2022 AMUG Conference
April 3-7, 2022

Preliminary
Subject to change - February 16, 2022
Additions will continue to be made to the agenda.
Please check back frequently.
WELCOME TO 2022 AMUG CONFERENCE
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## Pre-Conference Activity

### Saturday, April 2, 2022

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<thead>
<tr>
<th>SUPPLEMENTARY CONFERENCE TRAINING AND CERTIFICATION</th>
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<tr>
<td><strong>ASTM</strong></td>
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<tr>
<td>ASTM Certificate Course (2 day course)</td>
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<tr>
<td>Establishing an Additive Manufacturing Facility for Critical Part Production</td>
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<td>8:00am-5:00pm</td>
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<td>More info on page 12</td>
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### Sunday, April 3, 2022

<table>
<thead>
<tr>
<th>SUPPLEMENTARY CONFERENCE TRAINING AND CERTIFICATION</th>
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<tr>
<td><strong>ASTM</strong></td>
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<tr>
<td>ASTM Certificate Course (continuation)</td>
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<tr>
<td>Establishing an Additive Manufacturing Facility for Critical Part Production</td>
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<tr>
<td>8:00am-3:00pm</td>
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<td>More info on page 12</td>
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**Tooling-U | SME**

Certified Additive Manufacturing – Fundamentals (CAM-F) Review Course & Exam
7:30am-3:00pm

**Off-Site Tours**

DMG MORI
More info to come soon

**AMUG Conference Activity Begins**

<table>
<thead>
<tr>
<th>REGISTRATION OPEN</th>
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<th>SPEAKER CENTER AND APP DESK OPEN</th>
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<td>10:00AM-8:00PM</td>
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<thead>
<tr>
<th>CONFERENCE PROGRAM</th>
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<tr>
<td>New Member Welcome</td>
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<td>3:00pm-4:00pm</td>
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<td>First-time conference attendees welcome and introduction to the AMUG Conference.</td>
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<tr>
<th>AMUGexpo and Networking Dinner</th>
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<tr>
<td>EXPO OPEN</td>
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<tr>
<td>4:00pm -10:00pm</td>
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<tr>
<td>Join us Sunday night for the AMUGexpo Opening. Enjoy a buffet dinner and beverages as you tour the AMUGexpo. ALL EXHIBITS OPEN</td>
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**AGENDA-AT-A-GLANCE**

### AMUG CONFERENCE

#### MONDAY, APRIL 4, 2022
- **REGISTRATION OPEN** 7:00am-8:00pm
- **SPEAKER CENTER AND APP DESK OPEN** 7:00am-4:30pm
- **BREAKFAST** 7:00am-8:00am
- **CONFERENCE PROGRAM** Insights and Highlights
  - AMUG Welcome Insights
  - 2022 Scholarship Winners Insights
  - Insights and Highlights: what you need to know with Todd Grimm

#### TUESDAY, APRIL 5, 2022
- **REGISTRATION OPEN** 7:00am-5:00pm
- **SPEAKER CENTER AND APP DESK OPEN** 7:00am-4:00pm
- **BREAKFAST** 7:30am-8:30am
- **CONFERENCE PROGRAM**
  - 2021 Technical Competition Winners
  - The 2021 AMUG Technical Competition Winners will provide a presentation on their winning applications
  - INNOVATORS SHOWCASE
  - Andy Christensen

#### WEDNESDAY, APRIL 6, 2022
- **REGISTRATION OPEN** 7:00am-6:00pm
- **SPEAKER CENTER AND APP DESK OPEN** 7:00am-6:00pm
- **BREAKFAST** 7:30am-8:30am
- **CONFERENCE PROGRAM**
  - 2021 Technical Competition Winners
  - The 2021 AMUG Technical Competition Winners will provide a presentation on their winning applications
  - INNOVATORS SHOWCASE
  - Andy Christensen

#### THURSDAY, APRIL 7, 2022
- **REGISTRATION OPEN** 7:00am-11:00am
- **SPEAKER CENTER AND APP DESK OPEN** 7:00am-10:00am
- **BREAKFAST** 7:30am-8:30am
- **CONFERENCE PROGRAM**
  - AMUG Board of Directors Panel Session
  - Ellen Lee, Ford Motor Company

**Don’t Miss!**
- **AMUG Technical Competition**
  - Monday at the AMUGexpo
  - 6:00pm - 10:00pm
  - **EXPO OPEN with Technical Competition**
  - 6:00pm - 10:00pm
  - **BREAKFAST** 7:30am-8:30am
  - **CONFERENCE PROGRAM**
  - AMUG Business Meeting
  - Open to all full-conference pass attendees.
  - **AMUG Off-Site Dinner**
  - 6:30pm - 10:00pm
  - An event for all full-conference pass attendees.
  - Transportation provided. Additional dinner tickets are available for purchase.

**CONFERENCE CONCLUDES**
KEYNOTE SPEAKERS

Kevin Czinger, Divergent 3D
Tuesday, April 5 at 9:00am, International Ballroom

Kevin will take the stage on Tuesday, April 5, to share how he founded Divergent 3D in 2013 to rethink how vehicles are produced at scale, using a clean slate, system-level approach to digital manufacturing. This approach has already been successfully demonstrated by Divergent’s captive product company, Czinger Vehicles, and Divergent 3D is partnering with several major, unnamed automotive OEMs to break the barriers of serial production using additive manufacturing at scale.

At the core of Divergent 3D’s solution and a central point for the keynote presentation is DAPS™ (Divergent Adaptive Production System). DAPS is a system-level solution that delivers multi-objective, optimized designs; purpose-designed materials; tool-less additive manufacturing, and automated, fixture-less assembly. Kevin founded Divergent 3D in 2013 and serves as its CEO. He is also a member of SLM Solutions Group’s supervisory board.

Ellen Lee, Ford Motor Company
Thursday, April 7 at 9:00am, International Ballroom

On Thursday, April 7, Ellen will present “Automotive Manufacturing to Additive Manufacturing: From History to the Future of Mobility.” She will share how key events and needs in the history of mobility have influenced the development and advancement of the modern manufacturing industry, such as the moving assembly line, development of new materials, and creation of new technologies. Building on that insight, she will discuss the continued drive for innovation in new aspects, such as mass customization, decentralized supply chains, and digital manufacturing—and additive manufacturing will play a critical role in meeting those needs.

