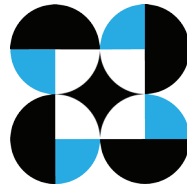


# dost digest

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10 years of bringing  
S&T good news

## Inside

DOST 's latest innovations for textiles to be featured at the S&T week .....	p2
39th Annual Scientific Meeting of NAST this year to focus on fisheries sectors .....	p4
InFocus.....	p4



Department of Science and Technology

in celebration of the



2017 National Science and Technology Week

the science for  
people



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World Trade Center, Pasay City  
11-15 July 2017

## DOST to stage “Science for the People” on S&T Week

By **ALLAN MAURO V. MARFAL**, DOST-STII

**G**et ready for an amazing science and technology (S&T) experience as the Department of Science and Technology (DOST) showcases the country's best in S&T research and services, interactive exhibits, and technology-aided entrepreneurship this coming National Science and Technology Week (NSTW). To be held July 11 to 15 at World Trade Centre in Pasay City, the NSTW aims to give the public a unique experience on how S&T work for a better life.

Carrying the theme “Science For The People”, this year's NSTW will highlight S&T services, products, and research outputs that help improve the life of every Filipino. The NSTW also features various activities such as science and technology forums, exhibits,

career talks, film showing, and journalism workshop.

“We celebrate the National Science and Technology Week annually to showcase the services and products of our scientists, engineers, researchers, inventors, and innovators,” said Sec. Fortunato T. de la Peña.

“This year's theme is ‘Science for the People,’ and we will highlight the practical use of various technological products and research outputs,” he added.

The NSTW is celebrated every month of July through Proclamation No. 169 of 1993. It aims to recognize the contribution of science and technology in the development of the country and garner support from the public and private institutions for its sustainable development.

The activities lined up for this year's NSTW are science and technology forums on agriculture, health, nutrition, disaster preparedness management, and manufacturing. Technology exhibits and launches, film showing, scientific career talks, science journalism writeshop, SETUP forums, and awarding ceremony are also included.

All forums will be held at Philippine Trade and Training Center while the exhibit areas will be located at the World Trade Center.

After the event, a series of regional science and technology fairs will also be held in every region in the country until December.

The 2017 NSTW is open to the public. For more information, please send your inquiry through [2017nstw@gmail.com](mailto:2017nstw@gmail.com).



Department of Science and Technology

in celebration of the



2017 National Science and Technology Week

# science for the people



## GENERAL PROGRAM OF ACTIVITIES

Time	Event/Activity	Venue	Lead Agency
<b>July 11 (Tuesday)</b>			
8:00 am - 12:00 nn	Opening Ceremonies <i>(by Invitation Only)</i>	World Trade Center, Pasay City	DOST-PCHR
1:00 pm - 5:00 pm	Viewing of Exhibits	World Trade Center, Pasay City	
1:00 pm - 5:00 pm	PBDIC Forum	Rooms A&B, PTTC, Pasay City	DOST-PCHR
1:00 pm - 3:00 pm	Itik Pinas	Room G, PTTC, Pasay City	DOST-PCAARRD
1:00 pm - 8:00 pm	PSTC Congress	Hotel Jen, Pasay City	Regional Offices
3:00 pm - 5:00 pm	NRCP Policy Forum	Room G, PTTC, Pasay City	
<b>July 12 (Wednesday)</b>			
8:00 am - 10:00 am	Tec Talk: Back Home	Rooms A&B, PTTC, Pasay City	DOST-SEI
8:00 am - 5:00 pm	Viewing of Exhibits	World Trade Center, Pasay City	
8:00 am - 3:50 pm	39th Annual Scientific Meeting	The Manila Hotel, Manila	DOST-NAST
8:00 am - 5:00 pm	JAAP Meeting and Symposium	Room G, PTTC, Pasay City	DOST-ITCU
10:00 am - 12:00 nn	<ul style="list-style-type: none"> <li>• Coral Research Towards Conservation (Sexual Production of Corals)</li> <li>• Assessment of Coral</li> <li>• Philippine Rise (Benham Rise)</li> </ul>	Rooms A&B, PTTC, Pasay City	DOST-PCAARRD
12:00 nn - 5:00 pm	Science Journalism Writeshop	Rooms A&B, PTTC, Pasay City	DOST-STII
<b>July 13 (Thursday)</b>			
8:00 am - 3:50 pm	39th Annual Scientific Meeting	The Manila Hotel, Manila	DOST-NAST
8:00 am - 5:00 pm	Viewing of Exhibits	World Trade Center, Pasay City	
8:00 am - 10:00 am	<ul style="list-style-type: none"> <li>• Increasing Brown Rice Quality Through Superheated Steam</li> <li>• GIS-Based Geo-Tagging Existing and Identification of Suitable sites for Cacao and Rubber Plantations</li> </ul>	Rooms A&B, PTTC, Pasay City	DOST-PCAARRD
8:00 am - 12:00 nn	NOVARTIS Biocamp	Room G, PTTC, Pasay City	DOST-PCHR
10:00 am - 12:00 nn	12-Horsepower Single Cylinder Diesel Engine	Rooms A&B, PTTC, Pasay City	DOST-MIRDC
12:00 nn - 3:00 pm	#EMERGENT: Artificial Intelligence Forum	Room G, PTTC, Pasay City	DOST-PCIEERD
1:00 pm - 3:00 pm	Auto-Parts Facility in support of the Components and Parts Manufacturing Sector	Rooms A&B, PTTC, Pasay City	DOST-MIRDC
3:00 pm - 5:00 pm	Coconut Somatic Embryogenesis	Rooms A&B, PTTC, Pasay City	DOST-PCAARRD
3:00 pm - 5:00 pm	Empowering Research and Industry Innovations thru World Class Testing Facility	Room G, PTTC, Pasay City	DOST-ITDI
<b>July 14 (Friday)</b>			
8:00 am - 5:00 pm	Viewing of Exhibits	World Trade Center, Pasay City	
<b>July 15 (Saturday)</b>			
8:00 am - 5:00 pm	Viewing of Exhibits	World Trade Center, Pasay City	

