

PRELIMINARY AGENDA as of FEBRUARY 12, 2017



ADDITIVE MANUFACTURING USERS GROUP
29th Annual Additive Manufacturing Users Group
Education and Training Conference
March 19-23, 2017

Additive Manufacturing Users Group Educating and Advancing the Uses and Applications of AM Technology AMUG For Users, By Users

LEARN

In-depth education and training sessions by AM industry experts and OEM representatives.

NETWORK

AMUG network provides attendees access to users with 25+ years experience in the industry. Attendees network with AM-dedicated OEMs and vendors.

TRACKS INCLUDE:

- Aerospace, Space, Defense & Transportation
- Business
- Casting
- Education & Training (incl. software, materials, hands-on training)
- Scanning
- Stereolithography
- Laser Sintering
- Medical & Dental
- Metals

WHO SHOULD ATTEND

Those that have access to, use, or operate AM equipment

- > Operators
- > Engineers
- > Technicians
- > Designers
- > Managers
- > Educators

Register for AMUG 2017 Today!

2017 AMUG CONFERENCE

MARCH 19-23, 2017

HILTON CHICAGO

Chicago, Illinois

REGISTRATION INCLUDES

- > Conference (4 days)
- > AMUGexpo (2 nights)
- > Keynote Presentations
- > Innovators Showcase
- > General Sessions
- > Technical Sessions
- > Workshops
- > AMUG Awards Banquet
- > Technical Competition
- > Networking Lunches
- > All Meals and Beverages

All Inclusive Registration Fee

\$795 prior to 2/10/17

\$895 after 2/10/17

\$1195 after 3/11/17

Register at
www.am-ug.com

2017 AMUG DIAMOND SPONSORS



2017 AMUG PLATINUM SPONSORS

3D Platform
Arcam AB
Autodesk
BigRep GmbH
Computer Aided
Technology (CATI)
Concept Laser
EnvisionTEC

Formlabs
Materialise
PostProcess Technologies
Prodways
Rize Inc
Ultimaker
Union Tech, Inc.
XJet

2017 AMUG CONFERENCE EVENTS AND AGENDA AT A GLANCE



SUNDAY

MARCH 19

TOUR Impossible Objects, LLC 12:00pm - 2:30pm

Tour departs from: 8th Street North and South/Lobby Level

Register for tour with: Liz Wolf
email: lwolf@impossible-objects.com
ph: 847-400-9582 ext 5

Registration 12:00pm-5:00pm

If you arrive after registration hours you may still join the AMUGexpo Sunday night

Location: 8th Street North and South/Lobby Level

New Member Welcome 4:00pm-4:30pm

Location: Continental Ballroom/Lobby Level

AMUGexpo and Dinner 5:00pm-10:00pm

Location: Salon B, C, D/Lower Level

MONDAY

MARCH 20

Registration 7:00am-8:00am

Location: 8th Street North and South/Lobby Level

Breakfast 7:00am-8:00am

Location: Continental Ballroom A, B, C/Lobby Level

AMUG General Session and Keynote 8:00am-10:15am

Location: International Ballroom/Second Floor

Break 10:15am-10:30am

Location: Salon B, C, D/Lower Level

Registration 10:15am-12:00pm

Location: 8th Street North and South/Lobby Level

AMUGexpo and Sponsor Demo 10:15am-12:00pm

Location: Salon B, C, D/Lower Level

Networking Lunch 12:00pm-1:15pm

Location: International Ballroom/Second Floor

AMUG and Sponsor Session 1:30pm-5:30pm

Location: various locations

AMUGexpo and Dinner with Technical Competition 6:00pm-10:00pm

Location: Salon B, C, D/Lower Level

TUESDAY

MARCH 21

Registration 7:00am-8:00am

Location: 8th Street North and South/Lobby Level

Breakfast 7:00am-8:00am

Location: Continental Ballroom A, B, C/Lobby Level

AMUG General Session and Keynote 8:00am-10:00am

Location: International Ballroom/Second Floor

Break 10:00am-10:30am

Location: Continental Ballroom A, B, C/Lobby Level

AMUG and Sponsor Session 10:30am-12:00pm

Location: various locations

Networking Lunch 12:00pm-1:15pm

Location: International Ballroom/Second Floor

AMUG and Sponsor Session 1:30pm-4:00pm

Location: various locations

AMUG Dinner and Awards Banquet Board Buses 5:15pm-5:30pm

Buses leave promptly at 5:30pm from Hilton Chicago and Palmer House

6:30pm-10:00pm

Location: Secret location.
Dress comfortably, bring a jacket and closed toe shoes.

WEDNESDAY

MARCH 22

Breakfast 7:30am-8:30am

Location: Continental Ballroom A, B, C/Lobby Level

AMUG General Session and Innovators Showcase 8:30am-10:00am

Location: International Ballroom/Second Floor

Break 10:00am-10:30am

Location: Continental Ballroom A, B, C/Lobby Level

Keynote Q&A 10:30am-11:00am

Location: Continental Ballroom A, B, C/Lobby Level

AMUG Business Meeting 11:00am-12:00pm

Location: Continental Ballroom A, B, C/Lobby Level

Networking Lunch 12:00pm-1:15pm

Location: International Ballroom/Second Floor

AMUG and Sponsor Session 1:30pm-5:00pm

Location: various locations

Dinner in Chicago 6:00pm-10:00pm

Location: Grand Ballroom/Second Floor
Experience Chicago in the Grand Ballroom as we take your taste buds on a culinary tour of Chicago neighborhoods.

THURSDAY

MARCH 23

Breakfast 7:30am-8:30am

Location: Grand Ballroom/Second Floor

AMUG Feedback Session and Keynote 8:30am-10:00am

Location: International Ballroom/Second Floor

Break 10:00am-10:30am

Location: Continental Ballroom A, B, C/Lobby Level

AMUG and Sponsor Session 10:30am-12:00pm

Location: various locations

Networking Lunch 12:00pm-1:15pm

Location: Grand Ballroom/Second Floor

AMUG and Sponsor Session 1:30pm-5:00pm

Location: various locations

Family Dinner - Closing 6:00pm-10:00pm

Location: Grand Ballroom/Second Floor

AMUG family dinner is a new experience. Join us for a family dinner as we close the 2017 conference. Thank you to our AMUG members that contributed family recipes.

FRIDAY

MARCH 24

UL Certification Course 8:00am-12:00pm

Location: Williford A, B, C/Third Floor

For more information and registration, visit: www.am-ug.com

SHUTTLE SCHEDULE

AMUG Shuttle will be offered daily between the Hilton Chicago and Palmer House Hilton

