



## **Integrated Research on the Development of Global Climate Risk Management Strategies – Framework and Initial Results of the Research Project ICA-RUS**

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With the aim of proposing strategies of global climate risk management, we have launched a five-year research project called ICA-RUS (Integrated Climate Assessment – Risks, Uncertainties and Society). In this project with the phrase “risk management” in its title, we aspire for a comprehensive assessment of climate change risks, explicit consideration of uncertainties, utilization of best available information, and consideration of every possible conditions and options. We also regard the problem as one of decision-making at the human level, which involves social value judgments and adapts to future changes in circumstances.

The ICA-RUS project consists of the following five themes:

- 1) Synthesis of global climate risk management strategies,
- 2) Optimization of land, water and ecosystem uses for climate risk management,
- 3) Identification and analysis of critical climate risks,
- 4) Evaluation of climate risk management options under technological, social and economic uncertainties and
- 5) Interactions between scientific and social rationalities in climate risk management

(see also: <http://www.nies.go.jp/ica-rus/en/>).

For the integration of quantitative knowledge of climate change risks and responses, we apply a tool named AIM/Impact [Policy], which consists of an energy-economic model, a simplified climate model and impact projection modules. At the same time, in order to make use of qualitative knowledge as well, we hold monthly project meetings for the discussion of risk management strategies and publish annual reports based on the quantitative and qualitative information.

To enhance the comprehensiveness of the analyses, we maintain an inventory of risks and risk management options. The inventory is revised iteratively through interactive meetings with stakeholders such as policymakers, government officials and industrial representatives.