

## TOPIC OF INTEREST: ADVANCED MANUFACTURING

**Advanced Manufacturing**, is the use of innovative technology to improve products or processes, with the relevant technology being described as "advanced," "innovative," or "cutting edge."

Advanced manufacturing industries "increasingly integrate new innovative technologies in both products and processes. The rate of technology adoption and the ability to use that technology to remain competitive and add value to define the advanced manufacturing sector."

Source: Wikipedia

**#DYK:** Singapore has committed to invest S\$3.2 billion in R&D in Advanced Manufacturing and Engineering. NTU is the Talent & Training partner for the Advanced Manufacturing Hub in Singapore and a key member in contributing toward the Jurong Innovation District.

**#nisthfellows** working in fields related to Advanced Manufacturing are CHEW Jia Wei, Hortense LE FERRAND, Subodh MHAISALKAR, SONG Juha, Madhavi SRINIVASAN, S VISWANATHAN and YEONG Wai Yee

### #nisthreads:

- [Machine Learning: An Advanced Platform for Materials Development and State Prediction in Lithium-Ion Batteries](#) (Madhavi Srinivasan)
- [Mathematical Models and Heuristics for an Inventory Routing Problem Without Split Deliveries](#) (S Viswanathan)
- [Electrically conductive hydrophobic membrane cathode for membrane distillation with super anti-oil-fouling capability: Performance and mechanism](#) (Chew Jia Wei)
- [Impact-resistant materials inspired by the mantis shrimp's dactyl club](#) (Hortense Ferrand)
- [Process-Structure-Properties in Polymer Additive Manufacturing. Polymers](#) (Yeong Wai Yee)
- [Slot-die coated methylammonium-free perovskite solar cells with 18% efficiency](#) (Subodh Mhaisalkar)

More details on our social media platforms this week:



## NISTH EVENTS



**NISTH ThinkOut: Covid-19: Emerging designs for resilient homes, offices, cities.** At last week's ThinkOut, panellists, **Asst Prof Felicity Chan** and **Assoc Prof Georgios Christopoulos** shared and discussed their views on how to physical and working spaces have been repurposed to tackle the new normal. If you missed joining us, you can now watch the webinar or listen to it on our YouTube and Podcast Channels.

**YouTube:** <https://youtu.be/RxNbjLZOxL0>

**Podcast:** <https://nisth.buzzsprout.com>

## EVENTS WITH NISTH IAB/FELLOWS



**30 Sep 2021; 3:00 PM – 4:15 PM**

**Singapore – France Malraux Seminar 2021 on “Reviving, Resetting and Sustaining the Arts and Culture Post Pandemic: The Power of the Digital”**, is organised by the Culture Academy Singapore. The seminar explores opportunities on how we can better engage our creative and cultural communities on cultural policymaking as well as discuss new ways to ideate and innovate. The keynote will be delivered by **NISTH IAB Member, Ms Chang Hwee Nee**, Chief Executive Officer, National Heritage Board. Join in to hear and discuss strategies to effectively operate in this new reality and explore the power of the digital.

Register: [Here](#)

## OTHER EVENTS



**28 Sept 2021; 4:00 PM – 5:00 PM**

**Maritime Innovation: How Science and Technology Are Transforming the Industry**, is presented by NISTH’s strategic partner, SGInnovate and French Chamber Singapore. Uncover innovative applications for the Maritime industry and how the future of Maritime will be transformed to further ensure people’s safety and reduce the risk of accidents related to shipping, machinery, component and structure maintenance, fuel consumption, and efficiency.

Register: [Here](#)



**30 Sep 2021; 12:30 PM – 1:30 PM**

**Rising To the Challenge: Strategic Leadership at a Beauty Giant in Turbulent Times**, is part of the NBS Knowledge Lab: Dean’s Distinguished Speaker Series. As the first female and Singaporean regional CEO of Shiseido Asia Pacific and an industry veteran with more than 20 years’ management experience at other beauty companies, Nicole Tan (NBS B.Bus. Class of 1997) will share her wisdom and insights into the dynamics of the global beauty industry, and leadership success factors in this period of unprecedented change.

Register at: [Here](#)

## GRANT / CHALLENGE CALLS

For assistance in identifying research partners, email us at [NISTH-research@ntu.edu.sg](mailto:NISTH-research@ntu.edu.sg)



**Sustainability Open Innovation Challenge 2021 - Round 1**

**Applications deadline: 24 October 2021**

Help build a brighter future for our planet with the Sustainability Open Innovation Challenge 2021! Enterprise Singapore (ESG) is collaborating with key industry partners to launch the third edition of the challenge with challenge statements in key sustainability areas such as sustainable materials, waste management, and sustainable food source.

More details : [Here](#)

## **Social Science & Humanities Research (SSHR) 2025 Seed Grant Call 2021 Applications deadline: 31 October 2021, noon**

CoHASS, RSIS, NBS and NIE have collaboratively launched the SSHR2025 Seed Grant. This is an annual grant call that aims to catalyse interdisciplinary research and position NTU at the forefront of research in the fields of arts, social sciences, humanities, education and business and lay the groundwork for larger external grant applications. Its focus is on 6 themes: Sustainability and Resilience, Culture and Creativity, Education and Transformation, Leadership and Disruptive Innovation, Human Behaviour and Technology and Language and Heritage.

**More details :** [Here](#)

**Email us at** [nisth-events@ntu.edu.sg](mailto:nisth-events@ntu.edu.sg); **Website:** [www.nisth.ntu.edu.sg](http://www.nisth.ntu.edu.sg)



SOCIAL SCIENCE & HUMANITIES RESEARCH (SSHR) 2025 SEED GRANT  
CALL 2021