SUNDAY

12:00pm - 12:00am

MONDAY-TUESDAY- WEDNESDAY-THURSDAY

6:00AM-10:00AM

4:00PM-12:00AM

Monday, March 20, 2017

8:00am-8:30am	AMUG OPENING ADDRESS STEVE DEAK, AMUG President							International Ballroom North & South/Second Floor
8:30am-9:30am	KEYNOTE ADDRESS TODD GRIMM, T.A. Grimm & Associates <i>Discovery: Technologies, Opportunities and Directions</i>							International Ballroom North & South/Second Floor
9:30am-10:00am	INSIGHTS AND HIGHLIGHTS AT AMUG LESLIE LANGNAU, Design World AND JAMES WOODCOCK, TCT Magazine Leslie and James will provide a quick look at the insights and highlights of the Diamond sponsors at AMUG							International Ballroom North & South/Second Floor
10:00am-10:15am	KEYNOTE ADDRESS JASON LOPES, LEGACY EFFECTS A keynote with a twist. Jason will begin his visual journey of his use of additive manufacturing for special effects on Monday; continue with video shorts on the following days, and then wrap up on Wednesday with a Q & A session							International Ballroom North & South/Second Floor
10:15am-10:30am	BREAK							Salon B, C, D/Lower Level
10:15am-12:00pm	REGISTRATION AND BADGE PICK-UP							8th Street North and South/Lobby Level
10:15am-12:00pm	AMUGEXPO AND SPONSOR DEMO							Salon B, C, D/Lower Level
12:00pm-1:15pm	Networking Lunch							International Ballroom North & South (Second Level)
	Continental A Lobby Level	Continental B Lobby Level	Continental C Lobby Level	Waldorf Third Floor	Astoria Third Floor	Lake Ontario Eighth Floor	Lake Michigan Eighth Floor	Lake Huron Eighth Floor
1:30pm-2:00pm	AEROSPACE/DEFENSE Metal Additive Manufacturing - FAA Status <i>Robert Grant Federal Aviation Administration (FAA)</i> (1 hr)	SCANNING Workshop Scanning Workshop Presentation and Hands-on An Introduction to Scanning <i>Giles Gaskell</i>	METALS Emerging Metal AM Technology Mini-Session MODERATOR: Bob Markley (3rd Dimension Industrial 3D Printing) TECHNOLOGIES: Vader Systems, Markforged and Voxel8 (1 hr)	EDUCATION & TRAINING Panel Discussion Identifying & Solving Process Inefficiencies in AM MODERATORS: Peter Zelinski Additive Manufacturing Magazine Andre Wegner Authentise (1 hr)	BUSINESS US Patents and Trademarks <i>Dr. Christal Sheppard United States Patent and Trademark Office</i> (1 hr)	MEDICAL & DENTAL Digital Scanning and 3D Printing: The Future is Now for Dentistry <i>Dr. Perry E. Jones Virginia Commonwealth University School of Dentistry</i> (1 hr)	MATERIALS Essential Performance Considerations in UV Curable AM Materials Selection <i>Dan Shaw Henkel</i>	EDUCATION & TRAINING Challenges and Opportunities for Polygon Modeling <i>Fenqiang Lin MachineWorks Ltd</i>
2:00pm-2:30pm		Ⓢ HANDS-ON SCANNING DEMOS FROM: Ansys, Creafom, GoMeasure3D, Wenzel America (1 hr)					MATERIALS Selection and Use of Adhesives and Sealants for Post Processing <i>Dan Shaw Henkel</i>	
2:30pm-3:00pm	BREAK							
3:00pm-3:30pm	AEROSPACE/DEFENSE Using Additive Manufacturing for Tooling Applications <i>Donald Godfrey Honeywell Aerospace</i>	SCANNING Workshop REPEAT Ⓢ HANDS-ON SCANNING DEMOS FROM: Ansys, Creafom, GoMeasure3D, Wenzel America (1 hr)	METALS The Battle Between Laser and Electron Beam Powder Bed Fusion Platforms <i>Adam Rivard LAI International</i>	EDUCATION & TRAINING 3D Printing Design Variables: Managing From Materials to Testing <i>Mike Vasquez 3Degrees</i> (1 hr)	BUSINESS REPEAT US Patents and Trademarks <i>Dr. Christal Sheppard United States Patent and Trademark Office</i> (1 hr)	MEDICAL & DENTAL Leveraging 3D Printing within Johnson & Johnson Supply Chain <i>Sudhir B. Patel, Peyton Hopson Johnson & Johnson</i>	MATERIALS Polyamide 11: The High-Performance Material of Choice for Laser Sintering Production Parts <i>Arnaud Lemaitre ARKEMA</i>	AM TECHNOLOGIES (NON-METAL) Panel Discussion Additive Manufacturing Support and Development with Legacy Systems Panel Discussion: SLA, SLS, and FDM (1 hr) MODERATOR: Andrew Allshorn (AT 3D-Squared) PANEL: Andrew Graves (Somos), Rory Jackson (RP Support Ltd), Mike Littrell (CIDEAS), Nate Schumacher (Midwest Prototyping), Jeremy Vos (RP Support America)
3:30pm-4:00pm	AUTOMOTIVE/TRANSPORTATION AM on the Road Towards Production Applications <i>Dominik Rietzel Martin Friedrich BMW Group</i>		METALS Pros and Cons of Hybrid Metal Additive Manufacturing <i>Scott Kraemer PTI Engineered Plastics</i>					
4:00pm-4:30pm	AEROSPACE/DEFENSE Achieving Robust AM Production <i>Younging Gao Aerujet Rocketdyne</i>		METALS Integration of 3D Printing/ Additive Manufacturing (AM) Into Production <i>Chad Sparts Methods 3D</i>	EDUCATION & TRAINING High Volume AM; Pros and Cons of Inkjet as an Enabling Technology <i>Neil Hopkinson Xaar</i>		MEDICAL & DENTAL How will 3D Printing Impact Healthcare in 2017? <i>Derek R. Mathers Worrell</i>	MATERIALS Control and Optimization of Metal Powder for Additive Manufacturing <i>Nate Kistler LPW Technology</i>	
4:30pm-5:00pm	AEROSPACE/DEFENSE Analysis of Additively Manufactured Metal Lattice Structures by Linear Finite Element Analysis <i>Christopher Box U.S. Air Force</i>	SCANNING Workshop REPEAT Ⓢ HANDS-ON SCANNING DEMOS FROM: Ansys, Creafom, GoMeasure3D, Wenzel America (1 hr)	METALS Roundtable Discussion OEM/Users Interface Panel on Metals MODERATOR: Bob Markley PANEL: 3D Systems, Arcam, Concept Laser, EOS, Renishaw, SLM Solutions, and more. (1 hr)	EDUCATION & TRAINING Workshop Topology Optimization for Additive Manufacturing: Opportunities and Challenges <i>Krishnan Suresh Praveen Yadav, PhD SciArt</i> (1 hr) PRE-REGISTER: Praveen Yadav at Praveenyadav@sciartsoft.com	BUSINESS Justification Strategy: Building the Right Strategy for Your Business <i>Mark Barfoot University of Waterloo</i> (1 hr)			CASTING Additive Manufacturing of Ceramic Casting Cores for Turbine Blades <i>Johannes Homa Lithoz</i>
5:00pm-5:30pm	AEROSPACE/DEFENSE Direct Metal Deposition of a G650 Engine Mount Fitting <i>Mark D. Moss Jonathan Beckman Gulfstream Aerospace</i>					EDUCATION & TRAINING Laser Sintering (LS) – Machines, Materials and Future Trends <i>Manfred Schmid Inspire AG icams</i>	MATERIALS Improved Sustainability and Mechanical Behavior of Filled LS-Material <i>Soeren Griessbach GS-PRO</i>	AM TECHNOLOGIES (NON-METALS)/CASTING Fused Filament Forming Applications for Foundry Processes Using Permanent and Expendable Patterns <i>Marshall Miller Flowserve Corporation</i>

