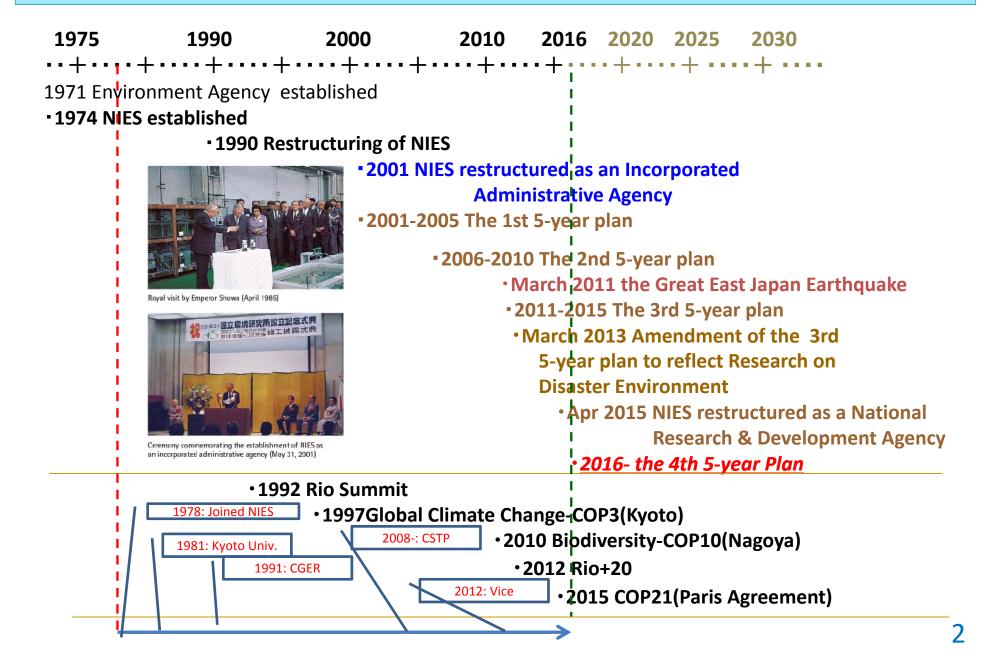
# Past, Present and Future of AIM Impact Study

Hideo Harasawa



COOPNAVI (2006. 12, No.657)

### **History of NIES**



### IPCC, AIM and Impact in Japan

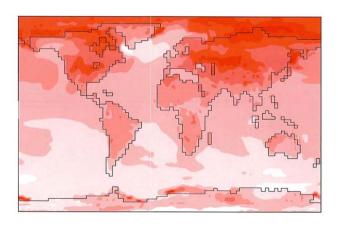
Year	IPCC	AIM	Impact & Adaptation in Japan
1988 1990	IPCC(WMO,UNEP) First Assessment Report (FAR) 1992 IPCC WG2 Meeting @ Saint Petersburg	1990 AIM Started.	
1994	IPCC Tech. Guideline for Impacts and Adaptation	(Impacts on Malaria)	
1995	Second Assessment Report(SAR)	6.20-7.1 AM Mission to Korea, China, India and Indonesia (Impacts on Crops in Asia)	
1996		1st AIM int'l WS (1-2 Feb.)	
1997	COP3	COP3 Battle with MITI	1997 Report on GW Impacts in Japan 1996 (JEA)
2000	IPCC SRES		
2001	Third Assessment Report (TAR)		2001.4 Report on GW impacts in Japan 2001 (MOE) 2001.4 ~2 <sup>nd</sup> Science and Tech. Basic Plan (Life, Info., Env., Nano) 2002.4~GW Initiative 2003 Report of GW Initiative (CSTP)
2004		S4 Project (MOE) ~20010.3	
2007	Fourth Assessment Report (AR4)	2008 CSTP Officer (~2010.5)	2008.6 Report on Wise Adaptation to CC (MOE) 2009.10 Report on Obs., Prediction and Impacts of CC (MEXT, MA, MOE)
2010		S8 Project (MOE) ~2015.3	
2011		3.11 Great East Japan Earthquake 4.1 NIES 3rd 5 yrs Plan	
2013 <b>~</b> 14	Fifth Assessment Report (AR5) 2013.9.26 WG1 2014.3 WG2, 2014.4 WG3 2014.10 Syn. Report		2012 ~ Sousei Project (MEXT) 2013.3 Report on Obs., Prediction and Impacts of CC (Synthesis Report 2012FY) (MEXT, MA, MOE)
2015	COP21 Paris Agreement	S14 Project (MOE)~2020.3 SI-CAT (MEXT)	2015.3.10 Impact assessment of CC Report (CEC) 2015.11.27 National Adaptation Plan
2016~	1.5 ° Special Report Scoping Meeting	4. 1 NIES 4 <sup>th</sup> 5 yrs Plan	2016.8 Adaptation Info. Platform (A-Plat) 2016.11 COP22 Yamada Initiative

