dassault Systèmes](#) today announced SOLIDWORKS 2015, the latest release of the company's successful portfolio of 3D design software applications. With SOLIDWORKS 2015, users gain access to cloud-based capabilities and a wider range of choices for improving productivity, work processes, operating costs.

SOLIDWORKS 2015 covers all comprehensive aspects of the product development process with an intuitive, integrated 3D development environment that includes 3D design, simulation, electrical design, product data management and technical communication. In addition, starting with the new Collaborative Sharing feature, SOLIDWORKS 2015 enables access to Dassault Systèmes' 3DEXPERIENCE platform and its cloud-based capabilities. Designers and engineers can span multiple disciplines with ease, shortening the design cycle, increasing productivity and collaborating to deliver innovative products to market faster.

"We've listened to our users and noted how, as their business success grows, their design needs rapidly expand," said Bertrand Sicot, CEO, SOLIDWORKS, Dassault Systèmes. "This is why we are so attentive to our users' needs. More than 90% of the functionality in SOLIDWORKS 2015 has been directly requested by customers. With the 3DEXPERIENCE platform now accessible, users can connect their existing SOLIDWORKS desktop applications to the cloud and begin developing new business processes and enjoy 3DEXPERIENCE powered new generation apps, such as SOLIDWORKS' upcoming Industrial Design application. Today's announcement is a testament to our ongoing

commitment to users.”

SOLIDWORKS 2015 not only delivers key enhancements requested by the entire user base, but also solutions for a wide array of industries and markets. For example, SOLIDWORKS users will be able to easily enhance the aesthetics of consumer products and apparel, and simulate construction machinery, building infrastructure and machine tools better than ever before.

“With the emphasis on the direct-from-3D-model fabrication processes, it’s important that we shift our focus to model-based definition so that we can shorten our overall design cycle and simplify the way we do things,” said Ryan Trulli, Mechanical Engineer, GE Oil & Gas. “With SOLIDWORKS Model Based Definition, the 3D model itself holds all the dimensional data necessary to make the part. This means less documentation creation, fewer emails flying around, and fewer files to sustain when the project is complete.”

SOLIDWORKS 2015 Portfolio Enhancements

Following are the top user-requested features, products, and enhancements included in the SOLIDWORKS 2015 portfolio:

Improve Everyday Productivity

- *Focus On Design, Not Modelling* with new features that reduce geometry creation steps.
- *Faster Information Sharing* – Improved general performance, faster analysis and streamlined approaches give users the data to quickly make decisions and keep designing.
- *Enhanced User Experience* – An improved graphical interface presents a clear view of critical data to help focus on design.
- *Simulate Multiple Design Scenarios* – Quickly evaluate the effects of various load combinations on a model, and tracking results.
- *MySolidWorks Standard* – The new MySolidWorks Standard and Professional subscription levels deliver more than 100 hours of SOLIDWORKS training materials and online file exchange services.

Optimize Work Process

- *Collaborative Sharing* – By easily accessing social collaboration and online data management tools on the 3DEXPERIENCE platform, users can benefit from faster development and quicker decision making.
- *SOLIDWORKS Treehouse* – Top-down design is facilitated by visually creating assemblies, enabling product structures to be managed at the beginning of design projects.
- *Web2 for SOLIDWORKS Enterprise PDM* – With the addition of mobile connectivity, users can connect to Enterprise PDM from any location, at any time.

Reduce Operations Costs

- *SOLIDWORKS Model Based Definition* – A new offering to help improve communication between design and manufacturing teams by enabling them to communicate product and manufacturing information (PMI) in 3D.
- *SOLIDWORKS Inspection* – The process of creating documentation is simplified, allowing users to quickly set up and compare baseline data to production parts for quality control.
- *SOLIDWORKS Electrical* – Quickly develop electrical schematics and incorporate them into the 3D model with enhanced cable harness and system integration.

- *Enhanced Cost Analysis* – Users can estimate costs across many manufacturing methods, including weldments, plastics, castings and 3D printing.