Registration -- 8th Street North and South/Lobby Level

Open 7:00am-8:00am
Open 10:15am - 12:00pm

Breakfast -- Continental A, B, C/Lobby Level

Open 7:00am-8:00am

Lunch -- International Ballroom No & So/Second Floor

12:00pm - 1:15pm

AMUGexpo and Technical Competition/Lower Level

6:00pm - 10:00pm

Conference Key

- Ⓒ Customer Only Session
- Ⓓ Pre-Registration Required
- Ⓔ Hands-On Session

Course Level

- Beginner
- Intermediate
- ◆ Advanced

Monday, March 20, 2017
DIAMOND SESSIONS

4C (4th Floor) D8 (Lower Level)	4J (4th Floor) D11 (Lower Level)	4K (4th Floor) D2 (Lower Level)	4E (4th Floor) D7 (Lower Level)	4R (4th Floor) D3 (Lower Level)	4I (4th Floor) D10 (Lower Level)	4G (4th Floor) D5 (Lower Level)	4# (4th Floor) D1 (Lower Level)	4L (4th Floor) D6 (Lower Level)	4F (4th Floor) D9 (Lower Level)	4M (4th Floor) D4 (Lower Level)
<p>Room: 4C (4th Floor) Beyond Figure 4: The How and Why of Digital Molding <i>Scott Turner</i> 3D Systems</p> <p>Room: D8 (Lower Level) DEMO SUITE OPEN</p>	<p>Room: 4J (4th Floor) Reinforced PA6 Formulations for Powder Bed Fusion with Properties of Engineering Plastics <i>Claus Gabriel</i> BASF</p> <p>DEMO: D11 (Lower Level) DEMO AREA OPEN</p>	<p>Room: 4K (4th Floor) Carbon as a Solution for Manufacturing <i>Kirk Phelps</i> Carbon</p>	<p>Room: 4E (4th Floor) Factory of the Future: Industry 4.0 <i>Donnie Vanelli, EOS</i> <i>Hakan Pfeiffer, AM Ventures</i></p> <p>Room: D7 (Lower Level) DEMO SUITE OPEN</p>	<p>Room: 4R (4th Floor) Considerations for Binder Jetting <i>Gabe Doman</i> ExOne</p> <p>Room: D3 (Lower Level) Early Binder Jet S420SS Results with CT Analysis <i>Larry Bronisz</i> Los Alamos National Lab</p>	<p>Room: 4I (4th Floor) What's new at Concept Laser <i>TBA</i> Concept Laser</p>	<p>Room: 4G (4th Floor) A Look Under the Hood of the HP Jet Fusion 3D Printer <i>Josep Giralt</i> <i>Carmen Blasco</i> HP 3D Printing</p>	<p>Room: D1 (Lower Level) Renishaw AM systems overview <i>Robin Weston</i> Renishaw</p>	<p>Room: D6 (Lower Level) The Role of Additive Manufacturing in the Future of Transportation <i>Kevin Czinger</i> Divergent 3D</p>	<p>Room: 4F (4th Floor) Break out of the Traditional Mold - Speed up Production Using 3D Printing <i>Brigitte Jacobs</i> Somos®</p> <p>Room: 4F (4th Floor) Revolutionizing Investment Casting with 3D Printing <i>Kevin Zaras</i> Somos®</p>	<p>Room: 4M (4th Floor) Accelerate Adoption of 3D Printing for Sales Growth & Profitability <i>Phil Reeves</i> Stratasys</p> <p>Room: D4 (Lower Level) Smarter Prototyping with Stratasys New FDM Platform <i>Kathy Hanson</i> Stratasys</p>
2:30pm-3:00pm BREAK										
<p>Room: 4C (4th Floor) Better Metals: Improved Solutions from Software to Materials <i>Jonas Van Vaerenbergh</i> <i>Roy Sterenath</i> 3D Systems</p> <p>Room: D8 (Lower Level) DEMO SUITE OPEN</p>	<p>Room: 4J (4th Floor) Advanced Thermal Control and High Temperature Material Sintering <i>Xu Xiaoshu</i> <i>Don Xu</i> Farsoon Technologies</p> <p>DEMO: D11 (Lower Level) DEMO AREA OPEN</p>	<p>Room: 4K (4th Floor) Industrial Production Applications Using CLIP <i>Brittany Hancock</i> Caterpillar</p>	<p>Room: 4E (4th Floor) Transforming Your Business with High Temperature Additive Manufacturing <i>Stephanie Kochbeck</i> <i>Donnie Vanelli</i> EOS</p> <p>Room: D7 (Lower Level) DEMO SUITE OPEN</p>	<p>Room: D3 (Lower Level) Binder Jetting Complements Small Business <i>Ed Strange</i> <i>Wicked Grips</i> <i>Tom Pasterik</i> ExOne</p>	<p>Room: 4I (4th Floor) Share your Experience: Barriers to Additive Production Adoption <i>Laurence Vigeant-Langlois, PHD</i> GE Additive</p>	<p>Room: 4G (4th Floor) HP Materials Open Platform: Accelerating 3D Materials Innovation <i>Mariona Company</i> <i>Fabio Annunziata</i> HP 3D Printing</p>	<p>Room: D1 (Lower Level) Renishaw product software demos: QuantAM and ADEPT for industrial and medical build file and part preparation <i>Jon Forster</i> <i>Matt Parkes</i> Renishaw</p>	<p>Room: D6 (Lower Level) Metal AM in Production: The M is for Manufacturing <i>John Barnes</i> Arconic</p>	<p>Room: 4F (4th Floor) Get the Most out of Your Stereolithography Equipment <i>John Schaefer</i> Somos®</p> <p>Room: 4F (4th Floor) Finding the Right Material for Your Project <i>Clive Coady</i> Somos®</p>	<p>Room: 4M (4th Floor) When Does it Make Sense to Use 3D Printing vs. CNC? <i>Mark Bashor</i> Stratasys</p> <p>Room: D4 (Lower Level) Unlocking Software Potential with GrabCAD Print <i>Marc DiGregorio</i> GrabCAD</p>
<p>Room: 4C (4th Floor) Manufacturing Innovation with Chuck Hull <i>Chuck Hull</i> 3D Systems</p> <p>Room: D8 (Lower Level) DEMO SUITE OPEN</p>	<p>Room: 4J (4th Floor) How to Foster Open Business Models <i>Dirk Simon</i> BASF</p> <p>DEMO: D11 (Lower Level) DEMO AREA OPEN</p>	<p>Room: 4K (4th Floor) Moving from Prototyping into Production with CLIP <i>Mark Horner</i> <i>Greg Cebular</i> The Technology House</p>	<p>Room: 4E (4th Floor) US Air Force Additive Manufacturing Strategic Implementation Plan <i>Brian Stitt</i> University of Dayton Research Institute</p> <p>Room: D7 (Lower Level) DEMO SUITE OPEN</p>	<p>Room: D3 (Lower Level) Additive Manufacturing Applied to Sikorsky Products <i>Bill Harris</i> Sikorsky</p>	<p>Room: 4I (4th Floor) What's new at GE Businesses (Aviation, Healthcare, Transportation...) <i>Andy Martin</i> GE Aviation <i>Steve Abitz</i> GE Healthcare <i>Stephen Prichard</i> GE Transportation</p>	<p>Room: 4G (4th Floor) 3D Printing Cost and Business Implications Across Product Life Cycle in HP <i>Virginia Palacios</i> <i>Elena Laso</i> HP 3D Printing</p>	<p>Room: D1 (Lower Level) OPEN DEMO Demo room open to all for hardware and software demos</p>	<p>Room: D6 (Lower Level) The New Art of Data Preparation from CAD to Part: Accurate, User Friendly, Smart and Traceable <i>Hubert Kerschbaum</i> <i>Wolfgang Hoeller</i> SLM Solutions Software GmbH</p>	<p>Room: 4F (4th Floor) Parts That Stand the Test of Time - A look into Aging Properties of SLA Materials <i>Kevin Zaras</i> Somos®</p>	<p>Room: 4M (4th Floor) What's New with Stratasys Materials <i>Ken Burns</i> Stratasys</p> <p>Room: D4 (Lower Level) DEMO SUITE OPEN HOUSE</p>

Tuesday, March 21, 2017

8:00am-9:00am	AMUG GENERAL SESSION 2016 Technical Competition Winners and 2017 Scholarship Winners								International Ballroom North & South/Second Floor
9:00am-10:00am	KEYNOTE ADDRESS STACEY DELVECCHIO Caterpillar Leveraging Innovative Incubator to 'Think Big...start small...act Fast'								International Ballroom North & South/Second Floor
10:00am-10:30am	BREAK REGISTRATION OPEN								International Ballroom North & South/Second Floor
	Continental A Lobby Level	Continental B Lobby Level	Continental C Lobby Level	Waldorf Third Floor	Astoria Third Floor	Lake Ontario Eighth Floor	Lake Michigan Eighth Floor	Lake Huron Eighth Floor	Lake Erie Eighth Floor
10:30am-11:00am	Platinum Concept Laser How to Print on Large Format Powder Bed Metal AM Machines <i>Jonaaron Jones</i> <i>Volunteer Aerospace</i>	Platinum EnvisionTEC EnvisionTEC. Utilizing 3D Printing to Improve Traditional Manufacturing Processes	Platinum Rize Voxel-level Polymer Modification in Additive Manufacturing <i>Eugene Giller</i> <i>Rize</i>	Platinum XJet XJet presents: NanoParticle Jetting technology - Redefining Metal AM <i>Dror Danai</i> <i>XJet</i>	Platinum Union Tech A Fresh Design Dimension in SL Equipment <i>Jim Reitz</i> <i>UnionTech</i>	Platinum Ultimaker Professional Desktop Printers Hit the Enterprise for Prototyping, Tooling and Production <i>John Dulchinos</i> <i>Jabil, Inc.</i> <i>John Kawola</i> <i>Ultimaker</i>	Platinum AutoDesk Printing the Future: What's New in Additive Manufacturing from Autodesk <i>Ulf Lindhe</i> <i>Fabian Grupp</i> <i>Autodesk</i>	MEDICAL & DENTAL Validation of Medical Devices Using CT Scanning. <i>Steve Traynor</i> <i>QC Group</i> <i>Giles Gaskell</i> <i>Wenzel America Ltd</i>	CASTING Workshop ® Foundry in a Box <i>Steve Murray</i> <i>Hoosier Pattern</i> <i>Jack Ziemba</i> <i>Aristo Cast</i> Please arrive early Limit 50 sign up on-site (90 min)
11:00am-11:30am	BREAK								
11:30am-12:00pm	Platinum Arcam Navigating FDA Approval for Orthopedic Implants with Additive Manufacturing <i>Oscar Hedlin</i> <i>Arcam</i>	Platinum 3D Platform Printer's Dilemma: Balancing Speed, Quality and Cost <i>Jonathan Schroeder</i> <i>3D Platform</i>	Platinum CATI Leveraging 3D Technology in the Product Development Lifecycle PART 1: 3D Scanning <i>Derek Ellis</i> <i>Bob Renella</i> <i>CATI</i>	Platinum Materialise Taking Control of Your AM Machine <i>James Smith</i> <i>Materialise</i>	Platinum Formlabs What's Next for 3D Printing: Digital Manufacturing <i>David Lakatos</i> <i>Formlabs</i>	Platinum Prodways MOVINGLight® Technology now available to Small and Medium Sized Dental Labs with New LD-Series <i>Alban D'Haullin</i> <i>Prodways</i>	Platinum BigRep 10x Faster - Endless Serial 3D-Printing <i>Rene Gurka</i> <i>BigRep GmbH</i>	Platinum PostProcess Tech. 4 Steps to Understand Your Post Printing Costs and How Automation Can Significantly Reduce Them <i>Jeff Mize</i> <i>Ryan Hoag</i> <i>PostProcess Technologies</i>	
12:00pm-1:15pm	Networking Lunch International Ballroom North & South/Second Floor								
1:30pm-2:30pm	Diamond Renishaw Renishaw, Proven Manufacturing Revolutionaries: Bringing over 40 years of innovation to AM <i>Marc Saunders</i> <i>Stuart Jackson</i> <i>Dan Skulan</i> <i>Renishaw</i>	Diamond Carbon Stop Prototyping. Start Producing <i>Joseph DeSimon</i> <i>Carbon</i>	Diamond SLM Solutions Future Manufacturing Now with AM Powder Bed Metal Printing - the Past 15 years, Future Requirements and How to Define Real Needs Instead of Wishful Thinking <i>Henner Schöneborn</i> <i>SLM Solutions AG</i>	Diamond Stratasys Panel Session Additive Manufacturing in 2017 and Beyond - Where We are Now and Where We Need to Go MODERATOR: Todd Grimm PANEL: David Dreyer (SAP), Rich Garrity (Stratasys), Aaron Frankel (Siemens Digital Factory), and more	Diamond BASF Chemistry Enabled AM Offers Solutions for Current and Future Needs <i>Volker Hammes</i> <i>Guido Voit</i> <i>BASF</i>				
2:30pm-3:00pm						Room change: TBA			
3:00pm-4:00pm	Diamond EOS Your Transformation to AM Success <i>Greg Hayes</i> <i>EOS</i>	Diamond SOMOS Title TBA <i>Melissa Lutz</i>	Diamond HP Session TBA	Diamond GE GE Additive Business (additive solutions, machines, digital, and more) TBA GE	Diamond ExOne Binder Jetting the Right Technology for Manufacturing <i>Rich Lucas</i> <i>ExOne</i>	Diamond 3D Systems Manufacturing Innovation: Making 3D Production Real <i>Vyomesh Joshi (VJ)</i> <i>3D Systems</i>			
all sessions close									
5:15pm-5:30pm	Buses leave promptly at 5:45pm								
6:00pm-10:00pm	AMUG Dinner and Awards Banquet Must wear your AMUG Badge to board the bus. We suggest you wear closed-toe shoes and comfortable clothing. BUS LOCATION HILTON CHICAGO: 8th Street North and South Lobby Level (next to AMUG registration) BUS LOCATION PALMER HOUSE: Wabash Street entrance in the east side of the Palmer House hotel								