Ellen’s entire professional career, spanning 23 years, has been at Ford Motor Company. For the past six years, she has served in her current role as technical leader for additive manufacturing research. In that capacity, she has become well-known and well respected in the additive manufacturing industry.
ANDY CHRISTENSEN has spent his entire career focused on developing and expanding the medical applications of 3D Printing and Additive Manufacturing. As an undergraduate, Andy studied business at the University of Colorado at Denver. His first introduction to the stereolithography process was circa 1993 and subsequently he attended his first NASUG (North American Stereolithography User’s Group) in 1996. From 2000 to 2014 he was the Founder and President of Medical Modeling Inc., a world-leading, medical device-focused 3D Printing service bureau based in Golden, Colorado. Medical Modeling worked closely with surgeons and medical device manufacturers to create entirely new toolsets in the areas of patient-specific anatomic modeling, virtual surgical planning, personalized surgical guides/implants and applying metal 3D printing to orthopedic implant applications. Andy and his team contributed to the care of tens of thousands of patients, a number of medical and regulatory “firsts” and numerous high-profile cases including more than two dozen sets of conjoined twins.

Medical Modeling, working as a contract manufacturer, produced the very first FDA-cleared titanium implants in both the orthopedic and spine spaces. In addition to the commercial applications Andy has always had interest in the science and has published numerous papers and several book chapters. In 2014 Medical Modeling was acquired by 3D Systems and contributed to the creation of a new business vertical for 3D Systems in the Healthcare sector. Andy left 3D Systems in 2015 to pursue other interests, not the least of which was spending more time with his family.

Today Andy plays a role in a few 3D printing endeavors. He currently serves as Chair of the Radiological Society of North America (RSNA) 3D Printing Special Interest Group. He is an Associate Editor for the journal “3D Printing in Medicine,” published by BMC as well as an Adjunct Professor in the Department of Radiology at the University of Cincinnati. Andy is an active investor and serves as a board member and/or advisor for a few enterprises, not surprisingly most of which are healthcare related. Andy has a varied set of interests, but in the 3D printing arena his current interests are in tackling some of the bigger issues affecting the industry, including providing support to hospitals as they work to establish their own 3D printing labs and gaining insurance reimbursement for 3D printing-enabled technologies as applied to individual patients.

Andy Christensen
Founder and past president, Medical Modeling Inc.
Adjunct professor, Department of Radiology, University of Cincinnati

Innovator Showcase
Wednesday, April 6 at 9:00am
International Ballroom, 2nd Floor
AMUG CONFERENCE

AMUG Conference begins Sunday, April 3 at 4:00pm and concludes Thursday, April 7 at 10:00pm. See Agenda at a Glance pages 4-5.

REGISTRATION AND BADGE PICKUP / REGISTRATION HOURS

Sunday, April 3: 10:00am - 8:00pm
Monday, April 4: 7:00am - 8:00pm
Tuesday, April 5: 7:00am - 5:00pm
Wednesday, April 6: 7:00am - 6:00pm
Thursday, April 7: 7:00am - 11:00am

All pre-conference Training and Certification Courses require additional registration and fee. See page 20.

AMUGEXPO HOURS

AMUGEXPO AND DINNER
Sunday, April 3: 4:00pm -10:00pm

AMUGEXPO
Monday, April 4: 10:00am - 2:30pm
AMUGEXPO, TECHNICAL COMPETITION, AND DINNER
Monday, April 4: 6:00pm - 10:00pm

Diamond and Platinum booths are open all week - see daily schedule for times. AMUGexpo is part of the AMUG Conference. Separate tickets or attendance for the AMUGexpo are not available. AMUGexpo is open to all registered conference attendees and registered AMUGexpo booth staff.

DINING

Your AMUG Conference attendee pass includes all meals from Sunday evening through Thursday evening.

OFF-SITE EVENT AND DINNER

Conference attendees have full access to all conference activities including the AMUG Tuesday-night Off-Site Event and Dinner (surprise location!). Conference attendees have the option of bringing a guest for an additional fee, which can be purchased at the registration desk.

Off-Site Event and Dinner: Tuesday, April 5
Board Buses: 5:00pm
Buses Leave: 5:30pm
Return to hotel: TBA

You must wear your conference badge to board the bus. We suggest you wear closed-toe shoes and comfortable clothing appropriate for indoor and outdoor activities.

IMPORTANT! BOARD OF DIRECTORS ELECTION

Attention all AMUG Members! The AMUG Board of Directors election will take place via the AMUG mobile app or in-person ballot. All paid conference attendees are eligible to vote. Voting will take place Sunday, April 3 at 4:00pm to Monday, April 4 at 11:59pm.

All AMUG Conference attendees are considered AMUG Members, even first-time attendees.

BUSINESS MEETING

The AMUG Business Meeting will take place Wednesday, April 6 at 11:00am. The Business Meeting is for AMUG Conference attendees only. The Board of Directors for 2022-2023/2024 will be announced at the meeting. Please make sure to attend!

WIFI

Wi-Fi is available for free throughout the entire hotel and in your room.

NAME BADGES

Wear your AMUG badge at all times during the conference, as it is required for entry to all sessions and evening activities. Badges are mandatory for the Tuesday night event. Badges are issued to the registered individual and may not be used by others. A valid ID is required to obtain your AMUG badge.

RECYCLING

This year due to health and safety regulations, AMUG will no longer recycle the badge holders.

SAFETY AND SECURITY

Please do not leave your belongings or conference materials unattended in session rooms or in the general area of the hotel. Should you have any issues during your stay, please contact Tom Sorovetz, mobile: +1 (734) 320-6310, or visit the AMUG Office on the Lobby Level near the AMUG Registration desk.

EVENT CONDUCT AND SAFETY

AMUG is committed to providing a safe, productive, and welcoming environment to all participants, including staff and vendors. AMUG has no tolerance for discrimination, harassment, or bullying in any form at AMUG-related events and activities. Participants are expected to adhere to these principles and respect the rights of others.

What to do if you witness or are subject to unacceptable behavior: Participants should report any behavior inconsistent with these principles to one of the following onsite personnel: Thomas Sorovetz, AMUG Event Manager; Elizabeth Goode, AMUG Principal Consultant or any AMUG Board of Director member. The AMUG Event Manager is the primary coordinator to help participants contact venue security or local law enforcement, provide safety escorts, or otherwise assist those experiencing harassment to feel safe for the duration of the event. We value your attendance.

You may also contact AMUG directly to report a concern at admin@amug.com.
FOR USERS. BY USERS.                    9

STEP 1. DOWNLOAD THE EVENTSCRIBE APP

Search for “eventScribe” in the Apple App Store or Google Play Store.

INSTALL and OPEN the app then search for 2022 AMUG Conference, SELECT the event:

“AMUG 2022”

CLICK the icon to launch your app.

STEP 2. LOGIN TO THE AMUG CONFERENCE EVENT APP

To start using the event app, select “Login” and enter your:

Username (email address you registered with for the conference) and
Registration ID (this is the registration identification you received when you registered)

Don’t worry, this information will be provided on the back of your badge

TAKE NOTES ON PRESENTATION SLIDES

Presentations supplied by the speaker will be available the day of the presentation. Note, some slides or presentations may differ from what is shown in the presentation room.