Solve More Design Challenges

- *Improve Manufacturability of Products with Compound Curvature* – Automatically flattening of 3D models, to help identify materials and manufacturing issues. This feature is especially helpful to those in the apparel, footwear, upholstery and shipbuilding industries.
- *Enhance Product Aesthetics and Usability* – Creating asymmetrical fillets for parts, assemblies and surfaces gives users in the high tech, medical and consumer industries increased flexibility to model more ergonomic and stylized designs.
- *Accurately Simulate Machine Components* – Developing accurate construction machinery and machine tools with automated roller chains helps ensure operation and usability.

 [Click here to return to Contents](#)

Delcam's New FeatureCAM More Powerful and Easier to Use

17 September 2014

Delcam has released the 2015 version of its FeatureCAM feature-based CAM system with a range of enhancements in three-axis milling, two-axis and five-axis drilling, turning and turn-mill, and wire EDM to make the software even more powerful and easier to use. Full details, including video demonstrations, are on the Learning Zone – www.delcam.tv/fc2015

FeatureCAM was the world's first feature-based programming software when it was launched in 1995. Constant development since then has ensured that the system has retained its leadership in programming speed and ease of use, while an increased range of strategies has been added to provide more efficient toolpaths that give greater productivity on a wider range of machinery, including mill-turn machines, five-axis mills and wire EDM equipment.

In FeatureCAM 2015, programming of complex parts has been made easier and more reliable with the addition of automatic collision checking of the tool shank and holder, as well as the cutter, for both three-axis roughing and finishing toolpaths. The user has the choice of either stopping the simulation immediately when a gouge is detected or of running the complete toolpath with any gouges being highlighted on the model as they are detected. The toolpath can then be recalculated with any segments that will cause a gouge clipped away.

Removing these segments of the toolpath will leave an area of unmachined stock that will need to be removed with a longer tool. This extra toolpath can be calculated using a stock model of material remaining after the shorter tool has been used to ensure there is no re-machining of stock that has already been removed.

As part of this development, an additional function, called 'maximum machine stock', has been added that removes direct moves where clipping has occurred. These direct moves can leave witness marks on the part so their removal improves surface finish.

Another improvement in three-axis machining allows stock models to be used in conjunction with other geometry, such as the part surface dimensions, solid models, the stock dimensions and boundary curves. This addition gives better control over the area to be machined by each toolpath and so gives

CIMdata PLM Industry Summary

more efficient machining by allowing the user to confine toolpaths to specific regions and to eliminate air-cutting by referencing the stock model.

Five-axis programming of multiple holes has also been made easier in FeatureCAM 2015. It is now possible to create patterns of holes of similar size with regular positioning. Any subsequent changes to the program can then be made for all the holes in the pattern in one operation, rather than having to edit the toolpaths separately for each individual hole.

A series of improvements have been introduced to make turning with FeatureCAM more efficient. The software now produces toolpaths that rapid up and over previously machined diameters, rather than feeding along them. This reduces the overall cycle time and avoids dragging of the tool.

'Pinch and follow' turning can now be chosen when machining components using the 'face' or 'back face' cycles. Using this method gives better results since having the tools cut in opposing directions to each other means that the cutting forces are better balanced.

Two additions have been made to provide support for a wider range of turning and turn-mill machine tools. Firstly, support has been added for the use of travelling steady rests to give increased flexibility when turning very long parts. Secondly, FeatureCAM 2015 has the ability to manage multiple part-catchers on turn-mill equipment. Machines with multiple part-catchers include the Nakamura WT-150, NTJX and NTMX, all of which have part-catchers for the main spindle and a separate part-gripper for the sub-spindle.

FeatureCAM 2015 also provides full-machine simulation and post-processing for the rotating sub-spindle on the Mori Seiki NTX1000 turn-mill equipment. The user has full control over the angle of the sub-spindle, with the software inserting automatically an operation on each channel so that the lower turret is positioned correctly prior to the movement of the sub-spindle.

For users of wire EDM, FeatureCAM 2015 provides an expanded wire-cut database to support multiple machines with varying formats and methods of operation, with the ability to specify nozzle type and fluid type as well as material type and thickness, wire type and diameter, and EDM machine. This gives more flexibility by providing the option to store and apply a greater variety of different parameters.

Finally, FeatureCAM 2015 allows easier programming of families of parts. Working with the part library, the software matches the names of features within the part library with user-created curves relating to those features. This makes the programming of subsequent parts in the family much easier and faster.

