### Report of Program Completion

# APT Young Professional and Students Programme (APTYPS) for Fiscal Year 2022 Topic: "Capacity building in the subject of Coding skill"

Reported by NT Academy, National Telecom Public Company Limited, Fund recipient

#### **Executive Summary**

The APTYPS for the fiscal year 2022 chose NT Academy, National Telecom Public Company Limited, to build capacity on the coding skills for students in grades 3-6 in Chang Mai Province, in the north of Thailand. The APTYPS activity was carried out as planned on November 11, 2022, at Wat Si Don Chai Municipal Community School, Chang Klan Subdistrict, Mueang Chiang Mai District, Chiang Mai Province. There were total of 55 participants, 44 students and 11 teachers, from 11 schools participating within this program. The result of this program activity showed that students enthusiastically learned how to write a program to command the robotic experimental kit to do various activities. Students practiced on skills of the logical thinking process to design set of code commands to perform tasks and loaded those sets of commands for the robotic experiment kit to execute. Additionally, the students practiced digital skills related to coding, serving as the foundation for the learning of computer program in the future. Achievements are in line with the project plan. All participants, both student and teachers, were satisfied at the highest level. They all hope that there will be an opportunity again in the future to get chanced to attend such training.

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#### Concept Note

With the current world situation, we are entering a digital society with the introduction of digital technology to design and create new innovative services, to be used in business sectors and human living, as the substitution of the traditional analog practices. Previously, many businesses could not survive in business competition, due to new innovations aiming to replace the old fashion ways. For example, film camera and film business were replaced by digital cameras, the newspaper business was disrupted by online news via the Internet, music tape and movie disc (DVD) business including movie theater business were also disrupted by music downloads and Video-on-demand services on the web. Digital services were created to replace old-fashioned services. The COVID-19 epidemic, during 2020-2021, has been a major economic catalyst for the introduction of digital technology to be practiced in daily life, which created new digital businesses on the platform, such as food ordering from Grab Food, working with ICT Platform as the work from home policy, etc.

Hence, digital skills are essential and necessary in training and developing students in Thailand to have the opportunity to access and learn, to prepare themselves for entering the digital society that needs personnel with digital knowledge and skills to create new innovations. The APTYPS for the fiscal year 2022 has chosen NT Academy, National Telecom Public Company Limited, to build capacity on the coding skills for students in grades 3-6 in Chang Mai Province, in the north of Thailand. The expected result is that students would have knowledge and a better understanding of how to write simple coding by using a robotic experiment toolkit. The program objectives will be in line with the APT Strategic Plan of the year 2021-2023, aiming to promote the potential of students, Thai youth, in the fields of ICT. These would be the important role of APT, as the organization of the telecommunications Technology and the Information and Communication Technology in the Asia-Pacific region, to support the capacity building of Thai youth for the fundamental practices to further develop themselves as a better human resource of the country for the future digital society.

#### Activity Objectives

The program has learning objectives as following:

- 1. To provide students in grades 3-6 in Chang Mai Province, in the north of Thailand the skill training to gain their basic knowledge of computer coding.
- 2. To provide students in grades 3-6 in Chang Mai Province, in the north of Thailand the broad skill development of coding with the help of a robotic experimental toolkit, in addition to what they have learned in the subject of computational science offered by the state curriculum.

#### Planned Program Activity

The project was conducted as a training activity in the classroom manner at Sridonchai Municipality Community School, Mueang Chiang Mai District, Chiang Mai Province, to train students at grade 3-6 the theory and practice of basic coding with a robotic experimental toolkit for 1-day training duration.

#### Target Group

Primary school students at grade 3-6 in the northern provinces, of whose their school is lacking of knowledge and toolkit for efficiently teaching in the field of Coding.

After the program got approved, NT Academy, with the cooperation with NT Coordination team, surveyed the school in Chang Mai Province where it had enough computers to support the training and then asked all schools in Mueang Chiang Mai District, Chiang Mai Province to send their one teacher and four students to attend the training program.

