Parallel session 1: Which is the role of science communication in local knowledge dissemination?

TO DEVELOP THE ROLE OF PCST RESEARCHERS IN CREATING STRATEGIC KNOWLEDGE COMMUNITIES (SKC) TO NURTURE THE CULTURE OF CREATIVITY AND INNOVATION IN LOCAL COMMUNITY

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Abstract

To create SKC in fostering the culture of creativity and innovation, PCST researcher has developed four phases: creating partnership for enhancing collaboration for action, crystallizing and systematizing local knowledge, assembling local knowledge and scientific knowledge in creating new invention, and disseminating new invention.

This participatory action research using SKC has been conducted in Mahanam Village, AngThong Province in the central part of Thailand, this village is participating One Tambon(sub-district) One Product:OTOP project (developed by the government to make the community in each sub-district self-reliant by using own resources and wisdom) by producing fabricated handicrafts from weaving dried water hyacinth stems. To make Mahanam Village handicrafts acceptable to the international market, PCST researcher organizes the process to create SKC for villagers in cooperating with scientific scholars to develop their OTOP production and new creativity.

Key Words: SKC, Local Knowledge, Scienific Knowledge, Culture of Creativity and Innovation.

Text

SKC is abbreviated from Strategic Knowledge Communities. This hypothesis was first conceptualized by Prof. Pierre FAYARD1, who originally founded PCST in 1987. This Western hypothesis is the counterpart of the Japanese concept of ‘Ba’ which roughly means ‘place’ in English. Based on a concept developed by Ikujiro Nonaka2, Ba is the place where individual knowledge can be shared through interactions with others.

In this research, the researcher will organize the process to create ‘SKC’, which can be detailed in four phases as follows:

Phase I Creating Partnerships for Enhancing Collaboration for Action

To develop a positive interaction between the PCST researchers and the community, collaboration must be conducted between equal partners upon trust (care + love + mutual respect) and understanding by initially getting to know the community 'leader'. PCST researchers have to transparently introduce themselves and thier objectives to the leader, this step is the meaningful starting point for PCST researchers to launch the project. Second is getting to know the 'community'. PCST researchers must enrich our understanding of the grassroots. In the last step, creating 'network' between community and PCST researchers, networking will bring about coordination between PCST team and community, makes them work in a more collaborative way, energizes them to cooperate in project activities and interests them to communicate through sharing and exchanging of feelings, information, and ideas in achieving their goals.

Phase II Crystallizing and Systematizing local knowledge

PCST researchers will start with studying local knowledge and its practice. Following with analyzing local knowledge, PCST researchers will analyze local knowledge, its practice, and its problem that exists in the community by involving the community members through interaction. Ending this phase with documenting local knowledge, PCST researchers will implement database and document of local knowledge to preserve, and to promote local knowledge.

This collection of knowledge will be considered as baseline information for them to manipulate 'SKC': a meeting place (physical, virtual, mental) for the community and scientists to prepare the operational plan and to direct indicators for monitoring and assessing outcomes in the coming phases.

Phase III Assembling local knowledge and scientific knowledge in creating new invention

In this phase, PCST researchers will begin researching for scientists or specialists related to local knowledge then getting to know the scientists or specialists by introducing themselves and presenting their objectives based on mutual respect, understanding, and transparency. Next, creating 'network' between scientists/specialists and PCST researchers to identify the possible solutions based on the knowledge collected in Phase II. Experimenting with community and scientists, the role of PCST researchers in this step is the mediator in conducting participatory actions among community and scientists/specialists. The last is monitoring and evaluating to improve this new invention.

Phase IV Disseminating new invention

PCST researchers start Phase IV by conducting communication process to disseminate the new invention to community members. This phase is closely related to "learning-by-doing" which allows each member of the group to access the new knowledge: methods or solutions about strategy, innovation, or improvement via action and practice.

After operating participatory actions in Phase I and Phase II, the Mahanam villagers and PCST researcher found that the defect of water hyacinth stems caused by fungi was the first priority problem. The methodology is to protect their

products from this microorganism. Accordingly, PCST researcher began Phase III by cooperating with researchers from the Thailand Institute of Scientific and Technological Research (TISTR) and representatives from Alphani International CO.,LTD who provided the sample fungicide for experimenting. The result was satisfied, however the villagers denied to use this solution due to its high cost. PCST researcher re-operated Phase III by joining with Dr.Srisook Poonpholkul, plant pathologist at Plant Protection Research and Development Office, Department of Agriculture of Thailand, who provided the alternative lower cost fungicide. Although the experiment was failure at first, good collaboration among stakeholders made the experiment succeeded finally. Then, PCST researcher started Phase IV by conducting communication process to disseminate the acceptable solution to the villagers. This phase was closely related to "learning-by-doing" which allowed each member to access new knowledge.

From this participatory action research, although partnerships among community, scientists and PCST researcher have been established and the problem has been conquered, the process of creating culture of creativity and innovation requires time for nuturing it. Consequently, the future direction of research will focus on providing the learning process, information about scientific issues and impacts related to local knowledge. Hopefully, this would bring the harmony between science and the public particularly rural area.

References

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