Registration -- 8th Street North and South/Lobby Level

Open 7:00am-8:00am
Open 10:15am - 12:00pm

Breakfast -- Continental A, B, C/Lobby Level

7:00am - 8:00am

Lunch -- International Ballroom No & So/Second Floor

12:00pm-1:15pm

2017 AMUG Dinner & Awards Banquet

Location is a surprise - must wear AMUG Badge

Buses leave at 5:15-5:30

Conference Key

- Ⓒ Customer Only Session
- Ⓓ Pre-Registration Required
- Ⓔ Hands-On Session

Course Level

- Beginner
- Intermediate
- ◆ Advanced

Tuesday, March 21, 2017
DIAMOND SESSIONS

3D SYSTEMS	BASF We create chemistry	Carbon	EOS e-Manufacturing Solutions	ExOne DIGITAL PART MANUFACTURING	GE	hp	RENISHAW apply innovation™	SLM SOLUTIONS	Somos®	stratasys
4C (4th Floor) D8 (Lower Level)	4J (4th Floor) D11 (Lower Level)	4K (4th Floor) D2 (Lower Level)	4E (4th Floor) D7 (Lower Level)	4R (4th Floor) D3 (Lower Level)	4I (4th Floor) D10 (Lower Level)	4G (4th Floor) D5 (Lower Level)	4# (4th Floor) D1 (Lower Level)	4L (4th Floor) D6 (Lower Level)	4F (4th Floor) D9 (Lower Level)	4M (4th Floor) D4 (Lower Level)
Room: 4C (4th Floor) Beyond Figure 4: The How and Why of Digital Molding Scott Turner 3D Systems Room: D8 (Lower Level) DEMO SUITE OPEN	Room: 4J (4th Floor) Design Contest - How to Use BASF Materials for Functional Parts Todd Grimm T.A. Grimm & Associates DEMO: D11 (Lower Level) DEMO AREA OPEN	Room: 4K (4th Floor) Exploring novel geometries and materials with CLIP Larry Manahan Becton, Dickinson and Company	Room: 4E (4th Floor) A High Performance Material for Aerospace Applications Scott Killian EOS Room: D7 (Lower Level) DEMO SUITE OPEN	D3 (Lower Level) Binder Jetting in Medical Applications Kuldeep Argarwal Minnesota State University	Room: 4I (4th Floor) EH&S BMP and Product Safety for Polymer Srinivas Durgam GE with Stratasys, SLS, UL, Green Chemistry, Autodesk	Room: 4G (4th Floor) Design for Manufacturing Enabling Production with HP Multi Jet Fusion Christian Eviston-Putsch HP 3D Printing Room: D5 (Lower Level) HP 3D Jet Fusion: Applications	Room: D1 (Lower Level) Architected Materials through AM Sarat Babu Betatype	Room: D6 (Lower Level) Experiences, Results and Lessons Learned Processing Multiple Materials for Tooling Applications Derek Marin Y-12 National Security Complex	Room: 4F (4th Floor) Are Your Thoughts on SLA Outdated? Learn How SLA Stacks up to SLS and FDM Tiffany Vincent Somos®	Room: 4M (4th Floor) How New Stratasys Technology Speeds Product Design Success Jesse Hahne Marc McCauley Center for Advanced Design
11:00am-11:30am BREAK										
Room: 4C (4th Floor) Better Metals: Improved Solutions from Software to Materials Jonas Van Vaerenbergh 3D System Room: D8 (Lower Level) DEMO SUITE OPEN	Room: 4J (4th Floor) Functionality by Advanced and Conductive Multilayer Filaments for ESD Kai Sudau BASF Travis Eubanks Essentium Materials DEMO: D11 (Lower Level) DEMO AREA OPEN	Room: 4K (4th Floor) Carbon Software Package Roy Goldman Carbon	Room: 4E (4th Floor) Accelerating the Adoption of 3D Printing in Manufacturing and Supply Chain David Dreyer SAP America Maximilian Eils EOS Room: D7 (Lower Level) DEMO SUITE OPEN	Room: 4R (4th Floor) Considerations for Binder Jetting Gabe Doman ExOne D3 (Lower Level) Process Parameter Development for Binder Jetting AM Green Part Printing: Thoughts and Tips Li Yang UoJL	Room: 4G (4th Floor) HP Jet Fusion 3D Printer - Digital Workflows and Job Creation Scott White HP 3D Printing Room: D5 (Lower Level) Accelerating Materials Innovation: HP Materials Development Kit (MDK) and Applications Lab Mike Reagan Mike Monroe HP 3D Printing	Room: D1 (Lower Level) Advantages behind using pulse laser powder bed AM for advanced materials Mathieu Brochu McGill University	Room: D6 (Lower Level) Metal Additive Manufacturing for Racing Applications Mimo Technik Jon Cohen	Room: 4F (4th Floor) What's the Best 3D Printing Technology for me? A Look at the Machines, Software and Material Combinations Andrew Graves Somos®	Room: 4M (4th Floor) Demonstration of FDM for Production Composite Tooling at Dassault Falcon Jet Jet Bastien Carel Gregory Hilbert Dassault Falcon Jet	
12:00pm-1:15pm Networking Lunch International Ballroom North & South/Second Floor										
ALL ROOMS CLOSED See AMUG Agenda for Diamond Sessions										
all sessions close										
Buses leave promptly at 5:45pm										
<p>AMUG Dinner and Awards Banquet Must wear your AMUG Badge to board the bus. We suggest you wear closed-toe shoes and comfortable clothing.</p> <p>BUS LOCATION HILTON CHICAGO: 8th Street North and South Lobby Level (next to AMUG registration)</p> <p>BUS LOCATION PALMER HOUSE: Wabash Street entrance in the east side of the Palmer House hotel</p>										

