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Pinoy inventors get low-interest funding of up to P12M from DOST-TAPI and LandBank

Text and Photo by Rodolfo P. De Guzman, DOST-STII

PASAY, Manila – Filipino inventors and innovators will now be getting financial support from the Department of Science and Technology-Technology Application and Promotion Institute (DOST-TAPI) in partnership with the Land Bank of the Philippines (LBP) through the Innovation and Technology (I-TECH) Lending Program under the Invention Guarantee Fund (IGF).

This special lending facility, launched formally on September 28, 2017 at the Philippine International Convention Center, is aimed at assisting inventors and innovators who are expected to be entrepreneurs with their financing needs to get their inventions commercialized. This initiative is implemented in accordance to the provisions of Republic Act No. 7459, more popularly known as the Inventor and Invention Incentive Act of the Philippines.

LBP, with more than four decades of rural financing experience, is an ideal partner of the DOST in helping inventors in their financial needs because both share the same goal of providing assistance to micro, small and medium enterprises (MSMEs) to where most of the inventor-entrepreneurs particularly in the provinces belong.

According to DOST-TAPI, with I-TECH, it will be easier for inventors to get funding to bring their invention up to the stage of commercialization. For its part, DOST-TAPI will assist by creating a new program for the business plan preparation.

“We welcome this partnership with the Land Bank of the Philippines because this will provide funding to inventors so that they can commercialize their inventions and so I have to give my advice to our inventors to come up with ‘Practical inventions’ that our consumers can really use so you can be successful entrepreneurs,” said DOST Secretary Fortunato T. de la Peña.

This innovative lending facility provides an “out-of-the-box” financing package



I-TECH lending facility for Filipino inventors. DOST Secretary Fortunato T. de la Peña welcomes the partnership of DOST-TAPI with the LBP to provide an affordable lending facility for Filipino inventors. Seated in the background are DOST-TAPI Director Edgar I. Garcia (right) and DOST-TAPI Invention Development Center Chief Science Research Specialist Atty. Marion Ivy D. Decena.

intended to serve patented Filipino inventors who want to commercialize their inventions provided through the facilities of the fourth largest universal bank in the country, the Land Bank of the Philippines.

The I-TECH Lending Program is unique in the sense that it shows the convergence of both the public and private sector working together to assist solely the Filipino inventors in terms of financing business operations or projects within the Philippines, said Secretary de la Peña.

According to DOST-TAPI Director Engr. Edgar I. Garcia, the lending program will be a big help for the inventor-entrepreneur because they can avail of a loan of up to P 12.5 million or up to the repayment capacity of the borrower, whichever is lower. Land Bank will put in 45 percent of the loan

equivalent to a maximum of P 5.625 million; TAPI-IGF will share 40 percent of the loan equivalent to a maximum of P 5.0 million and the Borrower’s Equity coming from the inventor-entrepreneur of 15 percent minimum, either in cash or in kind.

The loan can be used by the inventor to acquire fixed assets, capital expenditures, production materials, and working capital. The term of the loan can vary from as short as 360-day promissory note, three years for permanent working capital, or up to 10 years for fixed asset acquisition, capital expenditure, and production materials.

Also, the I-TECH program can extend special financing window to state colleges and universities with patented inventions and enterprises authorized by inventors

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Interactive learning tools wow studes, teachers in Ilocos Sur

Text by **Jasmin Joyce P. Sevilla**, *DOST-STII*

Photo by **Gerardo G. Palad**, *DOST-STII*

During the recently held Regional Science and Technology Week (RSTW) in Candon City, Ilocos Sur, the Department of Science and Technology-Science Education Institute (DOST-SEI) led a two-day interactive seminar from October 3 to 4 among public school teachers and students within the region. Spearheaded by Ms. Josephine S. Feliciano, science research specialist of DOST-SEI, the event featured virtual and augmented reality tools that can be used for a more effective and interactive way of teaching and learning.

Virtual reality (VR), by definition, is an artificial simulation or re-creation of a real-life environment or situation. Augmented reality (AR), on the other hand, shows the actual view of the real-world environment but with added or “augmented” computer-generated elements such as sounds, videos, and photos. Both of these technologies immerse the user by making them experience the simulated reality first-hand through visual and hearing stimulations.

