

# IMTS 2018: A Field Guide

## Chicago Preps for the Next Manufacturing Technology Extravaganza

Matthew Jaster, Senior Editor

The International Manufacturing Technology Show is once again upon us. Soon, Chicago will be overrun with grinding, inspection, automation, robotics and metalworking technologies that could potentially change the way your shop conducts business overnight. It's a pretty big deal in the manufacturing sector. We recently caught up with Peter Eelman, vice president of exhibitions and communications for AMT, to discuss IMTS 2018.

### Then & Now: A Digital Revolution

Eelman compared his very first IMTS trade show experience to the upcoming show.

"It was 1980 and it was the biggest and most amazing trade show I had ever seen," Eelman said. "From a technology standpoint, the emphasis in 1980 was on digital manufacturing, but at a completely different level than today."

Eelman continued, "Back then it was strictly moving from CNC to DNC (direct numerical control); moving from the old world into the digital world of controls. Now, when we talk about digital transformation we're talking about every facet of manufacturing from part design to finished piece. It's truly an exciting time to be involved in manufacturing."

### What's New & Relevant?

Eelman promises much more in the area of additive manufacturing. "We have gone in four years from additive being a demonstrated technology to finding a home in the emerging technology center. We've now formed a pavilion and 35,000 square feet of the show will be additive manufacturers including companies that will be introducing unique metal processing capabilities. The change in the size and scope of this technology is dramatic," Eelman said.

"This really is a sea change for manufacturing. It won't be overnight, but it will definitely impact the way we think about making parts now and in

the future. Not only 3D printing, but the entire manufacturing process; start to finish. We're seeing at the moment that almost every company is working in the digital realm and trying to make their part processes more efficient," he added.

With the Internet it's hard to have any surprises anymore, but Eelman believes attendees will see some product introductions in 3D-printing that are a great leap forward for the industry.

"We're talking real metals and things that you can use. 3D printing started with things like key chains and now we're demonstrating at the show that so much more is coming. What manufacturers traditionally make is going to be

made differently in the future," Eelman said.

The underlining theme for the 2018 show is digital transformation. "This is a foundation of additive manufacturing, but it's also the foundation for the future of every manufacturing plant. We're examining the connection between everything in the factory from design to finished product. Where can you gain efficiencies on the shop floor and become a more nimble and flexible manufacturer? Products that used to take weeks or months to produce can now be made in hours and sometimes minutes. This is where we're heading as an industry," Eelman added.



## Bigger, Better and Still Expanding

Eelman said the original reason AMT collaborated with Hannover Fairs was to expand the scope of IMTS. "IMTS started as a general machine tool show and then it moved beyond that into factory automation. Today, we're basically building a one-stop shop concept. The breadth of manufacturing that is now covered when you add the Hannover Fairs pieces with the IMTS pieces, there's not a person at manufacturing facility that would not benefit from attending the show," he said.

Here's a brief rundown of the co-located shows that complement the metalworking solutions at IMTS 2018:

**Integrated Automation, Motion & Drives:** The two leading trade shows Industrial Automation and MDA will be combined to create a new annual event: Integrated Automation, Motion & Drives (IAMD) USA. IAMD USA will present the complete spectrum of industrial

automation, IT, power transmission and fluid power technology.

**Surface Technology USA:** This event will cover the entire spectrum of industrial surface treatment and finishing; from cleaning and pre-treatment to coatings, paint finishes, and electroplating.

**ComVac USA:** Highlights the latest product developments, technology, and plant & system components for all areas of compressed air and vacuum.

**Industrial Supply USA:** Covers the entire spectrum of industrial

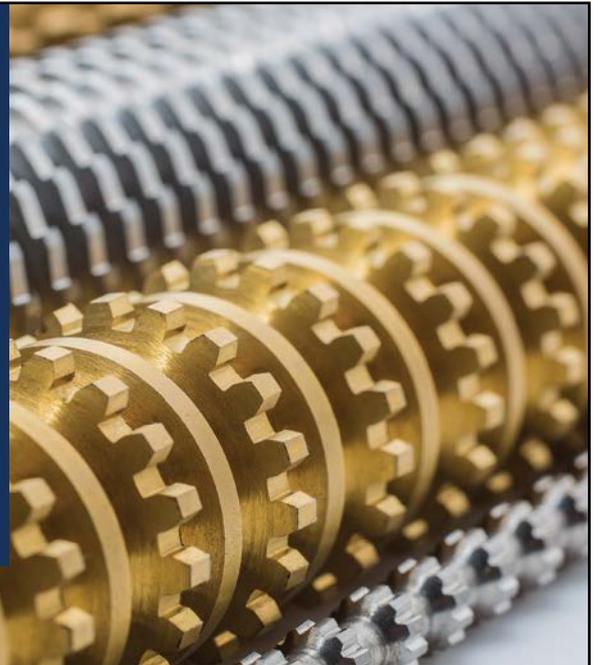
subcontracting and lightweight construction. This is the event where you will find supply solutions across the entire industrial value chain.

