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MULA_KAY

Ating salubungin ang taong 2021 na may kagalakan at pasasalamat sa ating mga puso; dahil sa awa ng Panginoon, nalagpasan natin ang matinding unos ng pandemya nitong nakaraang taon!

Nakalathala dito sa Healthscape ang iba pang mahahalaga at nakatutuwang mga pangyayari sa pagtatapos ng 2020 kung saan ipinagdiwang natin ang Science and Technology Week. Ang mga teknolohiya na inilahad ng koponan ng UP SIBOL COVID-19 ay malaki ang maitutulong sa ating patuloy na pakikibaka laban sa COVID. Ang mga ito ang nagbibigay sa atin ng malaking pag-asang harapin hindi lamang ang kasalukuyang pandemya kundi pati mga darating na pagsubok sa hinaharap.

Dito pa rin sa pagdiriwang ng Science and Technology Week, nakapanayam natin ang mga kasosyo ng UP Manila sa gobyerno at pribadong mga kumpanya na nakahandang tumulong sa patuloy nating pananaliksik ng mga gamot, kagamitan, at pangtesting ng mga sakit. Nakahanda silang isalin sa pangkomersyong porma ang mga matagumpay na resulta ng lahat ng ating mga programa.

Nangunguna na rito ang GenAmplify rRT-PCR test kit na mula sa ating National Institutes of Health. Ang balitang mas maraming ospital at laboratoryo sa bansa ang gumagamit nito dahil sa mababang halaga at mapagkakatiwalaang resulta nito ay nagbibigay sa ating komunidad ng malaking karangalan at dangal!

Sa gitna ng lahat ng nakatutuwang mga pangyayaring nabanggit, naririto pa rin ang COVID; ngunit hindi titigil ang ating pagpupunyagi upang talunin ito. Patuloy ang mga *webinars* kung saan tinatalakay ang pinakabagong kaalaman at siyensiya ng SARS-CoV-2 na ngayon ay may bagong *variants*; at hikayatin ang lahat na ipagpatuloy ang mga pamamaraan upang masugpo ito. Mababasa rin dito ang karanasan ng mga Barangay Health Workers sa Bagong Silang, Perez, Quezon Province na lalong nagpapaigting sa pangangailangang matigil na ang pandemyang ito.

Ang UP Manila ay tinitingala sa larangan ng siyensiyang pangkalusugan ngunit tayo ay nakikilahok din sa kabuuang kalusugan ng bayan; kung kaya't mayroong tayong pahayag patungkol sa nagaganap sa ating bansa.

Hinihimok ko ang lahat sa ating pamilyang UP Manila na pag-ibayuhin pa ang pagsusumikap na talunin ang *virus* na ito gamit ang ating pagkakaisa, talino, agham, at mga puso; habang ipinagpapatuloy ang mataas na antas ng ating pagtuturo at serbisyo sa ating mamamayan. Nawa lagi tayong patnubayan ng Maykapal ngayong 2021.



Official Statement of the UP Manila Faculty and Officials on the Abrogation of the UP-DND Accord

We, members of the faculty and officials of the University of the Philippines Manila, are one with the studentry and UP community in expressing our condemnation of the immediate termination of the UP-DND Agreement executed between former U.P. President Jose Abueva and the Department of National Defense on June 30, 1989, pertaining to the conduct of operations of uniformed forces in any of the U.P. campuses.

Forged in the spirit of upholding academic freedom and preserving U.P. autonomy, the Accord was intended to shield the University from State intervention, arbitrary arrest, and violence.

The UP-DND Accord remains highly relevant under the current circumstances. Under a militarized and repressive environment, the Accord provides the University with a tool to protect its constituents and its institutions from external interference and the threat of violence, especially emanating from the State. The Accord has contributed in the preservation of the University's intellectual independence. It has been valuable in maintaining the University as a bastion of critical thinking and dissent against repression and authoritarian rule.

The unilateral decision of the DND under the leadership of Secretary Delfin Lorenzana is highly unacceptable and cannot be forcibly imposed on the University of the Philippines, the national university of the country. Claiming that the Accord has served as a "hindrance in providing effective security, safety, and welfare of the students, faculty, and employees of UP" is certainly an empty assertion and cannot be used as justification over this arbitrary action. On the contrary, the termination of the Accord will make University constituents vulnerable to State attacks and various forms of human rights violations.