Wednesday, March 22, 2017

8:30am-9:00am	GLOBAL INSIGHTS ON AM GRAHAM TROMANS AND STAFAN RITT AMUG EU Ambassadors										International Ballroom North & South/Second Floor
9:00am-10:00am	INNOVATORS SHOWCASE WITH CARL DECKARD, INVENTOR OF SELECTIVE LASER SINTERING										International Ballroom North & South/Second Floor
10:00am-10:30am	BREAK										Continental A, B, C/Lobby Level
10:30am-11:00am	KEYNOTE Q&A: JASON LOPES Legacy Effects										Continental A, B, C/Lobby Level
11:00am-12:00pm	AMUG BUSINESS MEETING										Continental A, B, C/Lobby Level
12:00pm-1:15pm	NETWORKING LUNCH										International Ballroom North & South/Second Floor
	Continental A Lobby Level	Continental B Lobby Level	Continental C Lobby Level	Waldorf Third Floor	Astoria Third Floor	Marquette Room Third Floor	Joliet Room Third Floor	Lake Ontario Eighth Floor	Lake Michigan Eighth Floor	Lake Huron Eighth Floor	Lake Erie Eighth Floor
1:30pm-2:00pm	AUTOMOTIVE/TRANSPORTATION Development of Processing Parameters for DMLS - Insights and Guidance <i>Eric Johnson John Deere</i>	EDUCATION & TRAINING Workplace-Based AM Lab: Enhancing Technical Skillsets and Interdisciplinary Collaboration <i>Jonathan Hopkins NAVSEA Carderock Division</i>	METALS Metal AM Process & Facility Safety. Are you Prepared? <i>Paul Bates, Norm Lowe UL (1 hr)</i>	Platinum AutoDesk Temperature and Distortion Simulation for Laser Powder Bed Fusion <i>Erik Denlinger Autodesk</i>	Platinum Rize Tailored Additive Manufacturing for Challenging Environments <i>Frank Marangell Rize</i>	Platinum EnvisionTEC Title TBA <i>Adam Poots Adam Poots Games, 3D Printing Brings Gaming to Life</i>	Platinum Materialise Optimize your Metal Production with Dedicated Data Preparation, Inspection and Simulation <i>Gert Claes Materialise</i>	MEDICAL & DENTAL Metal Additive Manufacturing for Medical Applications <i>Alan Rattan Precision ADM</i>	MATERIALS Testing and Modeling Anisotropy of Additively Manufactured Polymers <i>Mark Oliver Veryst Engineering</i>	EDUCATION & TRAINING Software Training Designing in SOLIDWORKS for 3D Printing <i>Judy Marlo Mark Abshire Computer Aided Technology Inc. (90 min)</i>	CASTING Improving 3D Sand Mold Printing Processes Through Casting Process Optimization Software Tools <i>Christof Heisser MAGMA Foundry Technologies, Inc.</i>
2:00pm-2:30pm											
2:30pm-3:00pm	AEROSPACE/DEFENSE Qualification Strategies for Additive Manufacturing <i>Tyler Conrad Tyler Whetstone Honeywell Federal Manufacturing and Technology</i>	EDUCATION & TRAINING Advances in AM to Ease the Post Hype Dip <i>Kenneth Church nScript, Inc</i>	METALS Transitioning from Plastics Job Shop to Metals Production Shop <i>Phillip Conner Stratasys Direct Manufacturing</i>	Platinum Arcam Unlocking the Future Potential of EBM Technology <i>Isak Elfstrom Arcam</i>	Platinum BigRep Panel Printing with Pellet Extruders and High-Performance Materials <i>Rene Gurka BigRep GmbH Daniel Büning NOWlab@BigRep GmbH</i>	Platinum Union Tech Benchmarking the Capabilities of Stereolithography Equipment <i>Jeremy Vos RP Sales America, Inc.</i>	Platinum Ultimaker Professional Desktop Printers Hit the Enterprise for Prototyping, Tooling and Production <i>John Dulchinos Jabil, Inc. John Kawola Ultimaker</i>	MEDICAL & DENTAL Electron Beam Melting for Production of Orthopaedic Implants <i>Michele Pressacco LimaCorporate</i>	MATERIALS Impact of 3D Printing on Part Performance <i>Tom Fabian UL</i>	CASTING Investment Cast Patterns using Application-Specific SLA Resin <i>Dave Hochmeyer PERIDOT, Inc.</i>	
3:00pm-3:30pm	BREAK										
3:30pm-4:00pm	AEROSPACE/DEFENSE AM Applications at the Naval Surface Warfare Center - Philadelphia Division <i>Scott Storms Phil Greiner NSWCPD</i>	EDUCATION & TRAINING Workshop There was Shrinkage! Are you Compensating? <i>Andrew Graves Somos® (1 hr)</i>	METALS How to Win by Failing Fast in Metal AM <i>Bob Henderson Linear AMS</i>	Platinum Concept Laser CL WRX Parameter: Not Your Average Parameter Editor <i>Thomas Haymond Concept Laser</i> ® PRE-REGISTRER: kgeiger@conceptlaserinc.com	Platinum Formlabs What's Next for 3D Printing in Material Innovation <i>David Lakatos Formlabs</i>	Platinum CATI Leveraging 3D Technology in the Product Development Lifecycle - Part 2: 3D CAD to 3D Print <i>Derek Ellis Bob Renella CATI</i>	Platinum Prodways Industrial Plastic Laser Sintering Made Accessible with ProMaker P1000 <i>Luca Veneri Prodways</i>	MEDICAL & DENTAL Exploring the Technologies Transforming Orthopaedics <i>Lewis Mullen Stryker</i>	MATERIALS Title TBA Dupont Materials	EDUCATION & TRAINING Software Training Materialise Magics 21 Update Training <i>Evan Kirby Materialise (90 min)</i>	CASTING Case Study of Additive Pattern Manufacture For Foundry Use <i>David Weiss, Eck Industries, Inc.</i>
4:00pm-4:30pm											
4:30pm-5:00pm	AEROSPACE/DEFENSE A Combined Numerical-Experimental Technique to Evaluate Powder Thermal Properties in SLM <i>Kevin Chou University of Louisville</i>	EDUCATION & TRAINING Effective UV Curing <i>Paul Hojan Christie Digital Systems</i>	METALS Panel Discussion Closed Loop Systems for Metal Powder Bed Fusion <i>Shane Collins CalRAM</i> Distinguished panel to discuss the need for closed loop systems, process monitoring and feedback control for metal powder bed fusion systems. (1 hr)	Platinum XJet XJet presents: NanoParticle Jetting technology- Redefining Metal AM <i>Dror Danaï XJet</i>	Platinum 3D Platform Roadmap to Address 10x Print Time Reduction <i>Joe Binka 3D Platform</i>	EDUCATION & TRAINING Surface Texture Anatomy of AM Components: the Art of Surface Superfinishing <i>Agustin Diaz REM Surface Engineering Cesar Terrazas, Ph.D. The University of Texas at El Paso Richard Marino Addaero Manufacturing (45 min)</i>	Platinum PostProcess Tech. From PolyJet to FDM to Metals, Integrating Automated & Comprehensive Post-Printing Solutions <i>John Oney PostProcess Technologies</i>		AM TECHNOLOGIES (NON-METAL) Small Filigree, Perfectly Fitting Parts <i>Joerg Griessbach Peter Griessbach The SL PRO</i>	CASTING Beyond Prototyping: How the Use of Printed Patterns in Investment Casting will Change over the Next Decade <i>Tom Mueller Mueller Additive Manufacturing Solutions</i>	

Breakfast -- Continental A, B, C/Lobby Level
Open 7:30am-8:30am

Lunch -- International Ballroom No & So/Second Floor
12:00pm-1:15pm

Conference Key
 © Customer Only Session
 Ⓜ Pre-Registration Required
 Ⓜ Hands-On Session

Course Level
 ■ Beginner
 ● Intermediate
 ◆ Advanced

AMUG Business Meeting
For all AMUG conference attendees
11:00am - 12:00pm

Dinner in Chicago -- Grand Ballroom/Second Floor
Take your taste buds on a culinary tour of the Chicago neighborhoods
6:00pm-10:00pm