Find the presentation you need and interact with the presentation by drawing on slides or highlighting text. Use the note-taking mode to type your notes next to each slide. Access your notes and print them out by clicking the “My Notes” on the home screen or “Online Personal Summary” in the hamburger menu (       ).

No mobile device? No Problem. As long as you have an internet connection, you can take notes on presentations through your laptop via this link: https://tinyurl.com/amug2022

AMUG MOBILE APP

AMUG full-conference attendees receive access to all contents within the app including all course materials, presentations, recording and evaluations. The Conference Proceedings will be accessible via the mobile app and AMUG website.

Exhibitors and Expo Staff receive access to non-course materials (AMUGexpo Floor plan and information, no presentation/slide access).

EVALUATIONS

Speaker and Conference evaluations are accessible through the mobile app or through the online planner.

MEMBERS CHOICE

NEW! For the first time, we are asking AMUG members to vote on the Technical Competition. Voting will be open from Monday, April 4 at 6:00pm until Tuesday, April 5 at 4:00pm. Members Choice winner will be announced Wednesday, April 6 at the AMUG Business Meeting.

BOARD ELECTIONS

2022 will begin the new process for AMUG Board of Directors elections.

All paid Conference Attendees are requested to vote for their Board of Director candidate of choice. In the mobile app and online planner you are able to review the candidate profiles and introductory video.

AMUG Board of Directors Voting will take place starting Sunday, April 3 at 12:00am until Monday, April 4 until 11:59pm.  Cast your vote!
SCHOLARSHIP

FOR ADDITIVE MANUFACTURING & 3D PRINTING EDUCATION and PROFESSIONAL DEVELOPMENT AT THE AMUG CONFERENCE

In the honor and memory of two long-time and avid supporters of AMUG, two scholarships have been established. The Guy E. Bourdeau Scholarship – for Students was established in 2014 by Guy’s wife, Renee Bourdeau. The Randy Stevens Scholarship – for Teachers/Professors was established in 2014 by Randy’s employer, InTech Industries.

GUY E BOURDEAU SCHOLARSHIP RECIPIENTS
2015 - Kaiyi Jiang, The University of Texas at Austin
2016 - Dr. Yaser Shanjani, Stanford University School of Medicine
2017 - Claire Belson, University of Alabama
2018 - Daniel Delgado Camacho, The University of Texas at Austin
2019 - Victoria Sears, University of Michigan
2020 - Kate Schneidau, University of Louisville
2021 - Sean Dobson, University of Cincinnati

RANDY STEVENS SCHOLARSHIP RECIPIENTS
2015 - Lydia Nelson, Whitman-Hanson Regional High School
2016 - Dr. Nathan Patterson, Milwaukee School of Engineering
2017 - Claire Belson, University of Alabama
2018 - Daniel Delgado Camacho, The University of Texas at Austin
2019 - Victoria Sears, University of Michigan
2020 - Kate Schneidau, University of Louisville
2021 - Sean Dobson, University of Cincinnati

GUY E BOURDEAU SCHOLARSHIP
The Guy E. Bourdeau Scholarship provides the opportunity for highly motivated students to earn the opportunity to attend the Additive Manufacturing Users Group (AMUG) conference. Guy E. Bourdeau Scholars are honest, respectful, inquisitive and collaborative.

The scholarship honors the memory of Guy E. Bourdeau for his dedication and contribution to the additive manufacturing industry. He was a strong supporter and advocate of the Additive Manufacturing Users Group (AMUG). The scholarship was founded in Guy’s name by his wife, Renée Bourdeau, to honor his contributions to the additive manufacturing (AM) industry.

2022 Financial Supporter for Guy Bourdeau Scholarship

RANDY STEVENS SCHOLARSHIP
The Randy Stevens Scholarship provides the opportunity for a highly motivated high school teacher, college or university professor in additive manufacturing (AM) to earn the opportunity to attend the Additive Manufacturing Users Group (AMUG) Conference. Randy Stevens Scholars are honest, respectful, inquisitive and collaborative.

The Randy Stevens Scholarship honors the memory of Randy Stevens for his dedication and contribution to the additive manufacturing industry. He was a strong supporter and advocate of the Additive Manufacturing Users Group. The scholarship was founded in Randy’s name by his employer, InTech Industries, Inc., to honor his contributions to the additive manufacturing industry.

2022 Financial Supporter for Randy Stevens Scholarship

Don’t Miss the 2022 Scholarship Winners will be announced the week of February 15th
Monday Scholarship Winners 9:30am-10:00am
International Ballroom, 2nd Floor
The AMUG Technical Competition provides a forum for users of additive manufacturing technologies to display their unique applications as well as their finishing capabilities.

ADVANCED CONCEPTS
The Advanced Concepts category aims to recognize individuals and their companies for exemplary work with additive manufacturing technologies. Entries in this category will "push the envelope" for a particular technology or a combination of technologies. Unique applications, processes, and/or utilization are desired in this category.

ADVANCED FINISHING
The Advanced Finishing category has been created to recognize the efforts of those whom we often overlook when evaluating a model. The designers and engineers may hatch a concept, but it is often the parts finishers, model makers, painters and others that bring a prototype to life.

Monday, April 4
2022 AMUG Technical Competition at the AMUGexpo
6:00pm-10:00pm
Visit the Technical Competition in Salon C during the AMUGexpo. Entries in both Advanced Concepts and Advanced Finishing will be on display. During the night, DINO judges will evaluate the entries and select a winner in each category. The winners will be announced Wednesday, April 6 at 10:30am.

NEW! Members will have the opportunity to participate in the Technical Competition by voting on a Members Choice Award. See details under Tuesday.

Tuesday, April 5
Members Choice Award Technical Competition entries on display in the Grand Ballroom Foyer from 7:00am - 4:00pm
Members Choice voting of the Technical Competition concludes at 4:00pm

NEW! AMUG is launching the Members Choice for the AMUG Technical Competition. While DINOs will judge the entries based on criteria for Advanced Concepts and Advanced Finishing, we are inviting the AMUG members to vote on a "Members Choice" and the winner will be announced Wednesday, April 6 after the AMUG Business Meeting at 11:45am.

Voting details will be provided Monday, April 4 during the morning General Session and on the AMUG Mobile App.

Wednesday, April 6
Technical Competition
2021 Winners presentation at 8:30am
Presentations for the 2021 Technical Competition winning entries will take place Wednesday, April 6 at 8:30am in the International Ballroom.

2022 Winners announced at 10:30am
2022 Technical Competition Winners announced Wednesday, April 6 at 10:30am in the International Ballroom.

Members Choice Technical Competition winner announced at 11:45am after the AMUG Business Meeting.
The programs listed below are available only to AMUG Conference attendees and are NOT included with AMUG Conference registration. Participation requires separate registration and is at an additional cost.

