

5 May - 30 June 2020

Online

Innovate Textile & Apparel Online

Innovate Textile & Apparel (ITA) Online is a unique virtual conference that allows you to discover the latest innovations in manufacturing processes, materials and emerging business models within the textile & apparel industry. Delegates have the opportunity to access presentations from anywhere at any time, ask the presenter questions and download other attendees' business cards.

No travelling, no accommodation expenses and no time constraints – only the high-value content and connections you need.

- Expand your knowledge and expertise related to the principles of Industry 4.0 in textile & apparel manufacturing; the impact of smart and novel textiles; and digital transformation business strategies, all from the comfort of your own home or office
- Find out more about unique industry launches and products in the Showcase section
- Get access to event presentations not just for one day, but eight weeks.
- Review, take notes, and if you have any queries feel free to log back in and reach out to us or the speaker
- Connect online with fellow attendees and speakers
- Never miss a session and view presentations in your own time around your own schedule

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Sessions

Keynote Speaker

Drivers Shaping the Current Landscape of Innovation in Digitalisation and New Materials

Cecilia Gee, Analyst, Lux Research

Textiles and apparel have been continuously evolving to offer innovative technologies, especially within digitalization and new materials. However, increasing challenges demand further forethought wherein, if the right plays are made, we can tap into greater market potential. In this presentation, we focus on key drivers and challenges shaping the current landscape of innovation. A selection of technology case studies and trends will be discussed from materials and processing to leading end products and applications.

Textile 4.0

Enhancing Supply Chain Visibility to Create Data Driven Organisation

Carrie Chiu, Director, Weave Services

The supply chain connects multiple parties with material and information flow. Enormous data flows each day to support decision making. Yet companies complain about lacking of visibility across supply chain, and decision making within the company is experienced based without utilizing data. Carrie from Weave Consulting will share practical guides and case studies on how to improve visibility and drive internal change that enables companies to adopt data-driven decision making.

Quality Assurance & the Supply Chain

TBC, QIMA

Skill Evaluation of Sewing Machine Operators Within Industry 4.0

Prabir Jana, Professor, National Institute of Fashion Technology

The Computerized Sewing Skill Evaluation System (CSSES) (patent applied for) is a portable kit that comprises hardware and software. CSSES collects sewing process attributes dynamically (while the sewing is going on) and calculates the process skill of the sewing operator based on different attributes such as speed, needle running time, burst count, and PMTS time. CSSES also captures sewing quality parameters visually from the sewn sample and evaluates the quality skill of the sewing operator by computerised image processing. It is the world's first 'operation neutral' sewing skill evaluation system, backed by 10 years of research at NIFT. The system generates the numerical process and quality score, while web-based transparency avoids bias, allows easy portability of sewing operators across organisations and enables end-to-end process optimisation.

An Instant 3D Body Reconstruction Platform for Apparel

Rene Stampfl, Vice President - EMEA, Meepl

meepl is an instant 3D body reconstruction platform enabling scalable made-to-measure, size recommendation and 3D virtual dressing room services. With meepl, anyone with a smartphone can create a 3D avatar and upload their measurements within just seconds. With the consumer's body data as a starting point, brands can initiate customized production processes like the automatic adaption of cutting patterns or knitting instructions. With consumers craving for more customization and being more cautious about sustainability, this approach enables the apparel industry to move from a pure "push demand" to a "pull demand" driven industry, decreasing clothing items to end up in landfills or incineration plants but also making wearing clothes even more personal.

Manufacturing of the Future is Here

Andrey Golub, CEO & Founder, ELSE Corp

Moving from Traditional to Smart Factory Set-Up

Suk Keun Cha, CTO, ACS Group

Textile 4.0

Virtual Design and Fitting - 3D Simulation in Clothing Development

Jacqueline Keinath, Project Manager, Hohenstein

Apparel is expected to fit and look good in every size. In our presentation on “Virtual Designing and Fitting – 3D Simulation in Clothing Development” we will look at the most effective ways to make sure that garments do fit and look good in every size. An important aspect of this is knowing your target group and the differences within body sizes and shapes. How to create a pattern that fits perfectly with the help of 3D technology is an important factor, and integrating 3D simulation programs to speed up the design process, communicate ideas and to fit properly on the right avatars across the whole size range.

Why Digitising Quality and Compliance Leads to Transparency

Stephane Boivin, CEO & Co-founder, Pivot88

Quality comes not only from inspection, but from improvement of the process... Pivot88 offers an intuitive digital platform with quality inspection forms, built on industry best practices, and customizable to meet their clients’ needs. With the ability to adapt to all industries, their Quality Pro solution is the perfect first step to introduce structure and standardization to your quality process. 100% digital, dynamic and powered by applied artificial intelligence, it offers instant actionable data analytics for smarter and faster decisions.