 [Click here to return to Contents](#)

Dremel Builds On Legacy of Easy-To-Use Tools with Introduction of 3D Printer

17 September 2014

Today, Dremel introduces the Dremel® 3D Idea Builder, one of the most user-friendly 3D printing experience on the market. This adds a new dimension to the brand's robust portfolio of versatile tool systems. The Idea Builder is yet another high-quality, easy-to-use tool from Dremel designed to inspire and empower the end-user to build on their own ideas with the support and mentorship of the Dremel Experts. Through a strategic partnership with Autodesk, Inc., Dremel will provide free print-ready 3D models and simple design tools, while continuing to release new design tools on Dremel3D.com to

CIMdata PLM Industry Summary

coach users through the building process. Dremel 3D pre-sale starts Sept. 18, 2014, on homedepot.com and amazon.com, with in-store availability at select The Home Depot® stores in early November.

"Dremel 3D will enable people to take 3D printing to new levels, from imaginative projects for the home, to inventive projects that may impact the world," said John Kavanagh, president of Dremel.

"Makers have been using Dremel tools to make three-dimensional creations with cutting tools for generations. Today, makers are using Dremel tools to fine-tune and fix their 3D printed creations and have been asking us to introduce a 3D printer. We're proud to offer them the Idea Builder and we can't wait to watch them build what's next."

Key Product Features of the Dremel 3D Idea Builder Include:

Easy-to-Use Functionality

- **Intuitive print software** for simple customization of 3D models
- **Pre-installed extruder** for fast out-of-the-box use
- **Print-ready model portfolio provided by Dremel and Autodesk** to kick start the building process
- **World-class product support and mentorship** via the Dremel Experts

Full-Featured Tool

- **Full color touch screen and onboard print software** for stand-alone operation when needed
- **Fully enclosed** for reduced noise and protected object building
- **Active cooling fan** prevents warping of objects while they are built
- **Best-in-class print resolution** (100 micron) for fine printing detail
- **Large, removable build platform** for larger prints and projects

Family and Environmentally Friendly

- **UL certified** to assure quality and safety
- **PLA filament** in 10 vibrant colors are plant-based, recyclable and renewable
- **Energy saving mode** reduces environmental impact and wasted energy

The Dremel 3D Idea Builder is more than just a 3D printer, it includes an "ecosystem" of features and services designed to nurture both novice and advanced users, opening a new world of project potential. Moreover, as the world's first UL certified 3D printer with best-in-class features and world-class service via the Dremel Experts, Dremel 3D is the perfect choice for home use. To complete this ecosystem, Dremel, through its strategic partnership with Autodesk, Inc., will offer access to free* design tools found on www.Dremel3D.com. Consumers will be able to choose from print-ready models, simple adjustable templates, such as a jewelry customizer, or they can choose to start their design from scratch with easy access to the [Autodesk® 123D®](http://www.Autodesk.com) family of free* design software applications.

"This is just the beginning for us," said Kavanagh. "The Dremel 3D model portfolio will continue to grow with the help of Autodesk® 123D® apps and the models we will curate from our community. Additionally, we'll be offering an increased number of customizers on our site that will further empower people to develop and personalize projects of their own. Long-term, the partnership with Autodesk will allow us to bring together hardware and software to better address the needs of our community. We're excited to be an early partner with Autodesk in using Spark, the open platform to better connect digital content and the hardware."

CIMdata PLM Industry Summary

The Dremel 3D Idea Builder is available for pre-sale starting Sept. 18, 2014 on homedepot.com and amazon.com and will be available starting in November in select The Home Depot stores throughout the U.S. (MSRP \$999). In addition to select The Home Depot locations in Canada, the Dremel 3D Idea Builder will be available at select Canadian Tire stores and online at canadiantire.com.

 [Click here to return to Contents](#)

IC3D Introduces IC3D Steel 2.0 with Improved Management Features

17 September 2014

IC3D has today introduced the latest version of its steel structural design and management software, IC3D Steel™ for SolidWorks®.