We call on the U.P. Manila constituents to unite and express our indignation over the unilateral termination of the UP – DND Accord.

No to State Intervention and Interference!

Uphold the Right to Freedom of Expression and Assembly!



UP SIBOL COVID-19 technologies highlighted in S & T Week

The celebration of UP Manila's Science and Technology Week 2020 featured the technologies developed by the UP Surgical Innovation and Biotechnology Laboratory (SIBOL) in a forum held on December 7, 2020. SIBOL is a collaboration of not only multidisciplinary fields but of different UP campuses and other stakeholders to develop technologies that improve patient outcomes.

In her opening remarks, Chancellor Carmencita Padilla said that the need for locally-made devices cannot be overemphasized for more accessibility to hospitals in the country.

UP College of Medicine Dean Charlotte Chiong, for her part, took this initiative as her administration's flagship program with a 190-million grant from DOST-PCHRD. With the country's frantic call to respond to the COVID-19 pandemic, SIBOL quickly rose to the occasion and by March 22-23, 2020, it became the UP SIBOL-COVID Task Force.

With a renewed sense of mission, the program focused on three aspects— Protect, Disinfect, and Distance. Soon enough, new projects quickly blossomed to fill the gap between what the country needed and the lack of resources available at hand.

Here are the SIBOL COVID-19 projects presented during the first part of the forum:

Personal Protective Equipment Projects

Powered Air Purifying Respirator (PAPR) by Dr. Samuel M. Grozman, Dr. Eng. Magdaleno R. Vasquez, Jr., and Engr. Miguel O. Aljibe, MD. This is a closed loop air purifying system with multiple sensors to monitor the user. They identified that existing respirators in the market were expensive, of high maintenance, and had issues with communication. Also, most PAPR in the market are open-loops or not adjustable and only provide filtered airflow. The SIBOL design is a closedloop system that provides not only filtered air but also adjustable settings for more comfort and adequate airflow.

PPE: Reusable Face Masks by Dr.

Manuel C. Jorge II and Engr. Leslie Joy L. Diaz. The project's goal is to produce a commercially viable mask that is certified to be of N-95 quality that fits the Filipino face and is ergonomic, reusable, and biodegradable. In collaboration with the UP Diliman College of Engineering's Department of Mining and Metrological and Materials Engineering, they developed the biodegradable nonwoven nanofiber membrane. The UPD College of Fine Arts' Department of Visual Communication designed the masks while the College of Medicine and PGH, the end-user of the masks, were tasked with field testing. The project has been approved by DOST-PCHRD for funding while the UP Manila Ethics Board has given its technical approval for the project.

Disinfection Projects

Cleanintubate by Dr. Catherine S. Co, Dr. Ma. Teresita B. Aspi, Engr. Jason Pechardo, and Engr. Eduardo R. Magdaluyo, Jr. This is an economical and less laborious way to disinfect a laryngoscope used for intubating a patient which is a high-risk activity for aerosol generation and virus transmission. More so, the laryngoscope is a critical equipment that requires a very high level of disinfection. The tedious process of cleaning and disinfection puts the medical personnel at great risk of contamination. Available disinfecting no-touch systems in the market are very expensive. Cleanintubate is a minimal touch design, automated, and triggered only by a single touch.

PPE Disinfection by Dr. Emmanuel P. Estrella, Dr. Eng. Magdaleno R. Vasquez, Jr., and Mark D. Ilasin. This project was also borne out of the shortage of masks for healthcare workers (HCWs). The team's first prototype was a clear decontamination oven equipped with ultraviolet C and hydrogen peroxide vaporizer. Postdecontamination viability tests such as physical and chemical changes, filtering capacity, and fit test were conducted. What is very promising with this decontamination oven is its usefulness in disinfecting overalls, goggles, face shields, and other instruments.

Telemonitoring Projects

E-Steth by Dr. Michelle Cristine B. Miranda and Engr. Charlestone M. Ambatali. An acoustic stethoscope is fundamental and imperative in diagnosing patients, but HCWs had to stop using this instrument as it requires physical contact between the patient's chest and the HCW's ears which may compromise the integrity of the hazmat suit. A commercial solution is an electronic stethoscope that is expensive (with a price range of P40,000-50,000). The home-grown E-steth is a cost-effective hybrid of acoustic and electronic stethoscope that can still deliver the same efficacy as the high-end product.