Washable RFID Threads® to Digitally Connected the Entire Fashion Industry and Empower Circular Economy

Dr Anura Rathnayake, Founder, Adetexs

Fashion is the second largest polluting industry in the world, second only to the oil industry. Achieving a Circular Economy in the fashion industry, is one of the most important sustainability challenges of this decade. Globally Over 150 billion new articles of clothes produced each year, with 90% of them ending up in landfill without recycling. Without a system for recycling and upcycling textiles, the fashion industry will continue to consume natural resources and turns resources to waste. A viable and efficient system for textile recycling would enable endless reuse of the materials already in circulation, eliminating our reliance on new natural resources. Today, textile recycling operates with minimal success because recyclers have no information on the material content of each garment. The lack of transparency on material content at an item-level prevents the garments from being adequately sorted – an essential step for recycling any material. The industry, through years of research, has finally identified the enabling technology to solve this industry-wide challenge. The solution involves the internet of things, and a key enabling technology called RFID (Radio Frequency Identification) tags. RFID tags are a next generation barcode used globally for tracking and inventory management.

Autonomous Asset Optimisation - Optimising Yield, Energy and Throughput in Industrial Lines

Ricardo Vega, Project Engineer, ITA Academy

Re:Think Materials

Synthetic Biodegradable Fibres

Alastair Drew, Asia Regional Director, Intrinsic Textiles

Synthetic textiles made with CiCLO® fibers reduces plastic microfibers in our oceans and plastic accumulation in landfills. Hear how CiCLO® biodegradable fibers were developed, tested and are being applied to real world textile applications.

Bio-Graphene Infused Textile Fibres and Yarns

Dan Morby, CTO, Quettil Services

This presentation will explain why bio-graphene infused textile fibres and yarns are more washable, more comfortable, cheaper and environmentally friendly. Dan will also discuss the potential for smart clothing, for example, health, sports and safety clothing and what the future holds when combining with other technological advancements.

Fashion with Xtra Intelligence

Nadia Kang, CMO, AiQ Smart Clothing

The textile industry has seen many changes and innovations in the past hundred thousand years - materials, construction, coatings, styles and designs. But, the fundamental functions of textiles haven't changed much. We are now on the cusp of a major innovation unlike any other seen until now. It is the introduction of semi-conductors and their close integration with textile materials. It is fundamental shift in the capabilities of textiles, to make them capable of sensing human physiology and their environment. When combined with machine learning and AI, turning the raw data into actionable insights is what will drive the next stage of innovation in textiles - making them intelligent and playing a far more important role than they ever have done in human history.

Smart Clothing and Wireless Technology

John Ho, Assistant Professor, National University of Singapore

Wireless technologies underlie the connectivity that is the hallmark of modern life. Could textiles be designed to enhance wireless technologies and provide new forms of connectivity? This talk will describe our recent work on wirelessly functional textiles that interact with the user through technologies such as Bluetooth, Wi-Fi, and NFC. Using the electronic textile toolkit, we show that clothing can be designed to boost wireless signals between wearable devices, power battery-free sensors around the body, and sense changes in the wireless environment, all without any physical connection between clothing and technology.

Virus Bacteria & Odour Control for Textiles

Carlo Centonze, CEO & Co-founder, Heiq

In this presentation, Carlo will discuss the development of materials used to combat this pandemic. Carlo will provide information that is vital in helping to reduce the spread of bacteria and viruses, with textiles acting as a vector.

Re:Think Materials

Scratching the Surface of Marketing: New Super Green Materials?

Lucile Menand, R&D Engineer, Dimpora

There has recently been a huge number of bio-based, biodegradable, eco-friendly and 0% CO₂-emissions materials emerging from many different sources such as start-ups, large companies and brands etc. But how do we differentiate the correct from the exaggerated? Here's a quick overview. First of all, never believe '100% or 0%', unless someone can clearly explain it to you. Secondly, always ask how much of this 'new' material actually finds its way into a fabric or garment. Finally, the terms 'bio-based', 'bio-material' and 'bio-fabricated' differ very much from one-another. 'Biodegradable' is a much more complex term than one would think. For example, not all bio-based materials are biodegradable and vice-versa. Standards relating to biodegradability exist and we should always test them fully before bringing a new product to the market. On the other hand, all those efforts to bring more sustainability in the textile world need to be saluted. However, they also need to be transparent so we, as the full horizontal supply chain and the final customer, understand what the remaining challenges are.

The Future of Smart Textiles

Anna Borkowicz, Team Leader - Market Intelligence, WTiN

Smart textiles products reportedly have huge potential to become the future of apparel, growing at double-digit rates. Given that consumers are becoming increasingly tech-savvy and require solutions that can seamlessly blend with their lifestyles, improve health, safety and living standard, there is great potential for innovative smart textile products within different sectors. This presentation will explore the future of smart textiles market by discussing the state of the market and industry, enabling technologies, challenges in development and commercialisation as well as business models opportunities.

Predictions for Smart Textiles in the 2020s

Raj Bhakta, Co-founder, Funxion

It's finally 2020 - we were promised flying cars, time travel, and vacationing in space. Although we are close to many of these technologies becoming realities, the world of textiles is slowly coming into the future. As we enter the next decade, mega-trends such as climate change, the need for passive remote health monitoring of our loved ones, and the continued smartness of everyday objects will push the need for innovation in the textile industry. In this presentation, Raj will relate some key predictions of what sorts of smart textile + e-textile product categories will be pulled by the market. Raj will also discuss the work being done to address these market opportunities in wearable technologies.

Brewed Protein as a Platform Towards Sustainable Textiles

Oliver Shafaat, Manager - Fibre R&D, Spiber

To find out more, please contact Akiyoshi Ohno at akiyoshi.ohno@gmail.com