# **Thin Gauge Session Abstracts**

## **Tuesday, September 21**

9:30 a.m.-10:30 a.m.

Smart Manufacturing Technologies: The OEM Experience (Panel Discussion)

No less than the customers they serve, thermoforming machinery manufacturers and tool builders were forced to make radical changes to many of their processes, including machine/tool acceptance, remote installations, and virtual monitoring. How do you show your customer that their new equipment can meet all the criteria in a final acceptance test? Our panel of suppliers will discuss how they quickly researched and vetted a variety of technologies newly applied to thermoforming. From FaceTime and WhatsApp to Microsoft Hololens and augmented reality, we explore the nexus of human/machine interface, AI techniques, and remote monitoring tools.

#### 11 a.m.-Noon

Smart Manufacturing Technologies: The User Experience (Panel Discussion)

The coronavirus pandemic of 2020 forced many changes on many people. It also underscored what we have known since the dawn of time: that necessity is the mother of invention. Even though the rise of "Industry 4.0" has been discussed for some time now, in the world of thermoforming, the pace of adoption has accelerated rapidly in the past year as many plastic manufacturers experienced both a spike in demand and a bottleneck in supply. With engineers and technicians grounded across the world, converters have scrambled to adapt to new, smart technologies that seek to replicate the in-person experience when qualifying machines and tools. Our panel will talk about the challenges and opportunities associated with this brave new world.

2:15 p.m.-3 p.m.

Virtual Plant Tour: Styl'monde

Click here for this session description.

3:15 p.m.-4:15 p.m.

Making a Difference with Sustainable Plastics
Theresa Vanna. Primex Plastics

This presentation will review the basic elements needed to discuss with a customer when they request a "green/sustainable product." This presentation gives us the understanding of the definition of a sustainable product and the different product categories that are available in the marketplace so that we become better equipped to support our customers' efforts.

We will review a brief description of the most commonly used sustainable plastics and explore different pros and cons of each one. Understanding that with all sustainable product offerings there are rules and regulations that need to be followed when marketing the sustainability of the product will also be included in this presentation. Since the discussion around sustainability is an ever growing one, "The best way to predict the future is to create it."

## **About Theresa Vanna**

Theresa M. Vanna is the Primex Market Specialist. Theresa has over 30 years of plastics industry experience in both flexible and rigid plastic sheet and films. She has been serving the Graphic Arts Industry as a resource of printable materials for Packaging, Point of Purchase, Point of Sales Items and In-Store Environment applications.

Her real passion in sustainability has allowed her the opportunity to serve as a Biodegradable Product Specialist for several organizations and is currently serving on Primex's Sustainability Committee and on the Executive Board of Directors of SGP (Sustainable Green Printing) Partnership Organization. Since she is well versed in both sustainable

products and processes, she has provided several educational webinars and has proven to be a good resource for sustainable plastics products.

4:30 p.m.-5 p.m.

Technologies that Enable Smart Manufacturing
Justin Benner, Rockwell Automation

Join Rockwell Automation for a discussion about the Digital Transformation Journey centered on leveraging smart components as the foundation of machine intelligence providing additional capabilities for improved performance and machine differentiation.

## You will learn about:

- Improving machine performance through gathering of actionable data within smart sensing devices
- Simplifying design and speeding build cycles via key integration capabilities of a Rockwell Automation solution
- Increasing asset performance with predictive and prescriptive analytics through key enabling technologies at the device level
- Streamlining setup and changeovers utilizing smart devices
- Providing enhanced levels of equipment protection
- Leveraging "device to dashboard" capabilities through implementation of smart devices

## **About Justin Benner**

Justin Benner is an Intelligent Devices Technology Consultant for Rockwell Automation and is a passionate advocate for smart devices and demonstrating how they work together. Justin has over 15 years of experience in industrial automation primarily focused in the automotive industry based in Detroit. He is a graduate of Michigan Technological University (BS EET) and holds the credential of TÜV Functional Safety Technician for Machinery.

## Wednesday, September 22

9:30 a.m.-10:30 a.m.

Plastics Supply Chain Disruptions in the Wake of COVID-19 Panel Discussion

Session Moderator: Phil Karig, Mathelin Bay

From resin producers to plastics processors to end-users of plastic products, the pandemic and its aftermath have wreaked havoc all along the plastics supply chain. This panel will provide an overview of what happened, as well as a look at where things are likely to be going forward. Panelists from various segments of the plastics supply chain will share their personal experiences, what went right and wrong in their individual organizations, what they might have changed and what their expectations are for the future.

#### Panelists include:

Materials: Phil Karig, Mathelin Bay Processor: Juliet Goff, Kal Plastics

**Extruder:** Paul Uphaus, Primex Plastics

11 a.m.-Noon
The Future of Global Packaging
Benjamin Trent, Smithers

The global market for packaging is large and growing. This presentation will provide insights on the current state and future outlook for the global packaging market:

What are the macro trends in this space, and how do they affect demand?