Distributed locally by Australia and New Zealand's leading SolidWorks partner, Intercad, IC3D Steel 2.0 introduces a raft of features centred on improving project flow and management, and simplifying organisational tasks like notating bolt lists and depicting virtual bolts in a design.

“IC3D Steel was first conceived as a dedicated steel design tool for SolidWorks. We built upon SolidWorks' parametric modeller and its core Weldments Design function, to build a 'structural workflow' application that is perfect for building and detailing with steel. Our aim is to make the design process quicker, simpler and error-free,” says IC3D Software and Consulting Services Manager Mike Gilliland.

“Following extensive feedback from our customers and user groups, we've now further refined the software with additional functionality that makes it easier for designers and design teams to manage their projects within a specified workflow, and given them additional tools to simplify organisation within projects.”

In IC3D Steel 2.0, projects are organised individually, all relevant files are associated automatically, and files are stored logically for easy retrieval, backup or archiving. Important project meta-data such as a customer's details, project number and document-numbering scheme can be configured at project setup. IC3D Steel uses this data whenever it creates or updates a document in the project; meaning drawings can be consistently labelled for additional security.

“Other new features address the complexity inherent in steel fabrication projects,” says Gilliland.

“For example, with steel designs generating up to ten times as many bolts, nuts and washers as steel members, the usual performance of SolidWorks can become compromised as assemblies become very large,” he explains.

“IC3D Steel 2.0 features 'virtual bolts' in each of its joint details to manage the problem, so work is unaffected no matter how many bolts are used in the design. A new 'Bolt List' report generates a complete list of these fasteners for ordering, and this can be broken down into individual joints or summarised for the whole project.”

Gilliland says the new features don't come at the cost of steepening the learning curve.

“SolidWorks already has the best user interface in the business and IC3D Steel builds on its core functions to effectively shorten the learning curve. Existing features such as the included Steel Tutor and Steel Wheel provide a readily available learning resource and mode switching environment without disrupting the design process.”

 [Click here to return to Contents](#)

Infor and Aras Deliver Transformative Cloud PLM Solution

16 September 2014

[Infor](#) today announced [Infor Product Lifecycle Management \(PLM\) Innovator - powered by Aras](#). Delivered in partnership with Aras, Infor PLM Innovator is a highly scalable, flexible and secure cloud-based solution for Infor customers around the world. Available now in limited release, Infor PLM Innovator will provide the Infor 10x user experience and be integrated through [Infor ION®](#) with [Infor SyteLine](#) and [Infor LN](#).

Infor PLM Innovator goes beyond the capabilities of standalone PLM products to unite the entire product lifecycle, helping to provide a comprehensive view that enables enterprises to accelerate product realization from design and manufacturing to purchasing, quality, and supply chain. Capturing data flow between Infor enterprise resource planning (ERP) applications, Infor PLM Innovator supports strategic business processes including product development, new product introduction, systems engineering, quality compliance, and global manufacturing.

Infor PLM Innovator - powered by Aras is:

- **Advanced** - A single, modern Web framework with an open architecture and a comprehensive PLM solution suite that extends beyond product data management to provide end-to-end product lifecycle management throughout the enterprise and extended supply chain.
- **Flexible** - Drag and drop customization enables the software to adapt to company specific requirements with real-time agility and the ability to change at the speed of business.
- **Scalable** - Scales up and out to support multinational enterprises as well as midsize businesses with expanding requirements across the supply chain, including managing petabytes of complex computer aided design (CAD) data and documentation.
- **Secure** - Compliance-grade security protects valuable intellectual property with customizable role-based permissions, authentication and access control functionality that enables sharing of information across the enterprise and with suppliers, partners and customers, confidently.

"By teaming up with Infor we are able to reach a wider range of customers with our enterprise PLM suite, and deliver an integrated experience to Infor customers worldwide," said Peter Schroer, CEO of Aras. "Our partnership gives companies a subscription-based PLM option that's highly scalable and can be deployed in data center, Cloud or hybrid scenarios with compliance-grade security."

"When manufacturers experience limited visibility across the product lifecycle, they are not equipped to speed time to market or enhance the quality of their products," said Soma Somasundaram, executive vice president, Global Product Development, Infor. "Infor PLM Innovator delivers the necessary tools to create a unified view of production, from conception to the supply chain. Organizations across multiple industries, whether it's discrete manufacturing or automotive, can leverage this technology to optimize each step within each process, ultimately creating time and cost savings for the company."