### ASTM CERTIFICATE COURSE

**Establishing an Additive Manufacturing Facility for Critical Part Production**

- **Cost:** $649 (early bird - ends on March 2)/$799
- **Register:** [https://na.eventscloud.com/amfacility](https://na.eventscloud.com/amfacility)
- **Maximum class size:** 50
- **Course Dates:**
  - Saturday, April 2 (8:00am – 5:00pm)
  - Sunday, April 3 (8:00am – 3:00pm)
- **Course Instructors:**
  - Youping Gao, Castheon Inc.
  - Shane Collins, ASTM International
- **Course Location:** AMUG 2022, Chicago, IL

This course is aimed at individuals with existing experience in AM, who wish to understand all the information needed to update an existing facility or create a new facility for the purpose of manufacturing safety critical parts using the laser powder bed fusion process with metal powders.

The 2-day training, based on ISO and ASTM standards, will provide both the seasoned AM professional and novices with all the requirements needed to update an existing facility or start a new business for the purpose of manufacturing safety critical parts using the laser powder bed fusion process with metal powders.

The course will provide detailed instruction on all aspects of the operations from feedstock selection and qualification to processing and post processing (IQ, OQ, PQ) using real-life examples. The course will provide detailed instruction on all aspects of the operations from feedstock selection and qualification to processing and post processing (IQ, OQ, PQ) using real-life examples. The course will provide detailed instruction on all aspects of the operations from feedstock selection and qualification to processing and post processing (IQ, OQ, PQ) using real-life examples. The course will provide detailed instruction on all aspects of the operations from feedstock selection and qualification to processing and post processing (IQ, OQ, PQ) using real-life examples. The course will provide detailed instruction on all aspects of the operations from feedstock selection and qualification to processing and post processing (IQ, OQ, PQ) using real-life examples.

**Day 1**
- Equipment selection based on candidate parts and ROI calculations
- Facility considerations, requirements, and controls
- Establishing factory and site acceptance tests
- Workflow and efficiency
- Make or buy decisions with post processing
- Machine calibration and certification
- Metallurgical process qualification

**Day 2**
- QMS for all powder bed fusion work instruction
- Digital twin definition
- Part qualification considerations
- Business plans and growth strategy
- Personnel training requirements
- Preventive maintenance
- Manufacturing plan creation
- Inspection and NDE for production
- Considerations for NASA 6030 spec
- In-situ monitoring

Exam will be 2 weeks after the training event, held online.

After successful completion of the course, the participants will receive an ASTM AM Certificate.

### TOLLINGU | SME

**Certified Additive Manufacturing – Fundamentals (CAM-F) Review Course & Exam**

- **Cost:** $395.00
- **Register:** [showproevent.com/AMTC0422](showproevent.com/AMTC0422)
- **Course Dates:**
  - Sunday, April 3 (7:30am – 3:00pm)
- **Course Instructor:**
  - Sheku Kamara, MSOE
- **Course Location:** AMUG 2022, Chicago, IL

This one-day program includes a review course covering the foundations of additive manufacturing, followed by the Certified Additive Manufacturing – Fundamentals (CAM-F) exam. The review course and certification are ideal for individuals working in or seeking to work in additive manufacturing roles in automotive, aerospace, and medical equipment. It is also ideal for high schools and colleges as a capstone or stand-alone achievement to increase workforce readiness in additive manufacturing.

The four-hour review course is a discussion-oriented and interactive session designed to prepare participants for the CAM-F exam. The course outline is aligned with the Additive Manufacturing Body of Knowledge (AMBOK) outlining the current state-of-knowledge in additive manufacturing, as well as areas that have been identified as important by a wide range of additive manufacturing professionals.

**Objectives:**
- Identify the various 3D printing technologies & their benefits/limitations
- Define the basic 3D printing process
- Understand the benefits of 3D printing over traditional manufacturing processes
- Understand the hardware & software for 3D digital file management
- Identify common materials for each 3D printing technology
- Identify basic safety & quality considerations specific to 3D printing

**Exams**
- **Duration:** 3 hours
- **Review Program:** 7:30am – 11:30am
- **Lunch Break:** 11:30am – 12:00pm
- **Exam:** 12:00pm – 3:00pm

DMG MORI

AMUG is pleased to announce that DMG MORI Chicago is opening its doors to AMUG members for an exclusive offsite tour of their facility. The tour will provide an in-depth look at their AM process chain, including the design and programming phase to building and finishing components. They will also feature their LASERTEC powder nozzle Directed Energy Deposition (DED) and powder bed Selective Laser Melting (SLM) technology paired with the latest 5-axis CNC technology and automation. The tour will also cover quality assurance and inspection. More details (including a registration link) to follow.

### Off-Site Tours

DMG MORI

AMUG is pleased to announce that DMG MORI Chicago is opening its doors to AMUG members for an exclusive offsite tour of their facility. The tour will provide an in-depth look at their AM process chain, including the design and programming phase to building and finishing components. They will also feature their LASERTEC powder nozzle Directed Energy Deposition (DED) and powder bed Selective Laser Melting (SLM) technology paired with the latest 5-axis CNC technology and automation. The tour will also cover quality assurance and inspection. More details (including a registration link) to follow.
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<td>AMUGexpo Sponsor and Exhibitor set-up continues</td>
<td>AMUG Program Set-Up with Volunteers</td>
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<td>8:30am-9:00am</td>
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<tr>
<td>9:00am-9:30am</td>
<td>ASTM Certificate Course</td>
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<tr>
<td>9:30am-10:00am</td>
<td>Establishing an Additive Manufacturing Facility for Critical Part Production</td>
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<tr>
<td>10:00am-10:30am</td>
<td>Saturday, April 2</td>
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<tr>
<td>10:30am-11:00am</td>
<td>8:00 am – 5:00 pm</td>
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</tbody>
</table>

**Saturday, April 2, 2022**

- **AMUGexpo Sponsor and Exhibitor set-up continues**
- **AMUG Program Set-Up with Volunteers**

**New Member Welcome**

- Location: Grand Ballroom
- Time: 3:00pm - 4:00pm

**NEW MEMBER WELCOME DINNER**

- Location: Lower Level
- Time: 4:00pm - 10:00pm

**ASTM Certification SATURDAY AND SUNDAY**

- Location: Lower Level
- Time: 4:00pm - 10:00pm

**AMUGexpo Sponsor and Exhibitor set-up continues**

- **AMUG Program Set-Up with Volunteers**

**ASTM Certificate Course**

- Establishing an Additive Manufacturing Facility for Critical Part Production
- Saturday, April 2
- 8:00 am – 5:00 pm