For inquiries, please visit: [www.nstw.dost.gov.ph](http://www.nstw.dost.gov.ph)



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SCIENCE AND TECHNOLOGY INFORMATION INSTITUTE



# DOST's latest innovations for textiles to be featured at the S&T week

By **LORAINÉ MANCIO CUEVA**, DOST-PTRI and **ALLAN MAURO V. MARFAL**, DOST-STII

**S**ome of the country's finest and most fabulous researches on the textile industry will be put on display in the upcoming 2017 National Science and Technology Week (NSTW) on July 11 to 15 at the World Trade Center in Pasay City.

During the five-day NSTW, the Department of Science and Technology-Philippine Textile Research Institute (DOST-PTRI) will show to the public the latest innovations, including technologies and products, that would help boost the country's growing local textile industry.

Anchored by their Lab to FAB (Fabric and Beyond) concept, DOST-PTRI will showcase locally-developed products and services including the Portable Therapeutic Handloom, Modified Handloom Weaving Machine, indigenous resources and natural fabrics, and other products from DOST-PTRI's Innovation Center for Yarns and Textiles (ICYT) and Regional Yarn Production and Innovation Centers (YPICs).

DOST-PTRI is poised to highlight its indigenous inputs, innovative technologies, and high-value outputs to give the public the chance to see and appreciate some of DOST-PTRI's work throughout the years. These products were borne out of PTRI's unyielding commitment and resolve to continue its mission of rejuvenating and revitalizing the country's textile industry.

The Portable Therapeutic Handloom is a PTRI-designed technology specialized for differently-abled persons, especially for paraplegics. Its distinctive feature is a hand-held lever that takes the place of pedals, to facilitate the interchange of harnesses during weaving of yarns. With this strategic mechanism, the handloom will now only require eye-hand coordination, streamlining the hand weaving process.

Meanwhile, the Modified Handloom Weaving Machine is attached with an alternative foot switch that allows direct winding of fabric onto the cloth beam, without requiring the weaver to stand. This increases the weaver's productivity. With the help of four harnesses and four pedals, the range of designs that can be produced using this model is also expanded. Its metal parts ensure durability and smooth operation; while its ancillaries – such as the bobbin winder, ratchet and pawl, and tension control – aid in overall efficiency.

The ICYT is a premier facility for innovating indigenous fibers and fiber blends for high-value



Two of the students from St. Francis School - VSA Arts demonstrate weaving using the therapeutic handloom machine. (Photos from DOST-PTRI)

yarns, fabrics, and related textile outputs. Fiber carding, blending, yarn spinning, handloom weaving, power loom weaving, and knitting are a few of the ICYT's specialized services.

