

【Evaluations and Comments Sheet (Initiative-based)】
- Mid-term Evaluation [FR2] -

February 26, 2015

Title of the Project	Human-Environmental Security in Asia-Pacific Ring of Fire: Water-Energy-Food Nexus		
Research Term	FR2	Principal Investigator	TANIGUCHI Makoto

General advice and comments of the PEC:

The PEC noted that the project has been very active and much has been achieved during the first two years. Nevertheless, it is also quite concerned about the directions the project has taken and feels a number of issues need to be addressed in the coming year. It may therefore also be necessary for this project to report to the PEC in Year 3.

There are many sets of activities going on, but it is hard to see how all the separate pieces will be integrated. How will the project be able to reach conclusions at the global level? The project title and goals seem to be rather larger than the actual work and the problems addressed in the field.

Not all three sides of the water-energy-food nexus triangle are equally well addressed, with the relationship between underground water and fisheries appearing the main preoccupation. PEC members wondered what the reasons for the fisheries focus are and why agriculture is not included (it is perhaps not too late to change this). Geothermal energy is a relatively limited topic beyond the countries researched. It was also not clear how the project is linking its work to international thinking on water-energy-food connections and tradeoffs. Therefore, a strong impression was that the project was working on relatively marginal issues that are disconnected from most of the global debate.

Likewise, there was criticism of how key concepts, such as ‘risk,’ ‘resilience,’ and ‘vulnerability’ are used in ways that are not in line with international literature. The notion of the ‘Ring of Fire’ also gave rise to questions about its relevance to the research.

While the project is working at the local community level, it is still hard to get a good sense of how this engagement is undertaken, who is engaged, why, etc. Relying mostly on stakeholder meetings is a rather limited approach. There is an urgent need for strengthening the local fieldwork and processes need to be introduced to ensure the quality of the fieldwork. Without this, the community-based approach which is a core element of RIHN philosophy is in danger of being jeopardized.

Finally, the PEC was under the impression that the team and work are not very international. A balance is needed among the Japan-based work and the international work in terms of the basic concepts of the project.

Reply

Addressing to the PEC (FR2)

General advice and comments of the PEC:

The PEC noted that the project has been very active and much has been achieved during the first two years. Nevertheless, it is also quite concerned about the directions the project has taken and feels a number of issues need to be addressed in the coming year.

It may therefore also be necessary for this project to report to the PEC in Year 3.

→ We will report to the PEC in Year 3.

There are many sets of activities going on, but it is hard to see how all the separate pieces will be integrated. How will the project be able to reach conclusions at the global level?

→ Compare five different countries such as US, Canada, Indonesia, the Philippines and Japan based on the integrated models and integrated indices, to form a general conclusion.

The project title and goals seem to be rather larger than the actual work and the problems addressed in the field. Not all three sides of the water-energy-food nexus triangle are equally well addressed, with the relationship between underground water and fisheries appearing the main preoccupation. PEC members wondered what the reasons for the fisheries focus are and why agriculture is not included (it is perhaps not too late to change this).

→ A distinctive characteristic of this project is the focus on aquatic resources. While most nexus projects focus only on agriculture, this project is differentiated due to its focus on aquatic resources. In addition, since the energy use for water usage for producing agricultural goods is considered at the California research site, agricultural crops is also a subject of study.

Geothermal energy is a relatively limited topic beyond the countries researched. It was also not clear how the project is linking its work to international thinking on water-energy-food connections and tradeoffs. Therefore, a strong impression was that the project was working on relatively marginal issues that are disconnected from most of the global debate.

→ This project has achieved results in problems associated with energy such as geothermal energy,

micro-hydropower and shale gas. Geothermal energy, an important energy source for countries in the Pacific Ring of Fire, will continue to be a key factor in terms of security, risks and benefits.

Likewise, there was criticism of how key concepts, such as 'risk,' 'resilience,' and 'vulnerability' are used in ways that are not in line with international literature.

→Recognizing that these terms have not been defined albeit the various proposals given by the international community, research will be conducted based on existing papers and keeping an eye on the structure of new indices.

The notion of the 'Ring of Fire' also gave rise to questions about its relevance to the research.

→ The Ring of Fire is thought as a factor for stipulating regional environments for assessing risks, resilience, vulnerabilities, and benefits.

While the project is working at the local community level, it is still hard to get a good sense of how this engagement is undertaken, who is engaged, why, etc. Relying mostly on stakeholder meetings is a rather limited approach. There is an urgent need for strengthening the local fieldwork and processes need to be introduced to ensure the quality of the fieldwork. Without this, the community-based approach which is a core element of RIHN philosophy is in danger of being jeopardized.

→Regional field studies have been executed not only in the stakeholder meeting, but in various levels. At the local level, other than surveys and interviews to water, energy, food related stakeholders, data collection with actual measuring instruments between citizens and the local government, the entering of data onto the web and information sessions on interpreting data, spring water events cosponsored with the local government, routine feedback on research results through councils and scientific societies, the re-evaluation of the establishment of problems, have been conducted. At the national level, progress on the Basic Plan on Water Cycle has been made with the Follow-up Committee under the Basic Act on Water Cycle enacted in April 2014, proving that co-design and co-production has been possible.

Finally, the PEC was under the impression that the team and work are not very international. A balance is needed among the Japan-based work and the international work in terms of the basic concepts of the project.

→For coordination with international nexus groups, seminars and workshops at the UNU-EHS (World Water Week 2014), UNU-IAS (NC Nexus conference 2014), FAO (World Water Forum 2015), GWSP (1st FE Nexus Cluster Workshop 2015) have been co-executed at nexus-related international conferences. A 3rd FE Nexus Cluster Workshop in 2016 is planned to be jointly hosted with the GWSP at RIHN. Through this WS, a global network focused on Nexus research institutes in Asian countries will be planned.