Customized Pillow for Pregnant Patients with COVID-19 SARS Infection by Dr.

Maria Antonia Habana, Engr. Louis Danao, Dr Julieta Germar, Dr. Angela Aguilar, Dr. Ruth Padua, and Dr. Albert Albay. This project was inspired by a pregnant COVID-19 patient admitted to PGH. Due to her big breasts and abdomen, the team of healthcare workers had a difficult time putting her in a prone position after intubation. The team had to stack pillows to protect her belly. Thus, the specialized pillow was created to allow for a comfortable and safe prone position for pregnant women. A second prototype has already been evaluated by simulation and will soon undergo proof of concept testing. January Kanindot



UPM's SARS- CoV-2 PCR kit supports government's national testing efforts

Filipino scientist and UP Manila researcher Dr. Raul Destura who developed the local SARS-CoV-2 GenAmplify™ rRT-PCR test kit revealed during a forum that more laboratories are now using the local kit because of its lower price at P800 and high comparative concordance test results with foreign kits.

At the forum tackling the UP Manila PGH response to the COVID-19 pandemic held as part of the Science and Technology week, the director of the National Institutes of Health's National Training Center for Biosafety and Biosecurity said that the further reduction of the cost from the initial P1100-1220 per test to less than P800 pesos were made possible due to the continued support of local testing centers by catering to the local kit. This is because they are now able to order more and negotiate for a lesser price. "Each time we succeed in reducing the price, we translate it directly to the cost of the technology," he added.

Concordance analysis studies done by independent laboratories through the support of the Department of Science and Technology compared the GenAmplify[™] kit with other FDAapproved RT PCR kits. Results showed a kappa value of 0.866 demonstrating an almost perfect agreement within the ideal range of 0.81 to 1.00. Dr. Destura revealed that a lot of laboratories have already utilized the GenAmplifyTM COVID-19 rRT-PCR kit for proficiency testing and all of them or 100% passed the first time they submitted the results to the Research Institute for Tropical Medicine.

"In our design, we wanted it to be quicker and easier to use that's why it's a one-step RT PCR kit development; in the laboratory, you just have to add the solution once the RNA is extracted and then run the PCR," Dr. Destura explained. He added that the GenAmplify[™] COVID-19 rRT-PCR kit Version 2.0 was created because Version 1.0 had problems with contamination coming from raw materials from supplier.

The Manila HealthTek Incorporated, the first University of the Philippine's spin off company founded by Dr. Destura for the manufacture of his Biotek-M[™] dengue aqua testing kit, is currently able to produce 8,000 to 10,000 GenAmplify[™] COVID-19 rRT- PCR kits per day using an automated system that allows it to respond to the needs of the market. It distributes to many COVID-19 testing facilities all over the country.

With increased use and recognition of the GenAmplify[™], Dr. Destura

COVID-19 vaccines COVID-19 vaccination is an important tool to help stop the pandemic

Wearing masks and social distancing help reduce your chance of being exposed to the virus or spreading it to others, but **these measures are not enough**.

Vaccines will work with your immune system so it will be **ready to fight the virus** if you are exposed. underscored that catering to Filipinobased technologies would not only provide Filipino scientists more opportunity to hone their skills in diagnostic technology research but will also improve our country's competitiveness in the regional and global biotechnology landscape and help accelerate the growth of the health biotechnology ecosystem in the country.

"Ultimately, if more biotech industries are being generated in the Philippines, it can support the macroeconomic growth of the country and provide job opportunities related to science and technology for our young talented graduates, instead of them leaving the country," he declared.

The multi-awarded scientist disclosed that they are now filing for a pre-analytic technology platform and will undergo field testing within the next two weeks for the SalivaFAST[™] COVID-19 Selfcollection saliva kit to be partnered with the GenAmplify[™] COVID-19 rRT-PCR kit. This version used a different formulation of the saliva technology called the SalivaFAST[™] which will remove a lot of steps and can run a direct PCR detection.

According to him, this innovation is very convenient even for people at home to self-collect the platform and the solution is stable enough under room temperature for 14 days. As soon as field studies are completed, they will apply for FDA certification and once approved, they can release the kit sooner with the cost utilization part dramatically lowered further as it will remove a very crucial step which is the RNA extraction. Charmaine Lingdas





From left, Dr. Jaime Montoya, Dr. Francis Wade Gomez, Atty. Rowel Barba, Engr. Edgar Garcia.

