# Abstracts of Resilience Seminar in FY2010

#### The 30th Resilience Seminar

Date & time: April. 10th, 2010, 16:00-17:30 Place: RIHN Lecture Hall Title: Resilience of Ecological Resource and Livelihood: A case of the Sereer in Senegal Speaker: Masaaki Hirai (Graduate School of Asian and African Area Studies, Kyoto University, Kyoto, JAPAN) Language: Japanese

### [Abstract]

Resilience of Ecological Resource and Livelihood: A case of the Sereer in Senegal

In Sudanian Savanna of West Africa, we can find numerous densely populated areas and these areas have common features in their livelihood systems: "intensive agriculture" and "refined resource use and management". In this presentation, I will discuss technical and institutional factors which had formed these features, and also its recent reform under socio-economical environmental changes, from case of the Sereer living in Senegal.

# The 44<sup>th</sup> RIHN Seminar and the 31st Resilience Seminar

Date & time: June 17th, 2010, 13:30-15:00

Place: RIHN Lecture Hall

Title: Food Security, Climate Variability and Land Use in Zambia : Methods for Spatial Analysis and Modeling Vulnerability and Resilience of Smallholder Systems

Speaker: Tom Evans (RHIN Visiting Research Fellow Department of Geography, Indiana University, Indiana, USA)

Language: English

### [Abstract]

Smallholders in rural Zambia are exposed to a number of shocks that threaten their livelihoods. With the majority of smallholders directly or indirectly dependent on local-level crop production, climate variability presents a particular threat to human-well being and food security. There are scale-dependent relationships that must be considered in assessing the vulnerability of smallholders to climate variability. This presentation will present methods for analyzing food security and smallholder resilience at multiple spatial scales of analysis. In particular, conceptual approaches are discussed to articulate the resilience of smallholders at household, community and regional levels of analysis. Results from a rich household survey data conducted in 2007 are integrated with land use data derived from satellite imagery to assess the vulnerability of smallholders at these diverse spatial scales. An agent-based modeling approach is presented as a mechanism to investigate the future potential vulnerability of smallholders to climate variability. These tools are discussed as components

of an integrated multi-method approach for characterizing the spatial dimensions of resilience in smallholder systems.

#### The 32nd Resilience Seminar

Date & time: Oct. 22nd, 16:00-17:30

Place: RIHN Lecture Hall

Title: Vulnerability and Resilience of Canal-Irrigated Agriculture against Floods: The Case of Pakistan Speaker: Takashi Kurosaki (Professor, Institute of Economic Research, Hitotsubashi University, Tokyo,

# JAPAN)

Language: Japanese

### [Abstract]

How rural households in canal-irrigated areas in Pakistan cope with flood risk? To address this question, using panel data of household economies surveyed in 2001 and 2004, we first associate household-level welfare fluctuations with covariate shocks like floods, droughts, and pest-attacks. We then extrapolate its implications to the current floods, which are indeed disastrous and unprecedented. Research proposal concludes the presentation.