### IPCC Technical Guidelines for Assessing Climate Change Impacts and Adaptation(1994)

CGER-I015-'94

CLIMATE CHANGE IMPACTS AND ADAPTATIONS

IPCC Technical Guidelines for Assessing Climate Change Impacts and Adaptations



#### Editors:

T.R. Carter, M.L. Parry, H. Harasawa, S. Nishioka

PART OF THE IPCC SPECIAL REPORT
TO THE FIRST SESSION OF THE CONFERENCE OF THE PARTIES
TO THE UN FRAMEWORK CONVENTION ON CLIMATE CHANGE

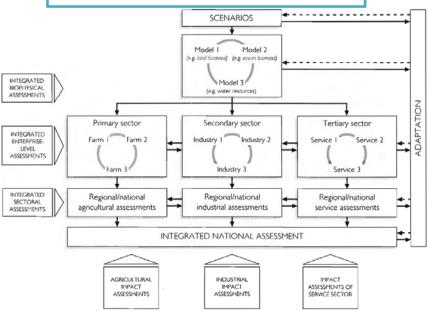


INTER GOVERNMENTAL PANEL ON CLIMATE CHANGE

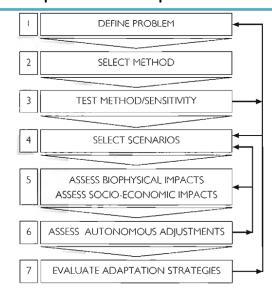


World Meteorological Organization/United Nations Environment Programme

### **Integrated Approach**



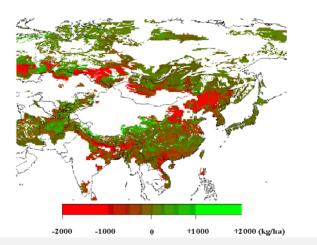
### 7 Steps of impacts & adaptation assessment



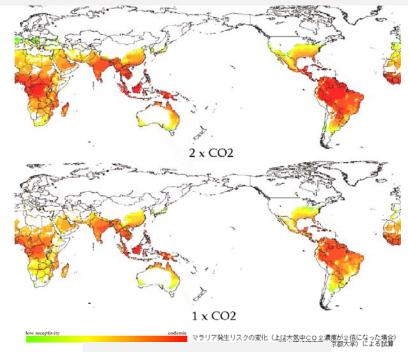
### AIM Mission to Korea, China, India and Indonesia (1995.6.20-7.1)



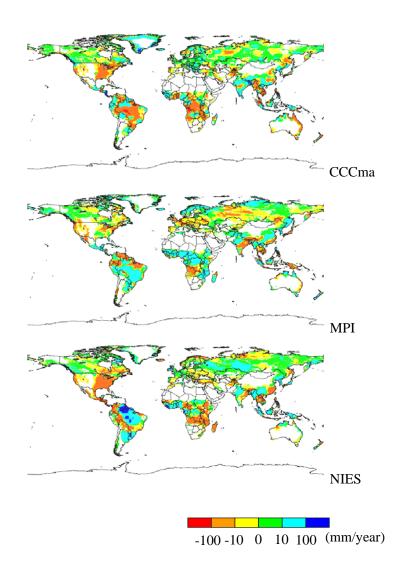
### AIM Impact study in 1990's



Change of Potential Productivity, Winter Wheat, 2100-1990



Changes in runoff calculated based on the transient experiments of the CCC, ECHAM4, and CCSR/NIES climate