Funding agencies, govt and industry partners recognized for advancing health research and translation

The online celebrations of the 2020 Science and Technology Week from Nov. 24 to Dec. 4, 2020 were opportunities to showcase UP Manila's health technologies and innovations and compliment its funding agencies and partners.

In turn, representatives of partner entities reaffirmed support for the UPM researchers who develop new technologies that benefit the people and the need for tie ups in scaling up their innovations. Speakers also shared insights on technology translation, commercialization, and intellectual property protection.

"We look forward to more fruitful years of collaboration with each of you amidst this pandemic. Let us become partners towards ensuring the Filipinos' optimal health by making these technologies accessible and available to all Filipinos," UP Manila Chancellor Carmencita Padilla stated in all the events.

Presenting the landscape of health research in the country during the Teknolusugan 1 that showcased UPM's herbal technologies, Dr. Jaime C. Montoya, Executive Director, Philippine Council for Health Research and Development (PCHRD), stated that funding for research and development has significantly grown from 2014 to 2019. He cited that funds allocated for Research and Development, capacity building, research dissemination and utilization have expanded to include drug discovery and development through diagnostics, biomedical engineering and other health technologies. These include Omic technologies for health, functional foods, nutrition and food safety, information and communication technologies for health disaster risk reduction, climate change

adaptation for health, and mental health.

The PCHRD also granted scholarships for the MD PhD, a program pioneered in the Philippines by the UP College of Medicine. Montoya enumerated recent R and D projects that DOST supported, such as the **Biotech-M Dengue Aqua kit, Axis Knee System,** and **GenAmplify COVID-19 Test Kit**.

Representing the industry sector, **Dr. Francis Wade Z. Gomez**, President and CEO of New Marketlink Pharmaceutical Corporations, shared his experiences in the technology transfer of *Lagundi*, one of several herbal medicinal plants studied by NIRPROMP researchers and commercialized into cures for common ailments.

"It was not as simple as buying the raw materials from international market suppliers. We had to buy the seedlings and make sure they are the correct variety. After propagating the seedlings, we plant them in large hectarage that will entail 9 to 12 months to harvest significant volumes per plant," recounted Dr. Gomez. After producing the pilot product, it must go through a stability study for six months, accelerated stability studies, and other quality assurance tests in the next months before submission to the Food and Drug Administration.

He mentioned the challenges in commercializing herbal medicines, such as some specialty societies not viewing medicinal plants in the same level as synthetic drugs. Understanding the target market, finalizing the pricing before finalizing the marketing plan, understanding the distribution, and continuing research should be part of the marketing study.

Intellectual Property Protection

During the Teknolusugan 2 that showcased UP Manila's biomedical and COVID-19 technologies, Atty. Rowel Barba, Intellectual Property Office Philippines Director General, highlighted the need at this time of the pandemic to invest in health that is relevant and impactful to spark change. "We need to scale up our quality of living and lead healthier and better lives," citing some devices produced by UP Manila, such as the test kits that contributed enormously to prevent the spread of the virus.

He lauded the technology presentation event for generating interest in emerging areas of research with consequent gains in research funding, job creation, scope and quality of innovations and creation and growth of industries and economic sustainability of universities.

"Protecting intellectual assets will pave the way for a stronger regime that will attract more investors and researchers to develop more IPs and open up more markets and more IP assets, where our industries can invest. Protection of truly useful technologies will definitely help our Filipino inventors secure a steady source of livelihood, especially in this time of global crisis when we have seen a wealth of innovations on health," he declared.

For his part, **Engr. Edgar Garcia**, Technology Application and Promotion Institute (TAPI) Director, discussed briefly the legal frameworks of technology commercialization as basis for the functions of TAPI. The Institute safeguards the implementation of Republic Act 10055 or the Technology Transfer Act of 2009. Under this Act, the DOST regional offices create a Fairness Opinion Board **TURN TO PAGE 5**

EDITORIAL BOX

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New COVID-19 variant more transmissible but no impact on disease severity or vaccine efficacy

Preliminary epidemiologic indicators cited by Dr. Marissa Alejandria, president of the Philippine Society of Microbiology and Infectious Diseases, suggest that the SARS-CoV-2 variant B.1.1.7 detected by the Philippine Genome Center from a returning Filipino from the United Arab Emirates is associated with increased transmissibility. Currently, there is no evidence indicating that this variant has any impact on disease severity or vaccine efficacy.