The Regional Yarn Production and Innovation Centers are facilities that address the gap between agricultural inputs and end-users of textile products throughout the country. The project is seen to generate hundreds of jobs and encourage appreciation of local textiles, helping spur the revitalization of the textile industry.

Further, indigenous resources and natural fabrics are the core ingredients of the DOST-PTRI projects to optimize researches on Philippine tropical fabrics and natural dyes which are at par with the global market in the burgeoning Slow Fashion Movement and Cradle-to-Cradle Fashion concepts. DOST-PTRI has conducted more than 100 natural dye extractions and applications, with eight natural dyes developed for silkscreen printing; 30 for powder production; and 10 for upscale natural dyeing.

NSTW is celebrated every third week of July through Proclamation No. 169 of 1993. It aims to recognize the contribution of science and technology in the development of the country and garner support from public and private institutions for its sustainable development.

The activities lined up for this year's NSTW are science and technology forums on agriculture, health, nutrition, disaster preparedness management, and manufacturing. Technology exhibits and launches, film showing, scientific career talks, science journalism writeshop, SETUP forums, and awarding ceremony are also included.

Those who want to view the exhibits can

go to the main venue while those interested to attend the forums are advised to proceed to the Philippine Trade Training Center, which is just next to the World Trade Center.

All exhibits for 2017 NSTW is open to the public while science and technology forums will be by invitation only. For more information, please visit [www.nstw.dost.gov.ph](http://www.nstw.dost.gov.ph) and NSTW Facebook page at 2017NSTW or email at [2017nstw@gmail.com](mailto:2017nstw@gmail.com).

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# 39th Annual Scientific Meeting of NAST this year to focus on fisheries sectors

By **ROSEMARIE C. SEÑORA**, DOST-STII

**N**ow on its 39th year, the Annual Scientific Meeting (ASM) of the DOST-National Academy of Science and Technology (NAST) will be held on July 12-13, 2017 with the theme "Attaining Sustainable Development Goals: Philippine Fisheries and Other Aquatic Resources 20/20."

For this year, NAST PHL adopted the Sustainable Development Goals (SDGs) to be its overarching theme while the Agricultural Sciences Division of NAST, as the host division, agreed to focus on fisheries where science is critical.

This annual activity of the Academy aims to convene a conference to determine how the Philippines will achieve the SDGs and how the fisheries sector will impact the achievement of SDGs in the country.

Prior to meeting, the NAST has already conducted three regional scientific meetings: the Mindanao leg done last March 13-14 in Davao City; the Visayas Leg convened on April 18-19 in Cebu and the Luzon leg held May 15-16 in Baguio City.

Conducting the regional scientific forums, according to the DOST, is in line with President Rodrigo Duterte's thrust to reduce the inequality in the regions, and also to provide more income opportunities using research on science and technology.

Attaining Sustainable Development Goals  
PHILIPPINE FISHERIES AND OTHER AQUATIC RESOURCES 20/20



Earlier, NAST expressed its desire for a "blue economy" in the country. This refers to an economy that focuses on seas and oceans, and determining the sustainable management of marine resources.

"There are many untapped areas in the aquatic and fisheries industries," NAST acting president Fabian Dayrit emphasized during the Visayas regional meeting.

He also noted that aquatic resources are being used in pharmaceutical products.

NAST's annual scientific meetings started since 1978 and has since earned the distinction as the most prestigious Philippine scientific conference. It also serves as the leading forum for the presentation of results of scientific and policy research.



**DOST's Fault Finder.** Dr. Renato U. Solidum Jr., DOST Undersecretary for Disaster Risk Reduction and Climate Change announced the latest app developed by the DOST-Philippine Institute of Volcanology and Seismology (PHIVOLCS) that can determine the location of active faults. The app is part of DOST's disaster mitigation program in preparation for the so-called Big One, a strong earthquake with a possible magnitude of 7.2 that could affect Metro Manila and parts of Bulacan, Cavite, Laguna, and Rizal provinces. According to Usec. Solidum, any movement in the West Valley Fault trigger the occurrence of the Big One. Dr. Solidum was one of the speakers during the 17th Conference of the Science Council of Asia, an annual gathering of researchers and scientists from the ASEAN region. The event is co-organized by the DOST-National Research Council of the Philippines and the Science Council of Japan. (Text and Photo by **Rodolfo P. de Guzman**, DOST-STII)