Wednesday, March 22, 2017
DIAMOND SESSIONS

3D SYSTEMS	BASF We create chemistry	Carbon	EOS e-Manufacturing Solutions	ExOne REAL TIME MANUFACTURING	GE	hp	RENISHAW apply innovation™	SLM SOLUTIONS	Somos®	stratasys
4C (4th Floor) D8 (Lower Level)	4J (4th Floor) D11 (Lower Level)	4K (4th Floor) D2 (Lower Level)	4E (4th Floor) D7 (Lower Level)	4R (4th Floor) D3 (Lower Level)	4I (4th Floor) D10 (Lower Level)	4G (4th Floor) D5 (Lower Level)	4# (4th Floor) D1 (Lower Level)	4L (4th Floor) D6 (Lower Level)	4F (4th Floor) D9 (Lower Level)	4M (4th Floor) D4 (Lower Level)
<p>Room: 4C (4th Floor) Beyond Figure 4: The How and Why of Digital Molding <i>Scott Turner</i> 3D Systems</p> <p>Room: D8 (Lower Level) DEMO SUITE OPEN</p>	<p>Room: 4J (4th Floor) BASF 3D-P Business Approach and Launch <i>Kara Noack</i> <i>Dirk Simon</i> BASF</p> <p>DEMO: D11 (Lower Level) DEMO AREA OPEN</p>	<p>Room: 4K (4th Floor) Transfer of Urethane casting to CLIP <i>Steve Grundwahl</i> <i>Nate Schumacher</i> Midwest Prototyping</p>	<p>Room: 4E (4th Floor) EOS Expands Polymer Portfolio <i>Rick Booth</i> EOS</p> <p>Room: D7 (Lower Level) DEMO SUITE OPEN</p>	<p>D3 (Lower Level) Washout Tooling Demo and Q/A Session <i>Jesse Blacher</i> ExOne</p>	<p>Room: 4I (4th Floor) EH&S BMP for Metals <i>Srinivas Durgam</i> GE Global Research, with SLM, Concept Laser, and others</p>	<p>Room: D5 (Lower Level) HP Jet Fusion 3D Processing Station-Material Preparation and Multi-Material Support <i>Xavier Alonso</i> <i>Ismael Chanclón</i> HP 3D Printing</p>	<p>Room: D1 (Lower Level) Renishaw Solutions Centers - N America and the Global Network <i>Dan Skulan</i> Renishaw</p>	<p>Room: D6 (Lower Level) © SLM Solutions Users Group CLOSED SESSION FOR SLM CUSTOMERS <i>Richard Grylls</i> SLM Solutions</p>	<p>Room: 4F (4th Floor) The Foundry of the Future - 3D Printing for Investment Casting <i>Kevin Zaras</i> Somos®</p>	<p>Room: 4M (4th Floor) AM at Caterpillar: Balancing In-House vs. External Sourcing <i>Eric Halla</i> Caterpillar</p> <p>Room: D4 (Lower Level) © Troubleshooting PolyJet: Machine Maintenance, Materials & Applications <i>Meghan Rock</i> Stratasys</p>
2:00pm-2:30pm										
<p>Room: 4C (4th Floor) In-House Productivity with MJP and CJP: Powerful Solutions to Advance Your Workflow <i>Derek Johnson</i>, 3D Systems</p> <p>Room: D8 (Lower Level) DEMO SUITE OPEN</p>	<p>Room: 4J (4th Floor) Collaboration Between Materials and Equipment Suppliers to Accelerate 3D-Printing Innovation <i>Fabio Annunziata</i> HP 3D Printing <i>Kara Noack</i> BASF</p> <p>DEMO: D11 (Lower Level) DEMO AREA OPEN</p>	<p>Room: 4K (4th Floor) CLIP Technology + Tailored Materials Enable Production of Customized Medical Devices <i>Elle Meyer</i> Carbon</p>	<p>Room: 4E (4th Floor) Process Monitoring: Helping Achieve Reliability and Repeatability <i>Jon Spragg</i> EOS</p> <p>Room: D7 (Lower Level) DEMO SUITE OPEN</p>	<p>D3 (Lower Level) Low Cost Additive Manufactured Washout Tooling <i>Jeremy Senne</i> San Diego Composites</p>	<p>Room: 4I (4th Floor) GE Additive Digital Thread <i>Jon Wood</i> GE Additive</p>	<p>Room: 4G (4th Floor) 3D Printing Legal Considerations for the Next Industrial Revolution <i>Jennifer Prioleau</i>, HP Inc</p> <p>Room: D5 (Lower Level) HP Jet Fusion 3D Processing Station – Fast Cooling and Unpacking <i>Xavier Alonso</i>, <i>Justin Roman</i> HP 3D Printing</p>	<p>Room: D1 (Lower Level) The Effect of Laser Power on Part Strength in 316L Stainless Steel <i>Brigitte Jacobs</i> Lehigh University</p>	<p>Room: D6 (Lower Level) © SLM Solutions Users Group CLOSED SESSION FOR SLM CUSTOMERS <i>Richard Grylls</i> SLM Solutions</p>	<p>Room: 4F (4th Floor) Increase the efficiency of your Rapid Tooling project using 3D Printing <i>Brigitte Jacobs</i> Somos®</p>	<p>Room: 4M (4th Floor) Laser Sintering & FDM: Complimentary Technologies <i>Jesse Marin</i> Stratasys Direct Manufacturing</p> <p>Room: D4 (Lower Level) © Hands-On: PolyJet Print Head Maintenance Registration required <i>Meghan Rock</i>, <i>Stratasys</i></p>
3:00pm-3:30pm BREAK										
<p>Room: 4C (4th Floor) 3DXpert: An All-in-One Solution for Metal Additive Manufacturing <i>Maoz Barkai</i> 3D Systems</p> <p>Room: D8 (Lower Level) DEMO SUITE OPEN</p>	<p>Room: 4J (4th Floor) Material Properties of FFF Printed Stainless Steel Tools <i>Kai Suda</i> BASF</p> <p>DEMO: D11 (Lower Level) DEMO AREA OPEN</p>	<p>Room: 4K (4th Floor) Multiple Parts for Low Volume Production <i>Sasha Seletsky</i> Carbon</p>	<p>Room: 4E (4th Floor) The Challenges of Design and Manufacturing for Space <i>Ivan Madera</i> Mor3D (1 hr)</p> <p>Room: D7 (Lower Level) DEMO SUITE OPEN</p>	<p>D3 (Lower Level) © ExOne Users Group CLOSED SESSION FOR EXONE CUSTOMERS</p>	<p>Room: 4I (4th Floor) GE Additive Digital Thread <i>Jon Wood</i> GE Additive</p>	<p>Room: 4G (4th Floor) HP Jet Fusion 3D Printer - Thermal Control for Optimal Mechanical Properties <i>Josep Giralt</i> HP 3D Printing</p> <p>Room: D5 (Lower Level) HP 3D Jet Fusion: Applications</p>	<p>Room: D1 (Lower Level) Investigating the Effects on Titanium Powder when Processing in an Oxygen-free Atmosphere <i>Marc Saunders</i> <i>Lucy Grainger</i> Renishaw</p>	<p>Room: D6 (Lower Level) © SLM Solutions Users Group CLOSED SESSION FOR SLM CUSTOMERS <i>Richard Grylls</i> SLM Solutions</p>	<p>Room: 4F (4th Floor) Townhall: What do you Need? Tell us in a townhall presentation about what you're looking for. <i>Jasper van Dielen-Blom</i> Somos®</p>	<p>Room: 4M (4th Floor) Laser Simulation-Driven Design and 3D Printing with SIMULA <i>Subham Sett</i>, <i>Dassault</i> (45 mins)</p> <p>Room: D4 (Lower Level) Considerations in Designing for FDM Jigs & Fixtures (15 mins) Followed by Hands-On Finishing Techniques for FDM Jigs & Fixtures (45 mins or more, goes over transition period) <i>Mark Bashor</i> Stratasys</p>
4:00pm-4:30pm										
<p>Room: 4C (4th Floor) Advancements in Aerospace: Taking Off with 3D Production <i>David Cullen</i> 3D Systems</p> <p>Room: D8 (Lower Level) DEMO SUITE OPEN</p>	<p>Room: 4J (4th Floor) Simulation of Metal Part Properties and Process Parameters for Advanced Functionalities <i>Sebastian Schillo</i> <i>Felix Volkmann</i> BASF</p> <p>DEMO: D11 (Lower Level) DEMO AREA OPEN</p>	<p>Room: 4K (4th Floor) Vision: Factory of the Future <i>Kirk Phelps</i> Carbon</p>	<p>Room: 4E (4th Floor) EOS Solutions for Metal: M 100, M 400, EOS M 400-4 <i>Tyson Gregory</i> <i>Jon Spragg</i> EOS (1 hr)</p> <p>Room: D7 (Lower Level) DEMO SUITE OPEN</p>	<p>D3 (Lower Level) © ExOne Users Group CLOSED SESSION FOR EXONE CUSTOMERS</p>	<p>Room: 4I (4th Floor) Additive Materials <i>Travis Sands</i> <i>Deb Whittis</i> GE Additive</p>	<p>Room: 4G (4th Floor) HP Multi Jet Fusion – Quality Assurance Procedures <i>Alexis Oriol</i> HP 3D Printing</p> <p>Room: D5 (Lower Level) HP 3D Jet Fusion: Applications</p>	<p>Room: D1 (Lower Level) Metal AM Value Proposition for the Medical Industry <i>Matt Parhes</i> Renishaw</p>	<p>Room: D6 (Lower Level) © SLM Solutions Users Group CLOSED SESSION FOR SLM CUSTOMERS <i>Richard Grylls</i> SLM Solutions</p>	<p>Room: 4F (4th Floor) Who says SLA is Just for Prototypes? See How SLA is Used in Direct Manufacturing <i>Holly Gregory</i> Somos®</p>	<p>Room: 4M (4th Floor) Study of Inconel 625 Powder Reuse and the Effect on Additive Tensile Properties (Advanced) <i>Andrew Carter</i> Stratasys Direct Manufacturing</p> <p>Room: D4 (Lower Level) continued session from 3:30pm</p>