Dr. Alejandria who is also the Director of the UP Manila National Institutes of Health's Institute of Clinical Epidemiology, presented this update during the 36th *Stop COVID Deaths: Clinical Management Updates Webinar* held on January 15, 2020. The topic was "Are You Afraid of the COVID-19 Mutations and Variants? A Public Health Perspective."

The infectious disease specialist cited a January 13, 2020 PGC press release confirming the presence in the country of the variant following strengthened biosurveillance and border control efforts that led to the contacting of the person's co-flight passengers.

"The SARS-CoV-2 is an RNA virus and mutations arise naturally as the virus replicates. Many thousand mutations have arisen and the vast majority have no effect on the virus but are useful as a barcode to monitor outbreaks. The more viruses circulate, the more they may change and the changes can occasionally result in a variant that is better adapted to its environment," Dr. Alejandria explained.

Using the definitions of Lauring AS and Hodcroft EB in JAMA 2021, she desribed a variant as a strain that has a demonstrably different phenotype (i.e difference in antigenicity, transmissibility, or virulence) and mutations as actual changes or errors in the sequences as the cell copies the genome.

Silent mutations don't change the resulting protein while non-silent mutations do change a protein sequence. Proteins are long chains of amino acids folded into different shapes. Each amino acid is encoded by three genetic letters but in many cases, mutations in the third letter of a trio will still encode the same amino acid.

Dr. Alejandria identified the following as potential consequences of emerging variants: ability to spread more quickly in people, ability to cause either milder or more severe disease in people, ability to evade detection by specific diagnostic tests, decreased susceptibility to therapeutic agents such as monoclonal antibodies, and ability to evade natural or vaccine-induced immunity.

She noted that most commercial PCR tests have multiple targets to detect the virus such that even if a mutation impacts one of the targets, the other PCR targets will still work. She affirmed that both vaccination and natural infection produce a polyclonal response that targets several parts of the spike protein. The virus would likely need to accumulate multiple mutations in the spike protein to evade immunity induced by vaccines or natural infection.

She assured vaccine effectiveness even for the new variant, pointing out that the new variant has mutations to the spike protein that the three leading vaccines are targeting. However, vaccines produce antibodies against many regions in the spike protein so that it is unlikely that a single change would make the vaccines less effective.

But she acknowledged that over time, as more mutations occur, the vaccine may need to be altered, as what happens to the seasonal flu which mutates every year so the vaccine is adjusted accordingly. The SARS- CoV-2 virus does not mutate as quickly as the flu virus and the vaccines that have so far proved effective in trials are types that can easily be tweaked.

Both Dr. Alejandria and the succeeding speaker Dr. Evalyn Roxas, associate professor at the UP College of Public Health and president of the Philippine Hospital Infection Control Society, tackled the public health aspect and professed that since the modes of transmission are the same which are respiratory droplets and aerosols, the precautionary measures are the same. But discipline is needed for a stronger and more sustained compliance with protocols such as environmental and hand hygiene; wearing of mask, faceshield, and other PPEs; physical distancing; avoiding crowded or closed spaces; and avoiding prolonged closed contact interactions.

The webinar's reactors were Dr. Juan Javier Garchitorena, Unit Head of the Provincial COVID-19 Facility and a Doctor to the Barrios frontliner of the Dinagat Islands and Maria Fatima Lorenzo, President of the Philippine Alliance of Patient Organizations. CPH Dean Dr. Vicente Belizario, Jr. and UP Manila Chancellor Carmencita Padilla gave the opening and closing remarks, respectively. Cynthio M. Villomor

FUNDING AGENCIES FROM PAGE 4...

(FOB) to evaluate technologies for commercialization. Based on this evaluation, a Fairness Opinion Report (FOR) is prepared and forwarded to TAPI for the drafting of the written recommendation to be signed by the DOST Secretary. In 2020, TAPI issued 38 recommendations from 38 FORs endorsed by the FOB. Cynthia Villamor & Charmaine Lingdas

BHWs share stories as COVID-19 frontliners

Most vulnerable to contracting COVID-19 are public health workers including barangay health workers (BHWs), who are at the frontlines of the battle against the pandemic. At the onset of the community quarantine, BHWs were among the first to be mobilized by the government.