Sridonchai Municipality Community School was selected as the training venue, and 11 schools that wanted to participate the program.

#### Training venue

Sridonchai Municipality Community School, Mueang Chiang Mai District, Chiang Mai Province

## Activity Plan

This project had a activity plan to be executed within a period of approximately 4 months from the date the project was approved. However, the execution of the activity plan was delayed from originally planned, due to the major cluster of the spread of COVID in schools during that period all over Thailand.

Program activities	Apr.	Jul.	Oct.	Nov.
The approval of the APTYPS-2022	8/04			
Select the training venue and schools to participate the program		Х	Х	
Prepare the lessons and the robotic experimental toolkits			Х	
One day training				11/11
Program evaluation and report the program completion to APT				Х

#### Training Agenda

08.00 - 08.30	Registration
08.30 - 09.00	Opening Ceremony and Welcome Remarks by
	Mr. Liu Ziping, Deputy Secretary of APT (Zoom)
	Mr. Sunthorn Yamsiri, Deputy Mayor of Chiang Mai Municipality
	Dr. Surachai Anutragulchai, Deputy Chief Executive Officer, National Telecom PLC.
	Group Photo
09.00 - 10.00	Introduction of Robot Toolkit Set
	By Instructor Team from National Telecom PLC.
10.00 - 12.00	Coding Workshop with Robot Toolkit Set
	By Instructor Team from National Telecom PLC.

- 13.00 15.30Coding Workshop with robot toolkit set (Continued)By Instructor Team from National Telecom PLC.
- 15.30 16.00 Summary and Closing Ceremony ByMr. Sunthorn Yamsiri, Deputy Mayor of Chiang Mai MunicipalityGroup Photo for receiving the certificate of achievement

Note:

- 1. Break for snacks and beverages from 10.30 10.45 and 14.30 14.45
- 2. Lunch break from 12.00 13.00
- 3. The agenda is subject to change as appropriate

#### **Program Partners**

There were 3 major partners that helped the succession of the program, namely

1. Deputy Mayor of Chiang Mai City, who is responsible for the education of students in the area of Mueang Chiang Mai District Chiang Mai Province. He would support in organizing activity, and follow up the program by seeking further training after the event was completed.

2. Wat Si Don Chai Municipal Community School, Chang Khlan Subdistrict, Mueang Chiang Mai District Chiang Mai Province, where it could provide computer facility and audio equipment to arrange the program activity.

3. National Telecom PLC, who provided us the MC and the cooperation team to help arrange this program activity.

## Outcome

The program expects the following outcomes:

1. The trained students gain the better digital (coding) skills and become a well-trained IT person in the future who would help develop Thailand to become the developed country.

2. Schools in Mueang Chiang Mai District, Chiang Mai Province, will have students who have been developed better digital skills, or coding, by the teaching of teachers who get trained from the APTYPS program.

## **Project Activities**

The program activities can be explained by the following pictures:



## Before the opening ceremony

NT Coordinating team prepared the training venue for the openning ceremony



Room for openning ceremony was set



IT facilities and sound equipments were ready

At the opening ceremony



Welcome Remarks by Mr. Liu Ziping, Deputy Secretary of APT (Zoom)



Welcome Remarks by Mr. Sunthorn Yamsiri, Deputy Mayor of Chiang Mai Municipality



Welcome Remarks by Dr. Surachai Anutragulchai, Deputy Chief Executive Officer, National Telecom Public Company Limited.



Group Photo at the openning ceremony room



Group Photo at the openning ceremony room

At the training room



Traning room



Facilitator team (yellow shirt) help solving problems



The interest of student towards the training



Happy students who get trained

Instructions and local Coordination team



Closing Ceremony



After finishing the training, all trainees received the Certificate of Achievement from Mr. Sunthorn Yamsiri, Deputy Mayor of Chiang Mai Municipality