ADDITIVE MANUFACTURING USERS GROUP FOR USERS, BY USERS

Thursday, March 23, 2017

8:30am-9:00am	AMUG FEEDBACK SESSION									International Ballroom North & South/Second Floor
9:00am-10:00am	KEYNOTE ADDRESS: DR. PETER LIACOURAS, PH. D. Walter Reed National Military Medical Center 3D Printing in Military Medicine: Transforming the Care of Our Servicemembers									International Ballroom North & South/Second Floor
10:00am-10:30am	BREAK									Grand Ballroom/Second Floor
	Continental A Lobby Level	Continental B Lobby Level	Continental C Lobby Level	Waldorf Third Floor	Marquette Room Third Floor	Joliet Room Third Floor	Lake Ontario Eighth Floor	Lake Michigan Eighth Floor	Lake Huron Eighth Floor	Lake Erie Eighth Floor
10:30am-11:00am	AEROSPACE/DEFENSE Aerospace Additive Manufacturing in the DOD Supply Chain, Challenges & Opportunities <i>Douglas Greenwood, PE</i> NAVAIR Fleet Readiness Center East <i>Kyle Hedrick, PE</i> DLA	EDUCATION & TRAINING Roundtable Discussion ASTM Standards Update and Discussion <i>Carl Dekker</i> MET-L-FLO	METALS Introduction to Design for Metal AM <i>Spencer Wright</i> nTopology	Platinum XJet XJet presents: NanoParticle Jetting technology- Redefining Metal AM <i>Dror Danai</i> XJet	Platinum 3D Platform Fused Filament Masters for Castings and Molds <i>Mark Huebner</i> 3D Platform	Platinum Formlabs How 3D Printing creates opportunities for Healthcare <i>David Lakatos</i> Formlabs	EDUCATION & TRAINING Workshop How Simulation Helps you Build Metal Parts Successfully. <i>Brent Stucher</i> 3DSIM <i>Tim Gornet</i> University of Louisville (90 min)	MATERIALS Panel Discussion Material Overview and Panel Discussion with OEMS MODERATOR: Richard Smeenk PANEL: TBA	AM TECHNOLOGIES (NON-METAL) Agile Quality Control Process for FDM Parts <i>Tim Yewchuk</i> 3D Print Western	CASTING Casting Optimization Through Additive Manufacturing <i>Steve Murray</i> Hoosier Pattern
11:00am-11:30am		EDUCATION & TRAINING Post Processing - The Untold Story Regarding Industrial Resin Based 3D Printing <i>Edward T. Graham</i> ProtoCAM (1 hr)								
11:30am-12:00pm	AEROSPACE/DEFENSE Beyond Earth - Using Additive Manufacturing to Take us to New Worlds <i>Mike Curtis-Rouse</i> Science and Technology Facilities Council		METALS How to Develop a Pedigreed Material Property and Process Parameter Data Set <i>Annie Wang</i> Senvol	Platinum CATI Leveraging 3D Technology in the Product Development Lifecycle - Part 3: 3D Printing Injection Molds <i>Derek Ellis, Bob Renella,</i> CATI	Platinum Prodways New Plastic Laser Sintering Materials for Innovative Applications <i>Luca Veneri</i> Prodways	Platinum Union Tech Innovating Business Model Concepts for Additive Manufacturing Growth <i>Jim Reitz</i> UnionTech			AM TECHNOLOGIES (NON-METAL) Additively Manufactured Plastic Injection Mold Inserts <i>Jeremy Pullin</i> Sartorius Stedim	CASTING Simulation Driven Castings: Bringing Manufacturing Feasibility Early in the Design Cycle <i>Ravi Kunju</i> Shaun Kroeger solidThinking
12:00pm-1:15pm	Networking Lunch Location: Grand Ballroom/Second Floor									
1:30pm-2:00pm	AEROSPACE/DEFENSE Production with Metal AM Learning the Hard Way <i>Richard J. Merlino</i> Addaero Manufacturing	EDUCATION & TRAINING Panel Discussion Post Processing (AM Metals and Nonmetals) MODERATOR: Jordan Weston (Milwaukee School of Engineering) PANEL: Steve Alviti (Bel-Air Finishing), Laurent Cataldo (MicroTek Finishing), Andrew Allshorn (AT 3D-SQUARED), Andrew Graves (Somos), Shannon Morgan (GoEngineer) Daniel Hutchinson (PostProcess Technologies)	METALS DED of Inconel 718 and the Impact of Powder Quality <i>Aaron LaLonde</i> BeAM Machines, Inc.	Platinum Concept Laser Quality Assurance: Is Data From In-situ Monitoring Similar to a CT Scan? <i>Pavlo Earle</i> Sintavia	Platinum AutoDesk Machine, Material, and Software Strategies for Additive Manufacturing <i>Duann Scott</i> Autodesk	Platinum BigRep Room Temperature Printing for Industrial Parts <i>Daniel Büning</i> NOWlab@BigRep GmbH	EDUCATION & TRAINING What Will be the Impact of Fast Build Photopolymer Printers on Secondary Processing (and visa versa)? <i>Sean Wise</i> Repliform	MATERIALS Enhanced Isotropy for FFF Printed Parts with Locally Induced Radio Frequency Welding <i>Blake Teipel, PhD</i> Essemtium Materials	EDUCATION & TRAINING Software Training Part Optimization and Additive Process Simulation with Autodesk Netfabb <i>Edgar Aguirre</i>	CASTING BAAM - Big Area Additive Manufacturing for Tooling and Patterns <i>Rick Neff</i> Cincinnati Incorporated
2:00pm-2:30pm										
2:30pm-3:00pm	AEROSPACE/DEFENSE Predictive Simulation to Accelerate the Adoption of Additive Manufacturing in Aerospace Applications <i>Chris Robinson</i> 3DSIM		METALS Michelin Success: Extended Performances of Tires Thanks to Metal AM <i>Maria Averyanova</i> Fives Michelin Additive Solutions (AddUp)	Platinum Arcam Important Considerations for Selecting Powder for Additive Manufacturing <i>Frédéric Marion</i> AP&C	Platinum Materialise Automate Your AM Workflow and Save Data Preparation Time <i>Dave Flynn</i> Materialise	Platinum EnvisionTEC The Future of Bioprinting Materials <i>Northwestern University</i> Shah Lab	AM TECHNOLOGIES (NON-METAL) Quality and Inspection or Research <i>James Lefteur</i> 3D Print Western	MATERIALS The Value Chain From Metal Powder Production Through Serial Part Prototyping and Manufacturing <i>Hoeganaes Corporation</i>	EDUCATION & TRAINING Software Training How to Predict the Structural Behavior of Selective Laser Sintered Parts with Multiscale Numerical Simulation? <i>Dustin Souza</i> MSC Software	CASTING Investment Casting The Original METAL Additive Manufacturing <i>Jack Ziemba</i> Aristo Cast
3:00pm-3:30pm	BREAK									
3:30pm-4:00pm	Automotive/Transportation Title TBA	BUSINESS Panel Discussion The Changing Landscape of Additive Manufacturing PANEL DISCUSSION: Women in AM and the Changing Landscape MODERATOR: Mark Barfoot PANELIST: TBA	METALS Optimizing, Testing and Fabricating a Low Pressure Bracket by Additive Manufacturing <i>Lowell Hedges</i> Sintavia	Platinum Rize 3D Printing: The Impact of Post-Processing <i>Frank Marangell</i> Rize	Platinum PostProcess Tech. Automation of Post-Processing Through Energy Optimization <i>Daniel Hutchinson</i> PostProcess Technologies	Platinum Ultimaker Professional Desktop Printers Hit the Enterprise for Prototyping, Tooling and Production <i>John Dulchinos</i> Jabil, Inc. <i>John Kawala</i> Ultimaker	AM TECHNOLOGIES (NON-METAL) The Opportunity with Direct Digital Manufacturing <i>Rich Stump</i> Fathom	MATERIALS Block Copolymers Assembly for 3D Printing <i>William Wolf</i> Arkema		CASTING 3D Printed Cored Patterns for Low Volume Production - Success Stories <i>Mike Hascher</i> Eagle Engineered Solutions Inc.
4:00pm-4:30pm										
4:30pm-5:00pm	Additive Manufacturing R&D at AFRL <i>Jennifer Chase Fielding, PhD</i> Airforce Research Laboratory		METALS Advancements in Metal Additive Manufacturing in Germany - Costs and Lead Times <i>Albert Klein</i> FIT AG					MATERIALS Big, Fast Low Cost Models Using PMMA <i>Aaron Howard</i> Voxeljet		CASTING 3D Printed Patterns for the Direct Casting of Monumental Sculpture <i>Rob Arps</i> Form 3D Foundry

Breakfast -- Continental A, B, C (Lobby Level)
Open 7:30am-8:30am

Lunch -- Grand Ballroom No & So/Second Floor
12:00pm-1:15pm

Conference Key

- Ⓒ Customer Only Session
- Ⓓ Pre-Registration Required
- Ⓔ Hands-On Session

Course Level

- Beginner
- Intermediate
- ◆ Advanced

Thursday, March 23, 2017
DIAMOND SESSIONS

Family Dinner/Closing Dinner -- Grand Ballroom/Second Floor
Enjoy family recipes at AMUG closing dinner
6:00pm-10:00pm