Following are accounts of the experiences and struggles of the BHWs, as gathered by the research staff of RESPOND Philippines or Responsive and Equitable Health Systems – Partnership on Non-communicable Diseases being implemented by UP Manila and the London School of Hygiene and Tropical Medicine.



Victoria Mendenilla, a BHW for 24 years in Bagong Silang, Perez, Quezon, recounts the day an emergency meeting was called in March as the start of a more challenging work for her and colleagues. Having a hypertensive husband made it more difficult to balance her responsibilities.

"Inabot kami ng ala-siyete ng gabi sa meeting. Naabutan ko ang asawa kong tulala, dinobledoble ang inom ng gamot." To ensure this will not happen again, she checks her husband's blood pressure and prepares his medicine before reporting to work. Before the pandemic, BHWs in Perez are working two to three days a week. Now, they attend to their duties almost every day to take care of persons under monitoring (PUMs).

As a low-income island community, access to health services even before the pandemic was already a challenge in Perez and COVID-19 places a huge stress on their already strained resources, especially when needed medical services could not be provided. They have to endure hours of travelling to get to the nearest hospital in the mainland Quezon Province.

In addition, most of her colleagues have to get extra jobs to earn additional income to their P1,200 monthly honorarium. As a consequence, some of them could not focus on their duties. By virtue of Administrative Order 26, BHWs received P2,500 worth of COVID-19 hazard pay in June 2020.

For someone with more than two decades of serving as a community health worker and leader, Victoria calls for adequate facilities in their health center, additional compensation for BHWs, and protection for them, especially during the pandemic.



A BHW for 9 years in Perez, Quezon Province, **Minda Alpuerto** is afraid of contracting the disease, especially for them who live in their island. Aside from being expensive, getting to the nearest hospital with adequate facilities would entail hours of travelling.

Six months after the March lockdown, Minda's fear became real. A niece who lives next-door was traced to have interacted with an infected person from a neighboring community. Minda and her family were put on a mandatory 14-day home quarantine as PUMs. With her family relying only on fishing aside from her P1,200 monthly honorarium as a BHW, Minda's husband was forced to fish daily during their quarantine period even if untested. "Wala pong choice. Wala kaming kakainin. Mamamatay kami sa qutom." Sewing and repairing clothes helped her earn an extra income. But one thing was clear: for a family without a stable source of income, starving to death is more dreadful than contracting the virus.

After completing home quarantine, Minda was happy to be back at her BHW duties. But only a month after, her daughter working as a babysitter tested positive for COVID-19 having contracted the disease from her employer working in the municipal office. After getting positive results, they had to quarantine again.

Still, Minda realized how hard it is to be

isolated without assurance of surviving the deadly virus, while anxious of how to provide for the family needs. She sees the urgent need of providing adequate assistance for quarantined families, especially for frontliners like BHWs, and a safe source of income within their homes.



Dexcelyn Talisay, mother of three, has been a barangay health worker (BHW) in Perez, Quezon Province for more than 4 years. When COVID-19 lockdowns were imposed in March 2020, she was tasked to keep track of PUMs arriving from outside their community, checking their temperature and ensuring their compliance with quarantine protocols. These are on top of her BHW duties, such as monitoring hypertensive senior citizens and facilitating a feeding program for malnourished children.

During the first weeks of lockdown, they even had to provide protective equipment for themselves as face masks, face shields, and alcohol were given late. Despite having additional tasks and responsibilities and being vulnerable to contracting the disease, they do not receive additional compensation except for the P2,500 hazard pay. While grateful, she admits that this is not enough. "Nagpapasalamat po kami pero talagang hindi pa nga iyon umabot ng two weeks kasi buhat ng maglockdown, yung asawa ko ay nawalan ng trabaho." She had to find ways of earning extra, such as doing online selling.

The lack of testing for frontliners makes Dexcelyn anxious for her family's safety whenever she gets back home from work. Considering their crucial role in delivering national health programs and policies at the grassroots level, she is even more inspired to effectively perform her job, especially during this health crisis. *"Mas dapat gampanan 'yung trabaho namin, mas kaming nasa barangay ang inaasahan ng RHU."* Summarized by Cynthia Villamor