The 12th NAPROCK International Programming Contest, Online
Themed Section
"Learn Happily Together!"

Overview of the Themed Section

Various changes are expected in the future of our society because of the rapidly develped technologies such as IoT, AI, etc. Children and students are expected to have various kinds of abilities in order to live their own lives as frontiers in the future society. For that purpose, in Japan, education for computer programming is required in all primary schools as well as the curriculums related to information technologies at secondary schools and high schools will be revised. However, there are lots of problems in educational environments and human resources for meeting the requirements on the education for those children and students who are insterested in ICT and programming skills.

Ministry of Education, Culture, Sports, Science and Technology, Japan declares that schools should have well-balanced educational capabilities based on the three important viewpoints, that is, (1) knowledge and techniques, (2) ablities for thinking, judgement and expression, and (3) resourcefullness and ability to learn in the lifetime. It also requires the teachers to realize active and interactive learning. This implies that it is quite important how children and students study and what they will be in the future as well as what they should learn. We have to utilize ICTs for education in order to deal with such big change in a way of learning. For that purpose, the organization called "ICT CONNECT 21(*)" provides open spaces and occasions where teachers and researchers as well as the providers of teaching materials and learning circumstances get together and have discussions.

Ministry of Internal Affairs and Communications, Japan has a project called "Progress of Local ICT Clubs". In this project, local communities make frameworks for bonding people in the future society, such that children and students can learn ICT or IoT skills together with various local residents including business persons, handicapped people or older generations. Under such framesworks, children and students can have various learning occasions after schools or in the holidays, apart from the ordinary classes in schools.

In the Themed Section of the 12th NAPROCK International Programming Contest, we expect the solutions to provide educational resources, spaces or occasions where various people can happily learn together in the future society by utilizing ICTs. We are waiting for the wonderful ideas and solutions that realize a novel education framework from various viewpoints.

*   https://ictconnect21.jp/english/

Cautions

1. The participating teams can use their original or any innovative devices. However, it will also be judged how effectively use such devices in their programmed solutions. Please make sure to set up your devices within the designated space.
2. In the Themed Section, the proposed system is also assessed for its fitness to the provided theme.
3. The highest priority is set on the originality of the proposed system for the judgment. At the same time, we will also evaluate the level of programming skill based on its applicability, completeness and other factors.

Inquiries

If there are any questions, please contact the following:

naprock-procon @ tokyo-ct.net (Note: there are spaces before and after "@")