4C (4th Floor) D8 (Lower Level)	4J (4th Floor) D11 (Lower Level)	4K (4th Floor) D2 (Lower Level)	4E (4th Floor) D7 (Lower Level)	4R (4th Floor) D3 (Lower Level)	4I (4th Floor) D10 (Lower Level)	4G (4th Floor) D5 (Lower Level)	4# (4th Floor) D1 (Lower Level)	4L (4th Floor) D6 (Lower Level)	4F (4th Floor) D9 (Lower Level)	4M (4th Floor) D4 (Lower Level)
Room: 4C (4th Floor) Beyond Figure 4: The How and Why of Digital Molding Scott Turner 3D Systems Room: D8 (Lower Level) DEMO SUITE OPEN	Room: 4J (4th Floor) Development Process of 3D Laser Sintered PA6 Parts Accounting for Anisotropic Mechanical Properties Andreas Wüst BASF DEMO: D11 (Lower Level) DEMO AREA OPEN	Room: 4K (4th Floor) CLIP Accuracy Overview Stephanie Moran Carbon	Room: 4E (4th Floor) Open Editing of EOS Systems with Parameter Editor Jon Spragg EOS Room: D7 (Lower Level) DEMO SUITE OPEN	D3 (Lower Level) Prequalification of Printed Sand Mold Technology for HY Steel Castings in the US Navy Ken Sabo Concurrent Technologies Corporation	Room: 4I (4th Floor) GE Digital Thread Jon Wood GE Additive	Room: 4G (4th Floor) HP 3D Printing - Connected Printer Josep Giralt HP 3D Printing Room: D5 (Lower Level) Room Closed - Private Event	Room: D1 (Lower Level) Metallurgy of additively manufactured parts Lucy Grainger Renishaw	Room: D6 (Lower Level) Hands on with the SLM 280 2.0 Richard Grylls SLM Solutions NA	Room: 4F (4th Floor) Endless Possibilities of Somos® EvoLve 128	Room: 4M (4th Floor) Additive Manufacturing in an Aerospace Sand Foundry John Barnett CPP Minneapolis Room: D4 (Lower Level) @Hands-On Workshop: PolyJet Post Processing for Clear Parts Charles Evans Stratasys (1 hr)
11:00am-11:30am										
Room: 4C (4th Floor) Better Metals: Improved Solutions from Software to Materials Sandeep Rana 3D Systems Room: D8 (Lower Level) DEMO SUITE OPEN	Room: 4J (4th Floor) Enhanced FFF Isotropy with RF Welding - Highlight Prosthetics, Orthotics Blake Teipel Essentium Materials Kara Noack BASF DEMO: D11 (Lower Level) DEMO AREA OPEN	Room: 4K (4th Floor) Going in Depth with Carbon's Production Quality Jason Rolland Carbon	Room: 4E (4th Floor) Lattice Structures and Repeatable Quality Jon Spragg EOS Room: D7 (Lower Level) DEMO SUITE OPEN	D3 (Lower Level) An Economic Analysis of Powder Bed Technologies Philip Morton UTEP	Room: 4I (4th Floor) Using additive on the Advanced Turbo Prop Engine Josh Mook GE Additive	Room: 4G (4th Floor) Voxel-scale Materials Development using HP's Multi Jet Fusion 3D Printing technology James Stasiak HP 3D Printing Room: D5 (Lower Level) Room Closed - Private Event	Room: D1 (Lower Level) Strategies for materials parameter development Jon Forster Renishaw	Room: D6 (Lower Level) ⒸⒹ First Look at SLM Build Processor 3.0 Michael Hansen SLM Solutions NA Register at: usersgroup@slm-solutions.us	Room: 4F (4th Floor) Driving Material Performance in SLA Scott Nordlund Somos®	Room: 4M (4th Floor) Best Practices for File Prep on the Full-Color, Multi-Material Stratasys J750 Charles Evans Stratasys Room: D4 (Lower Level) Hands-On Workshop continued session
12:00pm-1:15pm Networking Lunch Location: Grand Ballroom/Second Floor										
Room: 4C (4th Floor) 3D Systems Healthcare: Support from Plan to Procedure Katie Weimer 3D Systems Room: D8 (Lower Level) DEMO SUITE OPEN	Room: 4J (4th Floor) Acrylic Parts from BASF Photopolymers Designed for Customer Needs Andreas Jentsch - BASF DEMO: D11 (Lower Level) DEMO AREA OPEN	Room: 4K (4th Floor) Designing for CLIP + Production Applications David Moore Carbon	Room: 4E (4th Floor) Reference Point Calibration on Your Build Plate and Beyond! Tyson Gregory EOS Room: D7 (Lower Level) DEMO SUITE OPEN	D3 (Lower Level) Binder Jet Manufacturing of Fully Dense Tungsten Heavy Metal Alloy Specimens for Medical and Military Applications Kyle Myers, RP+M Mike Stawowy, HC Starck	Room: 4I (4th Floor) What's new at Concept Laser TBA Concept Laser	Room: 4G (4th Floor) HP Multi Jet Fusion Voxel - Embedded Electronics Sterling Chaffins HP 3D Printing Room: D5 (Lower Level) HP 3D Jet Fusion: Applications	Room: D1 (Lower Level) Lattice structures for improved product performance Marc Saunders Renishaw	Room: D6 (Lower Level) How to work out if your parts are good - a metallurgical analysis of components Richard Grylls SLM Solutions NA Doug Hedges, Sintavia LLC	Room: 4F (4th Floor) What's new in Somos®?	Room: D4 (Lower Level) Ⓒ Troubleshooting FDM: Machine Maintenance, Materials and Applications Meghan Rock, Stratasys Room: 4M (4th Floor) Section 1: Basic Insight Software for New Operators (mini version) Mike Block, Stratasys
2:00pm-2:30pm										
Room: 4C (4th Floor) 3D Sprint: Driving Productivity and Performance in Plastics Scott Green 3D Systems Room: D8 (Lower Level) DEMO SUITE OPEN	Room: 4J (4th Floor) TPU in Additive Manufacturing: Challenges and Opportunities Leander Verbelen BASF DEMO: D11 (Lower Level) DEMO AREA OPEN	Room: 4K (4th Floor) Carbon Product Overview & Roadmap Kirk Phelps Carbon	Room: 4E (4th Floor) Industrial Coloring Solutions for AM Plastics Phillip Kramer DyeMansion (1 hr) Room: D7 (Lower Level) DEMO SUITE OPEN	D3 (Lower Level) Continued Research with ExOne at the NY State College of Ceramics at Alfred University David Crenshaw Alfred University	Room: 4I (4th Floor) DEMO SUITE OPEN	Room: 4G (4th Floor) HP Jet Fusion 3D Printer - Post Processing Methods Alei Oriol Mercedes Blanco HP 3D Printing Room: D5 (Lower Level) HP 3D Jet Fusion: Applications	Room: D1 (Lower Level) AM Facility Management Kevin Collier Renishaw	Room: D6 (Lower Level) Building with Reactive Materials Richard Grylls SLM Solutions NA	Room: 4F (4th Floor) The latest high impact materials - Somos® Taurus	Room: D4 (Lower Level) Begins at 2:00, Open House Room: 4M (4th Floor) Hands-On: Under the Hood on FDM 3D Printers Meghan Rock Stratasys
3:00pm-3:30pm BREAK										
Room: 4C (4th Floor) High Performance Plastics in SLS David Cullen 3D Systems Room: D8 (Lower Level) DEMO SUITE OPEN	Room: 4J (4th Floor) Discovering Polyamide 6 Applications Brian Bauman Varia3D DEMO: D11 (Lower Level) DEMO AREA OPEN	Room: 4K (4th Floor) Carbon Material Roadmap Jason Rolland Carbon	Room: D7 (Lower Level) DEMO SUITE OPEN	D3 (Lower Level) Considerations for Binder Jetting Gabe Doman ExOne	Room: 4I (4th Floor) DEMO SUITE OPEN	Room: 4G (4th Floor) Design and Process Optimization for Multi Jet Fusion David Tucker, David Woodcock HP 3D Printing Room: D5 (Lower Level) HP 3D Jet Fusion: Applications	Room: D1 (Lower Level) Using Metrology for Precision Finish Machining of AM Parts Marc Saunders Renishaw	Room: D6 (Lower Level) Metal Additive Manufacturing Machine Safety Steve Barwin SLM Solutions NA	Room: 4F (4th Floor) Can you Still Use SLA Parts After a year? A Look at Material Properties Performance Over Time Kevin Zaras Somos®	Room: 4M (4th Floor) ⒸSection 2: Insight Software, Complex Processing of Parts, Custom Groups and More (must already know/ use Insight, laptops will be provided) Mike Block Stratasys (1 hr)
4:00pm-4:30pm										
Room: 4C (4th Floor) Digital Casting for Tool-less Metal Parts Jeff Smith 3D Systems Room: D8 (Lower Level) DEMO SUITE OPEN	Room: 4J (4th Floor) HT Big Area Additive Manufacturing Tooling Vlastimil Kunc Oak Ridge National Laboratory DEMO: D11 (Lower Level) DEMO AREA OPEN	Room: 4K (4th Floor) Economics of CLIP Sasha Seletsky Carbon	Room: D7 (Lower Level) DEMO SUITE OPEN	D3 (Lower Level) DEMO SUITE OPEN	Room: 4I (4th Floor) DEMO SUITE OPEN	Room: 4G (4th Floor) HP Technical Services and Support: Maximizing uptime and productivity Sandra González HP 3D Printing Room: D5 (Lower Level) Room Closed - Private Event	Room: D1 (Lower Level) Additive is Not an Island Robin Weston Renishaw	Room: D6 (Lower Level) Hands on with the SLM 280 2.0 Richard Grylls SLM Solutions NA	Room: 4F (4th Floor) The Foundry of the Future - 3D Printing for Investment Casting Kevin Zaras, Somos®	Room: D4 (Lower Level) Laser Sintering Post-Processing Workshop (SPACE LIMITED TO 25, FIRST COME FIRST SERVED) Jesse Marin Stratasys Direct Manufacturing (90 min)