## Get Educated

A variety of technical conferences and educational sessions will be available throughout the week — more than 70 sessions covering areas like manufacturing process innovations, alternative/additive manufacturing, plant operations, quality/inspection/metrology and



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systems integration/Industry4.0/IIoT.

“You can spend an entire day learning more about additive manufacturing or drop-by a few conferences on digital manufacturing throughout the week,” Eelman said. “There are plenty of educational opportunities available to everyone. It’s best to start at the website and dig through the sessions that are available.”

Some notable conference topics include:

*Beginners Guide to IIoT/Industry 4.0*

(2:15 on Monday, September 10, Room W194-A)

*Trends in Manufacturing*

(2:15 on Tuesday, September 11, Room W196-B)

*High-Performance Grinding of Nickel-Based Superalloys*

(10:00 on Wednesday, September 12, Room W193-B)

*How Automation & Optimization can Maximize Shop Floor Capabilities*

(9:00 on Thursday, September 13, Room W192-C)

*The Next Step: Taking 3D Printing from Prototyping to the Production Floor*

(3:15 on Thursday, September 13, Room W193-B)

### Bring the Kids

The Smartforce Student Summit aims to introduce students and teachers from elementary through post-secondary schools to exciting, high-tech careers in manufacturing. Companies such as ABB Robotics, Carl Zeiss, Fanuc America, Festo-Didactic, Haas Automation, Heidenhain, Mastercam, Mitutoyo, and Siemens, will have hands-on challenges for students and Learning Labs for teachers as well as advanced students focused on areas such as additive manufacturing, metrology, collaborative robotics, IIoT and more.

“Our Student Summit is by far the largest singular event to expose the manufacturing industry to students here in the United States,” Eelman said. “We had almost 17,000 students in 2016. We’ll have more this time around.”

### The Health of the Manufacturing Trade Show

The trade show itself is evolving in different ways, according to Eelman. “Big trade shows have gotten bigger — EMO in Europe and IMTS here in the states. These big events open your mind and help the technology move forward. I think with the smaller trade shows you’re seeing a bigger appetite for education. We recently collaborated with SME on the Smart Manufacturing Experience. The whole point was to learn about smart manufacturing. The big trade show is still an event — and it’s doing quite well — while the regional and small trade shows are more about showing the application and presenting educational benefits to attendees.”

### Chicago: A U.S. Manufacturing Hub

On the topic of moving future shows to other areas of the country, Eelman says it just doesn’t make sense. “Chicago is cost-competitive with most other cities and is actually cheaper and more affordable in some respect,” Eelman said. “One of the main reasons for keeping IMTS in Chicago is our audience. There’s no better centralized location for manufacturing. It’s easy to get here — for both our domestic and international attendees. It’s so easy, in fact, that moving it any other place in the United States doesn’t make much economic sense.”



## A Clean Slate

The reason each IMTS feels different and original has to do with a little ceremony AMT's internal staff performs at the end of every show. "We tear everything up and start all over again," said Eelman. "We don't get caught up in traditions or what may have worked in previous shows. I believe this is why we've grown so much while other shows have not. This will not be a repeat of the 2016 show. This way we're able to see trends as they come and keep the whole concept of IMTS new and innovative."

## Make Friends with the Website

Is it your first time heading to the show this September? Eelman believes every attendee should get familiar with the resources available on the website prior to making the trip.

"You can register your preferences on the IMTS website and the area of interests that matter most to you and your organization," Eelman said. "This technology allows you to manage your visit as opposed to the visit managing you."

This is really why AMT puts a premium on the website so they can clearly determine what it is the attendees are looking for and where they can go to find it. Planning, according to Eelman, is the way to go.

"It's key that you have a game plan for the show. Make a schedule and stick to it at the beginning of the week. Then you

have the freedom to walk around and see the rest of the show later," Eelman added.

## Economic Impact

There's always a question about the state of manufacturing heading into IMTS. This year, there is much more optimism and excitement than in the past. AMT members have been collecting data and talking with exhibitors leading up to the 2018 show.

"U.S. manufacturing is extremely strong. Our forecasting department

believes manufacturing (everything from automotive to aerospace) is currently in great shape," Eelman said. "There are plenty of orders. There are backlogs. There is an excellent forecast from now until the end of 2019 and beyond."

## Don't Miss Out

And there you have it. Just like that we're about to come together again in the Second City and celebrate manufacturing technology. You can probably come up with a dozen excuses why you won't



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be able to attend this year, but you might want to reconsider.

“In a few years major process changes in manufacturing will take place and having your head down is not a good way to stay in business,” Eelman said. “If you’re not aware of what’s happening in manufacturing today, you can fall behind much more quickly than you would have in the past.” 

**For more information:**  
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