 [Click here to return to Contents](#)

Mentor Graphics and Lumerical Unify Optical Design and Simulation Flow

19 September 2014

Mentor Graphics Corporation today announced an integration with Lumerical's INTERCONNECT to enable new silicon photonics design methodologies that leverage the Pyxis™ and Calibre® platforms. With the INTERCONNECT integration, users are now able to perform optical circuit simulation directly from the Pyxis Schematic.

With this integration, users can capture a photonic design and testbench, set up optical simulation parameters for transient and frequency analysis, perform simulation, and view results interactively from the Pyxis Schematic simulation cockpit. This not only delivers a tremendous boost in productivity, but it also leverages the existing integration to high-capacity EZwave™ waveform viewer. While traditionally used as a viewer for mixed-signal waveforms in the electrical time domain, the EZwave viewer, which includes a built-in waveform-based calculator, an eye diagram tool, and TCL scripting, is also ideal for processing optical simulation results.

Complementing the Pyxis Schematic in the Pyxis custom IC design platform is Pyxis Implement, a tool for layout design. Well renowned for its all angle editing capabilities, Pyxis Implement with schematic-driven layout enables users to quickly place and assemble photonic PCells using connectivity-driven waveguide routing with radial and adiabatic bends, as well as S-bend support. To complete this full-flow silicon photonics design methodology, Calibre tools perform DRC, LVS, lithography simulation, and smart-fill, ensuring photonic components meet the designed intent through the manufacturing process.

Lumerical INTERCONNECT for Optical Circuit Simulation

Optical circuit simulation within the Pyxis platform design cockpit is performed by Lumerical's INTERCONNECT photonic integrated circuit design and simulation tool. Netlist import and export features added to INTERCONNECT as part of the integration project enable design capture, simulation set up and execution within the Pyxis platform cockpit. Time domain and frequency domain simulations are run using the INTERCONNECT simulators and results are delivered for analysis to the EzWave viewer. Key operating parameters of the photonic components for accurate simulation are defined in the PDK-driven design flow as INTERCONNECT compact models. The compact models can be derived from foundry specific or measured data, improving design accuracy and eliminating device revisions.

“The integration of INTERCONNECT with Pyxis delivers a seamless environment for scalable photonic integrated circuit design, simulation and analysis,” said Dr. James Pond, CTO of Lumerical Solutions. “Lumerical's photonic simulation software has provided designers and researchers with the tools for innovative component design for over 10 years. Through our partnership with Mentor, we can deliver a complete design ecosystem that is the foundation for growth in integrated photonics across a wide array of applications.”

PDK Development

Mentor and Lumerical have been developing Process Design Kits (PDKs) enabling a silicon photonics design flow with OpSIS and CMC / SiEPIC. Mentor and Lumerical are also collaborating with A*STAR Institute of Microelectronics (IME), a technology leader in silicon photonics, to develop next generation PDK for their well established and widely adopted technology platform.

“Over the last three years, we've adopted Mentor and Lumerical tools to develop PDK- driven silicon photonics methodologies for our programs,” said Professor Lukas Chrostowski, SiEPIC Program

CIMdata PLM Industry Summary

Director. “Lumerical provides excellent optical simulation tools, Mentor’s Calibre provides best in class verification and Mentor’s Pyxis provides the right framework for silicon photonics design. Our next workshop scheduled for October 24-28 includes a Pyxis PDK and fabrication with IME.”

At the ECOC Exhibition 2014, the largest European optical communications event, Mentor and Lumerical are conducting a [seminar](#) to demonstrate the new integration.

 [Click here to return to Contents](#)

MSC Software & e-Xstream Engineering Announce New Release of Digimat 5.1.1

18 September 2014

[MSC Software Corporation](#) and [e-Xstream engineering](#), an [MSC Software Company](#), and developer of [Digimat](#), the nonlinear multi-scale material and structure modeling platform, today announced the new release of [Digimat 5.1.1](#).