**TOOLINGU | SME Certified Additive Manufacturing Fundamentals (CAM-F) Review Course & Exam**

- Sunday, April 3
- 8:00 am – 3:00 pm

**Registration Open**

- Location: Lobby Level
- Time: 10:00am - 8:00pm

**Badge Pick-up**

- **Speaker Center**
- **Mobile App Center**

**New Member Welcome**

- Location: Grand Ballroom
- Time: 3:00pm - 4:00pm
INSIGHTS AND HIGHLIGHTS
AMUG Welcome insights
2022 Scholarship Winners highlights
Insights and Highlights: what you need to know with Todd Grimm
Location: International Ballroom, Second Floor

PRESENTATION
3:00pm - 4:00pm

AMUG Expo area Open
Visiting Diamond, Platinum, Gold and Exhibitor booths in Salon A, C and D on the Lower Level
Location: AMUG Expo area in Salon A, C, and D on Lower Level

AMUG Expo area Open
Visit Diamond, Platinum, Gold and Exhibitor booths in Salon A, C and D on the Lower Level
Location: AMUG Expo area in Salon A, C, and D on Lower Level

GENERAL SESSIONS AND BREAKOUTS open to all Conference Attendees

Breaks and Networking Lunch in AMUG Expo area
Sessions begin at 1:30pm

GENERAL SESSIONS

PRESENTATION
1:30pm - 2:30pm

TRANSITION
4:00pm - 4:30pm

WORKSHOP Scanning for Quality Workshop
Giles Gaskell, Hexagon
Derek Ellis, Authentic3D
Bob Renella, CATI

Panel: Aerospace/Transportation
Continental A
Lobby Level
AMUG Program

Panel: Metal Additive Manufacturing Processes and Alloys for Rocket Propulsion Applications
Paul Jr. Gradi
NASA Marshall Space Flight Center

Presentation
A How to Guide: Achieving Application Readiness for Automotive Production AM
Giuseppe Lacaria
Ford Motor Company

Presentation
An Introduction to 3D Scanning for Quality and Metrology
Giles Gaskell, Hexagon
Derek Ellis, Authentic3D

Panel: Continental B
Lobby Level

Panel: Continental C
Lobby Level

Panel: PDR 2
2nd Floor

Presentation
Point-of-Care Additive Manufacturing of Ti Patient-Matched Implants: an Overview from Mayo Clinic
Amy Alexander, Mayo Clinic

MODERATOR
Robert Higley
Joel Kuhlmann

Medtech Panelists
Robert Higley
Joel Kuhlmann
Seth McEligot
Allen Rech

Presentation
Additive Manufacturing at the Point of Need
Thomas Vreede
U.S. Army Combat Capabilities Development Command - Armaments Center

Presentation
What Does One Year of Serial Production (Metal LPBF) Look Like
Tad Steinberg
Ross Hentzy
Siemens Energy

Panel: 3D Scanning Expert Panel
MODERATOR
Giles Gaskell, Hexagon

Panelist:
Derek Ellis, Authentic3D
Bob Renella, CATI
Jake Richter, Pinnacle X-Ray Solutions
Roger Wendle, Volume Graphics

Panel: Quality Considerations for Additive Manufacturing in Healthcare
MODERATOR
Amy Alexander, Mayo Clinic

Panelist:
Sarah Rimmiri, Geisinger Medical Center
Peter Laccourra, PhD, Walter Reed National Military Medical Center
Todd Pietila, MaterMed
Nicole Wake, PhD, Reed National Military Medical Center

Presentation
U.S. Army Expendary Additive Manufacturing at the Point of Need
Thomas Vreede
U.S. Army Combat Capabilities Development Command - Armaments Center

Presentation
3D Scanning Expert Panel
MODERATOR
Giles Gaskell, Hexagon

Panelist:
Derek Ellis, Authentic3D
Bob Renella, CATI
Jake Richter, Pinnacle X-Ray Solutions
Roger Wendle, Volume Graphics

Presentation
Fundamental Vat Photopolymerization Informed by the First-ever NIST Calibrated Uniform Light Engine
Callie Higgins
Jason Kilgore
NIST

Presented By A Sales Guy
Materialise

Poster Session
10:30am - 12:00pm

AMUG Expo area Open
Lobby Level

Break and Networking Lunch in AMUG Expo area
Sessions begin at 1:30pm

Break
2:30pm - 3:00pm

Break
3:00pm - 4:00pm

Break
4:00pm - 4:30pm

Break
4:30pm - 5:30pm

Break
5:30pm - 6:00pm

Break
6:00pm - 10:00pm

5:30pm - 6:00pm

6:00pm - 10:00pm

All Sessions Closed
### TIME

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<tr>
<th>Time</th>
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<tr>
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### Breakout Sessions Begin

#### Diamond Sponsor Sessions

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<th>Name</th>
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<td>1:30pm - 2:30pm</td>
<td>International Ballroom</td>
<td>Covestro</td>
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<tr>
<td></td>
<td>2nd Floor</td>
<td>TBA</td>
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<tr>
<td></td>
<td>Continental C Lobby Level</td>
<td>ExOne TBA</td>
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<tr>
<td></td>
<td>Waldorf 3rd Floor</td>
<td>EOS TBA</td>
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<tr>
<td></td>
<td>Marquette 3rd Floor</td>
<td>Formlabs TBA</td>
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<tr>
<td></td>
<td>Williford A 3rd Floor</td>
<td>DMG MORI TBA</td>
</tr>
<tr>
<td></td>
<td>Williford B 3rd Floor</td>
<td>Dyndrite Corporation TBA</td>
</tr>
<tr>
<td></td>
<td>Williford C 3rd Floor</td>
<td>Nexa3D TBA</td>
</tr>
<tr>
<td></td>
<td>Lake Michigan 8th Floor</td>
<td>CLOSED</td>
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<tr>
<td>2:30pm - 3:00pm</td>
<td>International Ballroom</td>
<td>BREAK</td>
</tr>
<tr>
<td>3:00pm - 4:00pm</td>
<td>Continental C Lobby Level</td>
<td>Stratasys TBA</td>
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<td>Waldorf 3rd Floor</td>
<td>Computer Aided Technology (CATI) TBA</td>
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<td></td>
<td>Marquette 3rd Floor</td>
<td>Desktop Metal TBA</td>
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<td></td>
<td>Williford A 3rd Floor</td>
<td>TeknaPlasma Systems TBA</td>
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<tr>
<td></td>
<td>Williford B 3rd Floor</td>
<td>LuxCreo TBA</td>
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<tr>
<td></td>
<td>Williford C 3rd Floor</td>
<td>Essentium Materials TBA</td>
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<td>Lake Michigan 8th Floor</td>
<td>fabWeaver TBA</td>
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<td>4:00pm - 4:30pm</td>
<td>International Ballroom</td>
<td>TRANSITION</td>
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<td>4:30pm - 5:30pm</td>
<td>Continental C Lobby Level</td>
<td>Hexagon TBA</td>
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<td>Waldorf 3rd Floor</td>
<td>HP TBA</td>
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<td>Williford A 3rd Floor</td>
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<td></td>
<td>Williford B 3rd Floor</td>
<td>MELTIO TBA</td>
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<tr>
<td></td>
<td>Williford C 3rd Floor</td>
<td>GE TBA</td>
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<td></td>
<td>Lake Michigan 8th Floor</td>
<td>DIAMOND TBA</td>
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### All Sessions Closed

