IPSI Case Study Summary Sheet

Basic Information

Title of case study (should be concise and within approximately 25 words)

Coastal communities and livelihoods in a changing world: A comparison of the fisheries and aquaculture sector in Matsushima Bay, Japan and the Salish Sea, Canada / USA

Submitting IPSI member organization(s)

Graduate School of Agricultural and Life Sciences, The University of Tokyo

Other contributing organization(s) (IPSI members and/or non-members)

Stockholm Resilience Centre

Author(s) and affiliation(s)

Akane Minohara (The University of Tokyo), Chris Cooling (independent researcher) and Robert Blasiak (The University of Tokyo and Stockholm Resilience Centre)

Format of case study (manuscript or audiovisual) Manuscript Language English

Keywords (3-5 key concepts included in the case study)

Coastal communities; Livelihoods; New entrants; Uncertainty; Diversification

Date of submission (or update, if this is an update of an existing case study) 19 February 2018

Web link (of the case study or lead organization if available for more information)

https://collections.unu.edu/eserv/UNU:6444/SITR_vol3.pdf

Geographical Information

Country (where site(s) or activities described in the case study are located – can be multiple, or even "global")

Japan, Canada/USA

Location(s) (within the country or countries – leave blank if specific location(s) cannot be identified)

Matsushima Bay, Japan and Salish Sea, Canada/USA

Longitude/latitude or Google Maps link (if location is identified)

https://www.google.com/maps/@38.35326,141.0774358,13z?hl=en;

https://www.google.com/maps/@48.6369047,-124.9233219,8z?hl=en

Ecosystem(s) (please place an "x" in all appropriate boxes)

Forest		Grassland	Agricultural	In-land water	Coastal	Х
Dryland	_	Mountain	Urban/peri-urban	Other (Please specify)		

Socioeconomic and environmental characteristics of the area (within 50 words)

Many small-scale communities involved in fisheries and aquaculture are well-described by the concept of SEPLS, where rich cultural traditions are inextricably linked with production activities and the management of surrounding ecosystems. Livelihoods in the sector are in a state of rapid change, as illustrated here by the Matsushima Bay of Japan and the Salish Sea in Western Canada and the USA. In both regions, communities involved in this sector are rapidly shrinking and aging, and new entrants face similar barriers to getting started.

Description of human-nature interactions in the area (land-use, traditional resource management practices etc. – within 50 words)

The shallow and calm waters of Matsushima Bay have allowed people to make their livelihoods from farming oysters and seaweed, and this has played a considerable role in shaping the SEPLS of the bay. A variety of fish are caught in the bay by small-scale fishers. The Salish Sea coastal fishery is known around the world for its legendary salmon runs, as well as for herring, halibut, hake, sea urchin, crab and shellfish.

Contents

Status ("ongoing" or "completed") Completed Period (MM/YY to MM/YY) 2011 to 2017

Rationale (why activities or policies described, or information shared in the case study are needed – within 50 words)

Global dynamics are having a substantial impact at the local level, and on SEPLS, where communities share an inextricable cultural connection with the surrounding ecosystems upon which they depend for their livelihoods and well-being. Yet monitoring, assessment and future projections of ecological changes have outpaced corresponding attention to changes in social and cultural systems.

Objectives (goals of activities or policies described, or of producing the case study – within 50 words)

This study considers changing livelihoods and communities at the local level by comparing the fisheries and aquaculture sector in two areas: Matsushima Bay in northeastern Japan, and the Salish Sea. It is indicative of how rapidly conditions are changing for these communities, and the potential for transnational sharing of innovations to common challenges.

Activities and/or practices employed (within 50 words)

This study primarily draws on the results of a series of in-depth interviews with stakeholders engaged in the fisheries and aquaculture sector in two areas: Matsushima Bay in Japan and the Salish Sea. Additional secondary material was collected from relevant publications of the governments of Canada and Japan, the research community, and United Nations agencies.

Results (within 50 words)

In both regions, communities involved in this sector are rapidly shrinking and aging, and new entrants face similar barriers to getting started. Ecological and economic uncertainty, and the opportunities available in urban centers have caused many to leave the sector. Still others have sought to minimize risk through diversifying into other fisheries or other sectors, such as tourism.

Lessons learned (factors in success or failure, challenges and opportunities – within 40 words)

Depending on the priorities of local governments, communities and industry actors, a number of practical steps seem to be available to encourage new entrants into the sector, including through support mechanisms to lower initial entry costs. According to several respondents, however, people will follow their own impulses, and efforts to bind them or entice them into unpredictable livelihoods will falter.

Key messages (within 40 words)

A cultural sense of obligation to continue the family business, or to maintain long-standing community traditions that are a source of local pride have also proven effective in some cases at sustaining communities.

Relationship to other IPSI activities (if the case study is related to any other IPSI collaborative activities, case studies, etc.)

This case study originally appeared in the Satoyama Initiative Thematic Review v. 3.

Funding (any relevant information about funding of activities or projects described in the case study)

This research was supported, in part, by Japan Society for the Promotion of Science Kakenhi Grant 16K18743.

Contributions to Global Agendas

CBD Aichi Biodiversity Targets (https://www.cbd.int/sp/targets/)

The table below shows based on the self-evaluation by author(s). \bullet and \blacksquare indicates the "direct" or "indirect" contributions to the CBD's Aichi Biodiversity Targets respectively to which the work described in this case study contributes to.

Strategic Goal A				Strategic Goal B						
					•					
		3			6	2 7	8	50	10	
Strategic Goal C Str										
Str	ategic Goa	ıl C	Str	ategic Goa	ıl D		Strategi	c Goal E		
Str	rategic Goa	ıl C	Str	ategic Goa	il D		Strategi	c Goal E		

UN Sustainable Development Goals (SDGs) (https://sustainabledevelopment.un.org/sdgs)

The table below shows based on the self-evaluation by author(s). \bullet and \blacksquare indicates the "direct" or "indirect" contributions to the SDGs respectively to which the work described in this case study contributes to.

1 NO POVERTY	2 ZERO HUNGER	3 GOOD HEALTH AND WELL-BEING	4 QUALITY EDUCATION	5 GENDER EQUALITY	6 CLEAN WATER AND SANITATION	7 AFFORDABLE AND CLEAN ENERGY	8 DECENT WORK AND ECONOMIC GROWTH	9 NOUSTRY, INNOVATION AND INFRASTRUCTURE
		•		•				
10 REDUCED INEQUALITIES	11 SUSTAINABLE CITIES AND COMMUNITIES	12 RESPONSIBLE CONSUMPTION AND PRODUCTION	13 CLIMATE ACTION	14 LIFE BELOW WATER	15 UFE ON LAND	16 PEACE JUSTICE AND STRONG INSTITUTIONS	17 PARTNERSHIPS FOR THE GOALS	