According to Feliciano, these tools were initially introduced in gaming softwares and applications but they thought of incorporating it in teaching as well for a more fun, exciting, and interactive way of learning. She also explained in the seminar that these technologies are part of DOST-SEI’s Access to Resources and Innovations in Science Education



Ms. Josephine Feliciano shows a group of Grade VI students how to use a virtual reality box during the interactive seminar.

(ARISE) program. Launched in December 2015, ARISE is a 21st century ecosystem of learning environments, education, information and communications technology resources, and innovations that serves as a support to the K to 12 Curriculum and Science, Technology, Engineering, and Mathematics education.

In addition, Feliciano further explained that they do not need high-end devices as these tools would work even on cheap smart phones. “We don’t need to spend that much. We just need to be creative,” she said.

Aside from this, the most important part of it is not just the fun and interactive side of these tools, but its educational value which is best learned through experience. “What we want is to give the students the experience. It would help them retain the information if they actually experience it,” she emphasized.

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to use their patents through a Deed of Assignment.

“What is more attractive in the I-TECH Lending Program is its very affordable interest rates of only 5 percent per annum for the Land Bank Internal Funds and zero interest for the TAPI-IGF portion of the loan,” added Director Garcia.

According to LBP President Alex V. Buenaventura, the loan facility is very convenient for Filipino inventors to avail because of the more liberal requirements and this will open more opportunities for them to invent more. Buenaventura also added that the bank, together with DOST-TAPI, will help the inventors draw their business plans that would ensure the viability of their enterprise.

Land Bank, with 375 branches nationwide, 41 Lending Centers and 1,677 ATMs (as of 31 August 2017) will provide the needed boost for more inventors in all regions to avail of the financing facility. Land Bank has a total loan portfolio to MSMEs of P 65 billion or 13% out of its total loan portfolio recorded at P 597 billion as of June 30, 2017.

“The DOST is very confident that this program will truly help our Filipino inventors because it will now be easy for them to get funding for their inventions with the help of a very stable financial institution like Land Bank unlike before where there are limited means, so we are very optimistic that this lending program will be successful,” concluded Sec. de la Peña.

ABOUT US

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Framelia V. Anonas

Editor-In-Chief

Sheila Marie Anne J. De Luna

Managing Editor

James B. Intia

Layout Artist

Jasmin Joyce P. Sevilla

Proofreader

Allan Mauro V. Marfal

Circulation

Science and Technology Information Institute-
Department of Science and Technology
Bicutan, Taguig City
Metro Mla.1631
Philippines

www.stii.dost.gov.ph

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DOST-CALABARZON preps qualifiers to nat'l invention tilt

Text by Rosemarie C. Señora, DOST-STII

Photo by Gerardo C. Palad, DOST-STII



Lyle Christian Herbosa explains to DOST-CALABARZON Regional Director Alexander R. Madrigal (middle) and CvSU President Hernando D. Robles (right) his invention which seeks to address the problem of eggshell breakage by improving eggshell strength, eggshell thickness, and egg size and shape.

In preparation for the 2018 National Invention Contest and Exhibits (NICE), Department of Science and Technology-CALABARZON has selected the roster of participants from the region during the 2017 Regional Invention Contests and Exhibits (RICE) at the Robinsons Place Dasmariñas, Cavite last October 11-13, 2017.

With the theme "Science For The People: Fostering Inventions for an Innovative Nation," DOST-CALABARZON Regional Director Alexander R. Madrigal, in his opening remarks, highlighted the need of establishing valuable partnerships between the researchers or inventors and the private sector who has the capability to commercialize their research and inventions.

"With so many inventions and research and development activities, only two to three percent of them are actually commercialized," said Madrigal.

In spite of this, the regional director encouraged the participants to just continue making research that are for the good of the people and will eventually be noticed by interested investors.

Sibol Award (High School)

For the Sibol Award for High School category, the research by Kristianne S.J. Otiong and John Michael C. Pacis of Rizal National

Science High School entitled "Development of Low Cost Subcutaneous Vein Detector for IV Fluid Insertion (Veinuino) was declared the winner.

Their study led to an easier and innovative way to administer IV fluids to patients.

Sibol Award (College)

For the next category Sibol Award for College, the "MCU- Based Automatic Anti-Drunk Driving Device for Motorcycle" by Jerome D. Arenas and Jeanie Matibag of Lyceum of the Philippines University-Batangas emerged as the regional winner in the Sibol Award for college category.