- How is COVID expected to impact this market?
- What are the latest trends in sustainability and how are they affecting brands packaging choices?
- What is the growth outlook for packaging material by end use and region?
- What are the opportunities and challenges for the thermoforming sector?

Benjamin holds a Bachelor's degree in Finance and an M.B.A from the University of Akron. Benjamin has spent the last eight years in market research and strategic consulting across a wide range of industries. In this time, Benjamin has participated in all functions of these roles including conducting primary and secondary research, analyzing trends, developing market size estimates, evaluating competitive landscapes, authoring reports, developing strategic recommendations, and conducting presentations.

In his current role, Benjamin leads the strategic consulting division of Smithers Information in North America. This division works with clients to gather a deep understanding of their business goals, and to develop indepth research programs to provide visibility into markets and niches. This process is designed to dig deep into a wide variety of industries and topics, gather insights, and provide an unbiased view of the key challenges faced by our clients. These efforts allow our clients to evaluate their strategic plans and make decisions based upon credible data and analysis, supported by robust research conclusions and recommendations.

2:15 p.m.-3 p.m.

PLA in the Circular Economy

Joe Jankowsi, Total Corbion

In order attain a circular economy, we must firstly reduce our dependency on fossil carbon and make a shift to renewable carbon. Then we must utilize waste streams and products at their end-of life as the basis for new products, instead of disposing of them.

PLA is biobased and has characteristics that enable the full range of sustainable end of life options:

- Mechanical recycling
- Chemical recycling / feedstock recovery
- Composting / biodegradation
- Anaerobic digestion
- Incineration with renewable energy recovery

This talk will show PLA makes an ideal solution for the circular economy.

# **About Joe Jankowski**

Joe is a business development manager for Total Corbion PLA, a JV which recently announced a second production site in France. Joe started his professional career in the US Navy, then joined Sunoco Refining as a machinery engineer. He has held commercial roles over the past 10 + years with Braskem and recently joined the Total Corbion PLA team to help them ambitiously move the needle and "Enable Others to do Good."

3:15 p.m.-4:15 p.m.

Improving Operational Efficiency with Industry 4.0

Gregory Romanski, WM Thermoforming

How a thermoformer can provide the end-user with thousands of machine data thanks to the OPC UA protocol which is connected to the Programmable Logic Controller (PLC), Human-Machine Interface (HMI), servers and other equipment to define the "Overall Equipment Effectiveness" (OEE).

The most important machine data is integrated with the production data resulting in a very efficient system of data collection, management and real time processing.

# **About Gregory Romanski**

Gregory Romanski started working as a graduate in Business Administration and a major in strategic marketing at the chemical company BASF where he was responsible for the strategic marketing and communications of Mexico and Central America.

In 2008, he successfully obtained projected profit and market share objectives through defining long-term strategies as a brand manager at 3M. In 2010, he joined MAN as a sales manager where he gained new important clients and maximized growth potential in Europe and Asia.

After several years of vast international experience in strategic marketing and sales, he incorporated WM Thermoforming Machines in 2015.

4:30 p.m.-5 p.m.

Science Has Found a Way: Cost Benefits of Next Generation High-Speed Extrusion Brian Winton, PTi

The development of a high speed 90mm extruder takes system performances to new levels in regards to output and flexibility. Discussions will include how advances in technology have brought about multi-resin capabilities, higher regrind recovery rates, reduced maintenance costs and increased throughput with a minimal change to the physical footprint size of the equipment.

Case study analysis will provide further insight into the technology's capability of efficiently processing various low bulk density feed stocks, overlaid with capital, operating and production cost savings – demonstrating a 30-35% increase in output and 20-25% increase in manufacturing footprint efficiency over the current high-speed technology.

## **About Brian Winton**

Brian Winton is the VP/Sales for Processing Technologies International (PTi). Brian has over 35 years of experience in domestic and international capital equipment sales and project management. He began his career in the thermoforming industry in 1985 and continued into extrusion and plastic recycling. Brian has worked primarily for equipment manufacturers in manager, director and vice president capacities, with past technical sales and marketing teams including John Brown Plastics Machinery, Modern Machinery, Lyle Industries, and The Brown Machine Group.

Brian has extensive process and industry knowledge, and started his career managing turnkey projects for sheet extrusion and thermoforming operations. This included designing and properly sizing ancillary features, downstream equipment and plant utilities, while coordinating comprehensive installation and training services. Brian works closely with his customers to clearly understand their current and future needs. He also collaborates with suppliers and other engineering sources to technically define and promote the latest cutting-edge solutions.

As a graduate of Michigan State University, Brian further promotes the plastic industry through his involvement with schools, colleges and universities. He is an active member of his local Plastics Sector Alliance, which identifies and matches the educational needs of individuals with companies that require a properly educated workforce.

Brian is highly involved in the Society of Plastics Engineers (SPE) Thermoforming Division and has served as a board member since 2002. He continues to serve on the Promotion Committee, AARC Committee and Student Activities Committee, and has previously served as ANTEC Technical Program Chair and Conference Chair.