Understanding composite material behavior in product design is essential to product manufacturing industries that incorporate advanced materials into the design process for lightweighting and quality improvements. The Digimat 5.1.1 release addresses this issue by introducing new capabilities that help engineers, material suppliers, and material users reduce the cost and time to engineer innovative materials and products.

Highlights of this release include:

Material engineering

End-to-end FE analyses of Material RVE

[Digimat-FE](#) includes an FE meshing technology and solver enabling a complete tool for the end-to-end investigation of composites Representative Volume Element (RVE), based on finite element modeling. Generation of RVE has made tremendous gains in robustness & speed. Meshing (conforming & voxel), FE meshing, solution and post-processing have been integrated, and MSC Software's [Marc Nonlinear FEA](#) software was added to the external solver interfaces supported by Digimat. The robust, fast and easy analysis of (thermo) mechanical properties and thermal or electrical conductivity make RVE analyses accessible to non-FEA experts.

Woven Composites

Complete workflow to analyze 2D and 2.5D woven materials & structures

Included in this release is FE analyses of RVE, and advanced woven model support screening of properties of 2.5D woven and braided composites based on their microstructures. Linear elastic effective macroscopic responses can be used in weak coupling schemes for the purpose of structural design.

Strong coupling is supported via the basic woven capability. As a result of a strategic collaboration with LANXESS, nonlinear material models for TEPEX® are available on-demand via the Digimat eXchange platform. Draping information from PAM-FORM or via the Digimat open format can be mapped and used on the structural mesh. Combined with HYBRID solution technology, details of woven structures can be analyzed on the part and system level.

Chopped Fiber Composites

Accurate Analysis of Shell & 3D structures made easy with the new release of Digimat-RP

[Digimat-RP](#) was developed to support shell models in addition to the previously available 3D models.

Digmat-RP integrates all the power of Digmat material modeling tools in an easy-to-use interface and workflow for the effective and efficient analysis of reinforced plastic parts.

The parameters for the HYBRID solution can be generated on-the-fly using multiple CPUs. Material performances such as viscoelastic-viscoplasticity and the differentiation of tension and compression in failure are added to the HYBRID solution procedure. Unit system management has also been introduced.

 [Click here to return to Contents](#)

Nemetschek Vectorworks Releases Vectorworks 2015 Software

16 September 2014

Nemetschek Vectorworks, Inc., announces the new Vectorworks® 2015 version of its award-winning line of software products, including: Vectorworks Designer, Architect, Landmark, Spotlight, Fundamentals and Renderworks®. This marks the beginning of its worldwide rollout, which continues with the release of localized versions in nine additional languages in the fourth quarter of this year through the second quarter of 2015.

“With every new release, we concentrate on giving customers the enhancements and features they want, and, more importantly, what they need to make their visions come to reality faster, easier and with more precision than ever before,” said Dr. Biplab Sarkar, CTO, Nemetschek Vectorworks, Inc. “Vectorworks 2015 builds upon the functionality that is important to designers today, providing an experience that connects the dots between vision and realization in the most intuitive way possible.”

The Vectorworks 2015 software contains more than 100 updates and new features in the areas of architecture, BIM, urban planning and entertainment design. In previous versions, the power of 64-bit was only available in the platform’s photorealistic rendering engine, Renderworks, but has now been integrated throughout the entire Vectorworks 2015 product line, providing designers with the ability to handle larger projects, as well as better performance and stability. In addition, designers will observe a revolutionary graphical experience from advances made to the Vectorworks Graphics Module (VGM), which was introduced last year.

“We’re at a turning point where designers are discovering new ways to imagine and construct their projects,” said Sean Flaherty, CEO, Nemetschek Vectorworks, Inc. “Every day, designers choose Vectorworks because of our multidisciplinary approach and because they want a solution that supports their creative process instead of replacing it. We allow great design to materialize from inspiration, exploration and discovery.”

The English-language version of Vectorworks 2015 software is available to Vectorworks Service Select customers today by download. Shipping of the English-language version to all customers will begin September 23, 2014.

 [Click here to return to Contents](#)

QuadriSpace announces 2014 products with Solid Edge compatibility for 3D Publishing and Collaboration

16 September 2014

CIMdata PLM Industry Summary

Today, QuadriSpace™ announced the immediate availability of Pages3D™ 2014, Publisher3D™ 2014 and Document3D™ Suite 2014. (www.quadrispace.com/products/).