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<thead>
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<th>Time</th>
<th>Location</th>
<th>Name</th>
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<tbody>
<tr>
<td>5:30pm - 6:00pm</td>
<td>International Ballroom</td>
<td>AMUGexpo Open - Salon A, C, and D, Lower Level</td>
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<tr>
<td></td>
<td>2nd Floor</td>
<td>Dinner and Networking - Salon A, C, and D, Lower Level</td>
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<tr>
<td></td>
<td>Continental C Lobby Level</td>
<td>Technical Competition - Salon C, Lower Level</td>
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</table>

**PRELIMINARY**

FOR USERS. BY USERS.
### Session and Activities Timeline

<table>
<thead>
<tr>
<th>Time</th>
<th>EXPO Area</th>
<th>Location</th>
<th>Hours Open</th>
<th>Location</th>
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</thead>
<tbody>
<tr>
<td>7:00am - 8:00am</td>
<td>Diamond and Platinum Sponsors BOOTH AREA OPEN</td>
<td>Normandy Lounge and Grand Ballroom, Second Floor</td>
<td>11:00am - 12:00pm</td>
<td>Location: International Ballroom, Second Floor</td>
</tr>
<tr>
<td>8:00am - 8:30am</td>
<td>Diamond and Platinum Sponsors BOOTH AREA OPEN</td>
<td>International Report</td>
<td>Stefan Rill, AMUG International Committee Chair, Fehrmann Alloys GmbH</td>
<td>Location: International Ballroom, Second Floor</td>
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<tr>
<td>8:30am - 9:00am</td>
<td>Diamond and Platinum Sponsors BOOTH AREA OPEN</td>
<td>2022 DINO Awards</td>
<td>Distinguished INnovator Operator (DINO)</td>
<td>Location: International Ballroom, Second Floor</td>
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<tr>
<td>9:00am - 12:00pm</td>
<td>Diamond and Platinum Sponsors BOOTH AREA OPEN</td>
<td>Keynote: Kevin Czinger Divergent 3D</td>
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<tr>
<td>12:00pm - 1:15pm</td>
<td>Diamond and Platinum Sponsors BOOTH AREA OPEN</td>
<td>Networking Lunch</td>
<td>Technical Competition Entries on Display</td>
<td>Location: Normandy Lounge and Grand Ballroom, Second Floor</td>
</tr>
<tr>
<td>1:30pm - 2:30pm</td>
<td>Diamond and Platinum Sponsors BOOTH AREA OPEN</td>
<td>Breakout Sessions Begin</td>
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<tr>
<td>2:30pm - 3:00pm</td>
<td>Diamond and Platinum Sponsors BOOTH AREA OPEN</td>
<td>Break</td>
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<tr>
<td>3:00pm - 4:00pm</td>
<td>Diamond and Platinum Sponsors BOOTH AREA OPEN</td>
<td>Breakout Sessions Begin</td>
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<tr>
<td>4:00pm - 6:00pm</td>
<td>Diamond and Platinum Sponsors BOOTH AREA OPEN</td>
<td>Break</td>
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<tr>
<td>6:30pm - 10:00pm</td>
<td>Diamond and Platinum Sponsors BOOTH AREA OPEN</td>
<td>AMUG Off-Site Dinner and Networking Event</td>
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</table>

### AMUG Program Overview

**Continental A Lobby Level**
- **Aerospace/Transportation**
  - **AM Technologies (Non-Metal)**
    - **Workshop**: Beryllium Additive Manufacturing
      - **Moderator**: Mike pecota, navy
      - **Panelists**: James Zunino, Amy
      - **Panelists**: Blake Johnson, Airforce
      - **Panelists**: Josh Helier, Navy
      - **Panelists**: Michael Gurri, SCDM

**Continental B Lobby Level**
- **Aerospace/Transportation**
  - **AM Metal Technologies**
    - **Presentation**: Scaling Quality from Development to Aerospace Additive Manufacturing: Pathway to Serial Production
      - **Presenters**: Cameron Peahl, Eaton Corporation

**Continental B 2nd Floor**
- **AM Technologies (Non-Metal)**
  - **Presentation**: Cost Down Sustainable Additive Manufacturing with Blue Technology for Laser Sintering
    - **Presenters**: Soren Griesbach, Christian Folgar, GS-Pra GmbH
  - **Presentation**: Thermally Stable AM Printed Molds/Fixtures Using Ambient Cured, Thermoset Print Media
    - **Presenters**: Rick Faunt, Polymetric

**Continental C Lobby Level**
- **Aerospace/Transportation**
  - **AM Metal Technologies**
    - **Presentation**: Metal AM Prospects in the Semiconductor Capital Equipment Manufacturing Industry
      - **Presenters**: Ahmed Eldessouky, Veeco Instruments
      - **Presenters**: Alia Elwan, Texas A&M University
  - **Presentation**: Nanoengineering for Additive Manufacturing Materials: Crushing the Formulation Improvement Wall
    - **Presenters**: Olga Ivanova, MIT
      - **Panelists**: Rick Pauer, Army, Cameron Peahl, Airforce, Rick Reason, Continental A

**Continental C 2nd Floor**
- **AM Technologies (Non-Metal)**
  - **Presentation**: Applying Machine Learning to Enable Rapid Material Property Allowables Development for AM
    - **Presenters**: Anne Wang, Senal
      - **Panelists**: Chris Holnhofer, Azora 3D
  - **Presentation**: The Impacts of NFPA 484-2022 and Similar Standards on Additive Manufacturing Operations
    - **Presenters**: Jaron Reason, Arduco EDS
      - **Panelists**: Thomas Sorovetz, Casting Engineer

**PDR 2 3rd Floor**
- **AM Metal Technologies**
  - **Presentation**: Innovative Approaches for Accelerating AM Standardization
    - **Presenters**: Shav Collins, ASTM
  - **Presentation**: Additive Manufacturing of Metals and Traditional Metal Processes
    - **Presenters**: Thomas Sorovetz, Casting Engineer
      - **Panelists**: Dave Rettenmyer, Nashor Pattern
      - **Panelists**: Miranda Moschel, Xerox
      - **Panelists**: Steve Murray, Mike Hachst, Eagle Engineered Solutions