The device is designed to help lessen motor accidents caused by drunk driving. It has multiple sensors in the helmet which aid in detecting whether the driver is under the influence of alcohol or not. The device is also equipped with global system for mobile module which is able to send short message service to the driver's intended receiver whenever the driver is detected drunk or has crashed.

Likha Award (Creative Research)

In the Likha Award for Creative Research category, the duo Irene Papa and Teofila Zulaibar from University of the Philippines Los Baños emerged as the regional winner for their research entitled "Development and

Utilization of Actinomycetes as Biocontrol Agents Against Panama Wilt Causing-*Fusarium oxysporum* TR4 in Cavendish Banana (ACTICon)".

The study was able to formulate a biopesticide which aims to combat *Fusarium* wilt that damages banana plants – a pathogen that is resistant to the commercially available chemical pesticides. The technology is a new formulation of a biocontrol agent that reduces the need for chemical pesticides, thus reducing the overall cost of production and diminishing the effects of chemical pesticides.

Outstanding Utility Model

For the Outstanding Utility Model category, there was no declared regional winner, though Alfredo Gonzales and Marcelo Gonzales bagged the first runner-up award for their invention "A movement Aiding Assembly for Orthopedic Patient."

RICE is a biennial event conducted through the DOST-Technology Application and Promotion Institute to provide a venue to sustain the generation of economically viable technologies and inventions and hasten the commercialization of inventor-generated technologies.

All winners received cash awards and plaques of recognition.

DOST partners with Singaporean organizations to strengthen food safety in PH

Text by Jasmin Joyce P. Sevilla, DOST-STII

Photos by Henry A. De Leon, DOST-STII

“We have an on-going technology revolution to address the country’s mounting issues on food safety,” said Department of Science and Technology (DOST) Secretary Fortunato T. de la Peña during the Food Safety and Technology Training Program and Media Event on October 24, 2017 at the Manila Hotel, One Rizal Park, Manila.

Spearheaded by DOST-IV-A (CALABARZON), the event was organized as a way of recognizing the technical assistance of TEMASEK Foundation International (TF) and Nanyang Polytechnic International (NYPi) in providing holistic technological training to the country’s food safety experts.

TF is a Singaporean philanthropic organization while NYPi is a renowned training institution on innovation and enterprise. These two organizations tied up with DOST to conduct a three-week training in Singapore last June on food control and food safety monitoring among selected representatives from the following institutions: 17 DOST regional offices and three DOST-attached agencies (DOST-Philippine Council for Industry, Energy and Emerging Technology, DOST-Food and Nutrition Research Institute, and DOST-Industrial Technology Development Institute; Department of Health; Food and Drug Administration, Department of Agriculture – National Meat Inspection Service; and National Food Authority – Food Development Center.

One of the main objective of the said training is to address the emerging national challenges in food and safety concerns. “We



DOST Secretary Fortunato T. de la Peña (middle), along with (from left) Undersecretary for Regional Operations Brenda L. Nazareth-Manzano, Undersecretary for Scientific & Technical Services Carol M. Yorobe, and DOST-IV A Regional Director Dr. Alex R. Madrigal, presents the token of appreciation to TF Chief Executive Benedict Cheong (second from left).

have to ensure safety at every segment of food preparation – the way food is produced, traded, and delivered to consumers, along with managing health risks and combating fraudulent practices,” added DOST Sec. de la Peña.

To help in this endeavor, DOST and the other agencies that were part of the training developed programs to further strengthen the assistance provided to micro, small, and medium enterprises through consultancy and laboratory testing for them to comply with international food standards.

During the media event, selected participants from the training shared the actual outcome of their respective programs and how these programs helped address food safety concerns in the country.



“It was more than just a training program. We learned from the participants as much as they learned from us,” says TF Chief Executive Benedict Cheong as he congratulates DOST and the participants on the success of their training with them.

inFOCUS



Her heart for coffee. Zita Degay (2nd from right), owner of Magallaya Mountain Specialty Coffee, presents her specialty product to DOST Secretary Fortunato T. de la Peña (second from the left). Together with DOST-CAR Director Victor Mariano (rightmost) and DOST-CAR Assistant Regional Director Nancy Bantog (leftmost), she recalls how DOST helped in improving her business from cooling to packaging. Degay’s store is one of the DOST-assisted projects that Secretary de la Peña visited during the celebration of the Regional Science and Technology Week at PLGU Astrodome, Tabuk City, Kalinga last October 10-14. (Text and Photo by Kimverlyn C. Sayson, DOST-STII).