The updated products are now available in full 64-bit, empowering users with more robust support and performance when working with large 3D CAD files. In addition, this new release adds support for Solid Edge® 3D CAD files. Consistent with previous versions of the software, SolidWorks®, Autodesk® Inventor, Creo®, Pro/E®, Rhino®, SketchUp®, DWF™, STEP, IGES and other exchange formats are also supported.

QuadriSpace products and cloud services enable companies to rapidly:

- Author compelling technical documents for instructions, catalogs and training materials
- Publish highly informative technical illustrations and distributable content
- Optionally, distribute online content and collaborate using 3D in the cloud

Pages3D, the QuadriSpace flagship product for creating multiple page documents from 3D CAD files, uniquely enables users to create complete printed or interactive documents from 3D CAD files using patented technology. Pages3D software enables the use of 3D data for document authoring activities such as work instructions, illustrated parts catalogs and user manuals. For interactive deliverables, Pages3D documents can be securely published to 3D PDF or shared using Reader3D. Interactive documents use lightweight 3D making it impossible for recipients of QuadriSpace documents to gain access to the original 3D CAD file.

Publisher3D enables 3D models to be used to create step-by-step instructions, interactive part catalogs and customer-ready content. Creators also benefit from Publisher3D's support for additional information such as descriptive text, illustrated 3D views, step-by-step procedures, exploded views with balloons and custom parts lists. Publisher3D allows users to generate standard outputs such as images, movies, PDF documents and more. In addition, advanced 3D content can be published directly to Share3D™ cloud services for interactive viewing and collaboration.

Share3D is QuadriSpace's new cloud-based distribution and collaboration service with native apps for iPad, iPhone and PC users. With 3D-based content, not simply models, the use of 3D in the cloud extends beyond engineering to downstream uses in manufacturing, marketing, sales and field service. Share3D offers a free plan that allows users to collaborate on up to 3 projects. New accounts can be created for free at www.share3d.com/accounts/new.

 [Click here to return to Contents](#)

The Future of Making Things Just Got Easier With Autodesk Fusion 360 and the Mac App Store

18 September 2014

Today [Autodesk Fusion 360](#)—a cloud-based tool that combines 3D industrial and mechanical design, collaboration, and machining in a single package—became the first solution of its kind available for purchase worldwide on the Mac App Store.

“Autodesk has done a great job bringing the complete Fusion 360 toolkit to the Mac App Store,” said Ron Okamoto, Apple's vice president of Worldwide Developer Relations. “Fusion 360 combines design, collaboration and machining tools into a single package, and now it's available with the security and

CIMdata PLM Industry Summary

simplicity of the Mac App Store.”

“The fundamental methods of design and manufacturing are experiencing radical disruption,” said Robert “Buzz” Kross, senior vice president at Autodesk. “We started from scratch and co-created Fusion 360 with the product design community to reimagine 3D CAD and CAM. Our global community loves the Mac, and now they have a faster path to getting started with Fusion 360 on the Mac.”

In the market for just over a year, Fusion 360 is designed to meet the changing needs of product developers and entrepreneurs. With Fusion 360, designers and engineers can create products that have both form and function and prepare them for fabrication with one single tool. As a result, users can explore product ideas quickly and get a prototype far faster.

Fusion 360 also provides a single space for entire teams to collaborate on projects. Built-in and automated data management and sharing ensure all models, designs and information are automatically archived, versioned, managed and can be securely shared with stakeholders.

Additionally, the cloud-based nature of the solution means designers and engineers can access Fusion 360 anytime, anywhere*, whether in the office, or on the go. When used with the free** Autodesk A360 app, Fusion 360 designs and data can be accessed on mobile phones and tablets, so users can keep up with their projects when they’re away from their desktops.

 [Click here to return to Contents](#)

TraceParts Releases a New Free 3D Mobile Application to Bring More Flexibility and Freedom to Design Professionals

18 September 2014

TraceParts launches a brand new mobile application to further enhance the 3D content experience for Engineers and Design Professionals.