### Registration and Badge Pick-Up
- **Location**: Lobby Level
- **Hours**: 7:00am - 5:00pm

### EXPO Area Sessions and Activities

**Breakfast**
- **Location**: Normandy Lounge and Grand Ballroom, Second Floor
- **Time**: 7:00am - 8:00am

**Keynote**
- **Location**: International Ballroom, Second Floor
- **Time**: 9:00am - 10:00am

**Technical Competition Entries on Display**
- **Location**: International Ballroom, Second Floor
- **Time**: 10:30am - 11:00am

**Networking Lunch**
- **Location**: Normandy Lounge and Grand Ballroom, Second Floor
- **Time**: 12:00pm - 1:15pm

**Sponsors and Platinum Sponsors**
- **Location**: International Ballroom, Second Floor
- **Time**: 11:30am - 12:00pm
- **Time**: 1:30pm - 2:30pm
- **Time**: 3:00pm - 4:00pm
- **Time**: 4:00pm - 5:00pm
- **Time**: 5:00pm - 6:00pm
- **Time**: 6:30pm - 10:00pm

### Updates Made Through Mobile App
- **General Sessions and Breakouts open to all Conference Attendees**
- **Speakers, Dates, and Times subject to change with notice**
- **Updates made through mobile app**

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**TUESDAY, APRIL 5, 2022**

**REGISTRATION - SPEAKER CENTER - MOBILE APP DESK**

**Hours Open**
- **7:00am - 4:00pm**: Speaker Center and Mobile App Desk
  - **Location**: Lobby Level

**REGISTRATION and BADGE PICK-UP**
- **Location**: Lobby Level
- **Hours**: 7:00am - 4:00pm

**EXPO AREA SESSIONS AND ACTIVITIES**
- **Hours Open**: 7:00am - 5:00pm

**Break**
- **Time**: 2:30pm - 3:00pm

**Breakout Sessions Begin**
- **Time**: 1:30pm - 6:00pm

**AMUG Conference**
- **Location**: International Ballroom, Second Floor
- **Time**: 6:30pm - 10:00pm

**All Sessions Closed**
- **Time**: 7:00am - 5:00pm
# Session and Activities continues

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<thead>
<tr>
<th>Time</th>
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<td><strong>10:30am - 11:00am</strong></td>
<td><strong>Breakout Sessions Begin</strong></td>
<td><strong>Diamond Sponsor Sessions</strong></td>
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<td>Waldorf 3rd Floor</td>
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<td>Diamond Speaking Session</td>
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<td>Dyndrite Corporation TBA</td>
<td>Essentium Materials TBA</td>
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<td><strong>11:30am - 12:00pm</strong></td>
<td><strong>Networking Lunch</strong></td>
<td><strong>Breakout Sessions Begin</strong></td>
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<td>Continental C Lobby Level</td>
<td>Waldorf 3rd Floor</td>
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<td>Diamond Speaking Session</td>
<td>Diamond Speaking Session</td>
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<td>DMG MORI TBA</td>
<td>GE TBA</td>
<td>MELTIO TBA</td>
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<td>1:30pm - 2:30pm</td>
<td><strong>Break</strong></td>
<td><strong>Breakout Sessions Begin</strong></td>
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<tr>
<td><strong>3:00pm - 4:00pm</strong></td>
<td><strong>All Sessions Closed</strong></td>
<td><strong>Board Buses for Off-Site Dinner and Networking Event</strong></td>
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# AMUG Program

## Breakfast
- **Location**: Normandie Lounge and Grand Ballroom, Second Floor

## 2021 Technical Competition Winners Presentations
- **Advanced Concepts**: “BAAM Dam. Leveraging Large Format AM for Community Hydroelectric Applications” (Vito Gervasi, Codens LLC)
- **Advanced Finishing**: “Death: A Horseman’s Journey” (Bill Braune, Dinsmore)

## Innovator Showcase
- **Panelist**: Andy Christensen

## Break
- **Location**: Normandie Lounge and Grand Ballroom, Second Floor

## 2022 Technical Competition | Advanced and Finishing Winners Announced
- **Chair**: Bonnie Meyer, AMUG Technical Competition Chair

## AMUG Business Meeting
- **Official AMUG Board Meeting of the Members**: Vincent Anewenter, AMUG Treasurer, and Leslie Frost, AMUG Secretary
- **2022 - 2024 AMUG Board of Directors Announced**: Paul Bates, AMUG Past President

## 2022 Technical Competition | Members Choice Winner Announced

## Networking Lunch
- **Location**: Normandie Lounge and Grand Ballroom, Second Floor

## AMUG Program

<table>
<thead>
<tr>
<th>AM Metal Technologies</th>
<th>Medical &amp; Dental</th>
<th>Software</th>
<th>Education &amp; Training</th>
<th>Metal Casting</th>
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<tr>
<td>Continental A Lobby Level</td>
<td>Boulevard Room A/B 2nd Floor</td>
<td>Continental B Lobby Level</td>
<td>Boulevard Room C 2nd Floor</td>
<td>PDR 2 3rd Floor</td>
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## Presentation
- **Introduction to Directed Energy Deposition**: Jeffrey Crandall, Connecticut Center for Advanced Technology - CCAT
- **Demonstration of DICOM Segmentation for 3D Printing**: Robert Wesley, Rich USA
- **MES Panel Discussion**: Moderator: Kevin Ayers, Panelist: Andre Wiegner, Automate, Dave Flynn, Materialize, Danny Wrenn, AMFG, Alex Domadzie, 3YOURMIND, John Dogru, SIO3D

## Break
- **Location**: Normandie Lounge and Grand Ballroom, Second Floor

## Panel: Founders Panel – Navigating a Startup in Metal AM
- **Moderator**: Melanie Lang, Formuly
- **Panelists**: John Barnes, Metal Powder Works, Young Gao, Cadethen, Ivan Madera, Morph3D, Brad Kasekowski, KRM Solutions

## Presentation
- **How to Build a Point of Care Manufacturing Center at a University**: Edward Herderick, The Ohio State University
- **Evaluating and Creating an Effective Software Workflow**: Tynge Rogers, Dowfoss
- **How to Make Additive Manufacturing Work: DFAM, Tips and Lessons Learned**: Glen Desmier, Inductoheat

## Breakout Sessions Begin
- **Location**: Normandie Lounge and Grand Ballroom, Second Floor

## Platinum Sponsor Program
- **Gearbox 3D TBA**: Platinum Sponsor
- **Equispheers TBA**: Platinum Sponsor

## Breakout Sessions

<table>
<thead>
<tr>
<th>AM Metal Technologies</th>
<th>Medical &amp; Dental</th>
<th>Materials</th>
<th>Education &amp; Training</th>
<th>AM Technologies (Non-Metal)</th>
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| **Panel**: The Future of Large-Scale Metal AM  
**Moderator**: John Barnes, Metal Powder Works  
**Panelists**: Melanie Lang, Formuly, Stacie Garner, Big Metal Additive, Caitlin Waide, Solus Global, Paul Gradi, NASA  
**Presentation**: Medical 3D Printing Within the DOD and VHAC Past, Present, and Future  
**Presentation**: Benefits of Integrated Computational Materials Engineering technologies in Additive Manufacturing  
**Panel**: AM Equipment Benchmarking Considerations  
**Moderator**: Alex Roschi, Oak Ridge National Laboratory  
**Panelists**: Ben Arnold, Massiv3D, Tim Heller, Strategis, Dave Macie, Centijust, Meghan Rock, Desktop Metal  
**Presentation**: Open Platform Advantages and 3D Adoption by Injection Molders  
**Sponsors**: Xerox TBA, Boston MicroFabrication TBA |
| **Panel**: Advanced Concepts  
**Moderator**: Lisa Jermol, Dentsply Sirona  
**Panelists**: Michael Fialkowski, Dentsply Sirona, Todd Herderick, Stratasys, Rick Black, BAE Systems  
**Presentation**: Dental 3D Printing Within the DOD and VHAC Past, Present, and Future  
**Presentation**: Benefits of Integrated Computational Materials Engineering technologies in Additive Manufacturing  
**Panel**: AM Equipment Benchmarking Considerations  
**Moderator**: Alex Roschi, Oak Ridge National Laboratory  
**Panelists**: Ben Arnold, Massiv3D, Tim Heller, Strategis, Dave Macie, Centijust, Meghan Rock, Desktop Metal  
**Presentation**: Open Platform Advantages and 3D Adoption by Injection Molders  
**Sponsors**: Xerox TBA, Boston MicroFabrication TBA |

## Dinner and Evening Activities
- **Location**: It’s the Roaring 20s Dinner and Evening Activities
<table>
<thead>
<tr>
<th>TIME</th>
<th>SESSIONS AND ACTIVITIES CONTINUED</th>
</tr>
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<tbody>
<tr>
<td>7:30am - 8:30am</td>
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**BREAKOUT SESSIONS BEGIN**

- **DIAMOND SPONSOR SESSIONS**
  - **International Ballroom**
    - 2nd Floor
    - Diamond Speaking Session
  - **Continental C**
    - Lobby Level
    - Diamond Speaking Session
  - **Waldorf**
    - 3rd Floor
    - Diamond Speaking Session
  - **Marquette**
    - 3rd Floor
    - Diamond Speaking Session
  - **Williford A**
    - 3rd Floor
    - Diamond Training Session
  - **Williford B**
    - 3rd Floor
    - Diamond Training Session
  - **Williford C**
    - 3rd Floor
    - Diamond Training Session
  - **Lake Michigan**
    - 8th Floor
    - Diamond Training Session

**1:30pm - 2:30pm**
- EOS TBA
- TeknaPlasma Systems TBA
- Computer Aided Technology (CATI) TBA
- Hexagon TBA
- LuxCreo TBA
- Essentium Materials TBA
- Dyndrite Corporation TBA
- GE TBA

**2:30pm - 3:00pm**
- Desktop Metal TBA
- Covestro TBA
- ExOne TBA
- Stratasys TBA
- DMG MORI TBA
- fabWeaver TBA
- Nexa3D TBA
- CLOSED

**3:00pm - 4:00pm**
- Formlabs TBA
- CLOSED
- HP TBA
- CLOSED
- DIAMOND TBA
- MELTIO TBA
- DIAMOND TBA
- CLOSED

**4:00pm - 4:30pm**
- TRANSITION

**4:30pm - 5:30pm**
- ALL SESSIONS CLOSED

**5:30pm - 6:00pm**
- **ALL SESSIONS CLOSED**

**6:00pm - 10:00pm**
- It's the Roaring 20s Dinner and Evening Activities
### AMUG PROGRAM

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<td>11:00am - 11:30am</td>
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### PLATINUM SPONSOR PROGRAM

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### BREAKOUT SESSIONS BEGIN

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### Sessions and Activities

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### Networking Lunch

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### EXPO AREA SESSIONS AND ACTIVITIES

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### General Sessions and Breakouts open to all Conference Attendees

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### Updates made through mobile app

Speakers, Dates and Times subject to change without notice
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<th>TIME</th>
<th>SESSIONS AND ACTIVITIES CONTINUED</th>
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<tr>
<td>7:30am - 8:30am</td>
<td>BREAKFAST</td>
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<tr>
<td>8:00am - 8:30am</td>
<td>AMUG BOARD PANEL DISCUSSION AMUG Board of Directors, The Future of AMUG</td>
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<tr>
<td>9:00am - 10:00am</td>
<td>KEYNOTE: Ellen Lee Ford Motor Company</td>
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<td>10:00am - 10:30am</td>
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<td><strong>DIAMOND SPONSOR SESSIONS</strong></td>
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<td>ExOne TBA</td>
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<tr>
<td>6:00pm - 10:00pm</td>
<td>Family Dinner and Official Closing of the AMUG Conference</td>
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## AMUGEXPO HOURS

- **Sunday, April 3, 2022**: 4:00pm - 10:00pm
- **Monday, April 4, 2022**: 10:00am - 1:30pm
- **Monday, April 4, 2022**: 6:00pm - 10:00pm

Exhibitors and Gold sponsors move out on Monday night. Make sure to plan your time at the conference to see them all!

### DIAMOND AND PLATINUM SPONSORS ONLY

Diamond and Platinum booths are open throughout the week.

- **Tuesday, April 5**: 10:30am - 12:00pm
- **Tuesday, April 5**: 1:30pm - 4:00pm
- **Wednesday, April 6**: 1:30pm - 5:30pm
- **Thursday, April 7**: 12:00 - 1:30pm (lunch)

### AMUGEXPO SPONSOR & EXHIBITORS

**COMPANY (ALPHABETICAL ORDER) BOOTH**

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<td>Scilic, Inc. 41</td>
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<td>Desktop Metal D20</td>
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<td>Servol 39</td>
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<td>Siemens Digital Industries P13</td>
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<td>Tethon 3D 45</td>
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<td>PostProcess Technologies P25</td>
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<td>Gearbox 3D LLC P23</td>
<td>Prauser Surface Technologies 7</td>
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<td>Laboratory Testing Inc. 48</td>
<td>Sandvik Additive Manufacturing P12</td>
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Preliminary - Companies are still conducting booth selection.

Technical Competition Area
Monday, April 4
6:00pm-10:00pm

Special Moving Notice for Salon C:
Move-in for exhibitors in Salon C will begin Saturday late afternoon and must be completed by Sunday at 1:00pm.

Lunch Area on Lower Level
(additional Lunch area on Second Floor)

AMUG Expo Floorplan

AMUG Info Desk
Scholarship and New Member Lounge

Pass between Salon D and A
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AMUG Conference
April 3-7, 2022

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