The application, available on both the Android and iOS platforms, is available to download for free. Supporting mobile phones and tablets, TraceParts Mobile can be used anywhere and anytime, during a commute or in a meeting.

Built from TraceParts long established online CAD library TracePartsOnline.net, the mobile application allows Engineers access to the same extensive database containing millions of technical data with 3D models that can be viewed live and moved around at a touch.

Once selected among hundreds of suppliers’ catalogs, models can be easily sent by email in any one of the many supported native or neutral CAD formats, so everything is ready back in the office for designers to start work, all from within the application.

“We’re always working to make Product Content available everywhere and our new mobile app is an exciting step closer to this goal,” commented Bertrand Cressent, Product Manager at TraceParts

The free TraceParts mobile application can be downloaded from the [Apple Store](#) or [Google Play Store](#) websites.

 [Click here to return to Contents](#)

VCollab Enhances CAE Results Comparison

12 September 2014

VCollab announced enhanced model compare capabilities in the latest release of the [VCollab product suite](#). These enhancements help engineers to easily find, study, document and present the differences in the CAE results as well as the differences in the geometries/meshes during design changes. The enhanced model compare capabilities now allow for comparison of CAE results from different models and comparison of geometry models from different sources.

Comparing CAE results from different design alternatives enables VCollab users to not only get information about the differences in the minimum and maximum values efficiently, but also to assess easily where these differences/hotspots occur. Models to be compared don't have to use the same underlying mesh nor do the shapes have to be the same. Other use of this functionality includes comparisons of different solvers or load cases for the same model.

VCollab model compare further allows for comparison of different model geometries including CAD-CAD model comparisons, CAD-CAE model comparisons, and CAE-CAE model comparisons. The deviations are then stored as fields on the source model in the comparison and can be displayed as contours or vectors or sectional views to understand the differences between any two models.

These enhancements significantly simplify the study of design changes, related CAE post processing as well as design & analysis communications.

Like most features of the VCollab viewers, the compare capabilities are also accessible thru APIs for easy integration into process and data management solutions enabling automatic creation of comparison models ensuring their availability for critical design decisions.

"Advancing 3D technologies to help our customers simplify work flows of their design and analysis studies is always our top priority," said Prasad Mandava, CEO of VCollab. "We are very excited to announce this extended capability to compare the impact of design changes which can provide new insights and significantly reduce the time to understand the consequences of design changes. Ultimately, this capability makes quality improvements for the products of our customers very efficient."

The capability is immediately available with the latest VCollab version and existing customers are requested to contact VCollab or your local VCollab partner to access the updated software.

 [Click here to return to Contents](#)

ZW3D 2014 SP Released with Enriched 3D Modeling and CNC Machining Advancements

15 September 2014

[ZW3D](#) today announced the availability of [ZW3D 2014 SP](#). This new version features more than 300 improvements in CAD and CAM modules, enabling users to design more flexibly and machine faster.

Upgrading 3D Modeling with Optimized Functionalities

Improvements of ZW3D 2014 SP cover every aspect of ZW3D's CAD functions, such as upgraded file translator to support data interoperability with JT files, new part family to accelerate design of parts variations, new "[Open in ZWCAD](#)" feature to leverage specialized DWG functions and more enhanced modeling tools to provide interactive design environment. These customer-driven optimizations of

CIMdata PLM Industry Summary

ZW3D CAD can help users to conceptualize their creative ideas efficiently into products with less project budget and faster time-to-market.

“ZW3D 2014 SP has much better drafting, so I end up importing concept models into ZW3D to detail,” commented Dave Dunkin, owner of Mossberg Ltd. “I love the sketch features in ZW3D.”

Strengthening CNC Machining with Enhanced Operations

The latest developments of ZW3D CAM focus on roughing tool path, optimizing cut order of sub-regions with around 20%~30% of no-cut travel time saved. With more improved CAM functions, such as automatic corner finishing, wave tool path for stone polishing and easier hole machining on 2D drawings etc., ZW3D 2014 SP can ensure machining reliability, prolong tool life and improve CNC efficiency.

“In my opinion, this version is another major step forward in increasing the usability and power of ZW3D and shows that the rate of improvement continues to accelerate,” added Dave.

 [Click here to return to Contents](#)