## NIES RESEARCH BOOKLET "Global Warming Impacts and Mitigation, AIM" No.2 (2001)

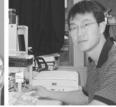














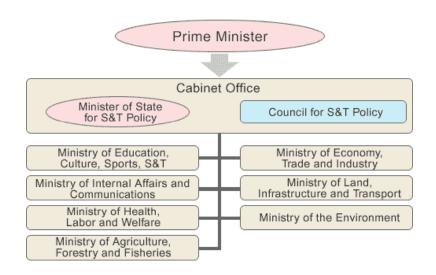
### NIES RESEARCH BOOKLET "Adaptation" No.61 (2016)





### Council for Science and Technology Policy (CSTP) 2008.4 ∼ 2010.6

### Science and Technology Administration in Japan



- Environment and Energy Policy Assessment (SABC)
- Global Environmental Monitoring (Regular Review)
- Environment and Energy Innovation Plan
- •WGs of Chemical Risk, Biomass, etc.

#### Staff Photo 2010.5.29



Project: Comprehensive Study on Impact Assessment and Adaptation for Climate Change (S8)

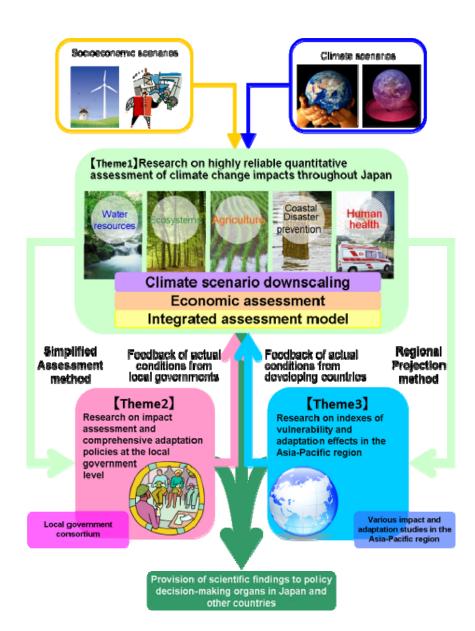
Project Leader:

Nobuo Mimura (Ibaraki University) Research Period: FY2010-2014

[Theme1] Research on highly reliable quantitative assessment of climate change impacts throughout Japan

[Theme2] Research on impact assessment and comprehensive adaptation policies at the local government level

[Theme3] Research on indexes of vulnerability and adaptation effects in the Asia-Pacific region



#### **Global Warming**: Impacts and Adaptation

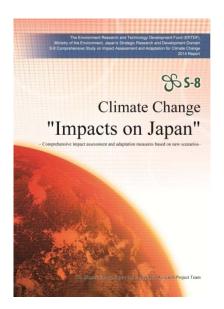
2013~ Sub Committee of CEC on Impacts Methodology & Adaptation Strategy

2015.3 National Impact Assessment Report

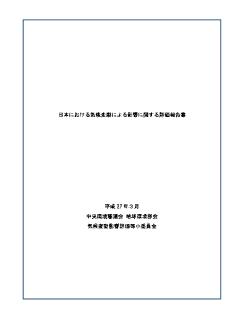
2015.11 National Adaptation Plan

2015.11-12 COP21 at Paris, Paris Agreement

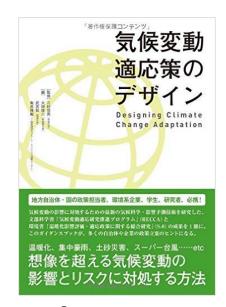
2016.8 CC Adaptation Platform (A-plat)



The Env. Res. & Tech. Dev. Fund (ERTDF), S-8 Comprehensive Study on Impact Assessment and Adaptation for Climate Change 2014 Report



MOE, National Impact Assessment Report, 2015



S8 & RECCA Projects, Designing Climate Change Adaptation, 2015

### **Climate Change Adaptation Platform (A-Plat)**

The portal site: "one-stop" online resource for adaptation to climate-change impacts,

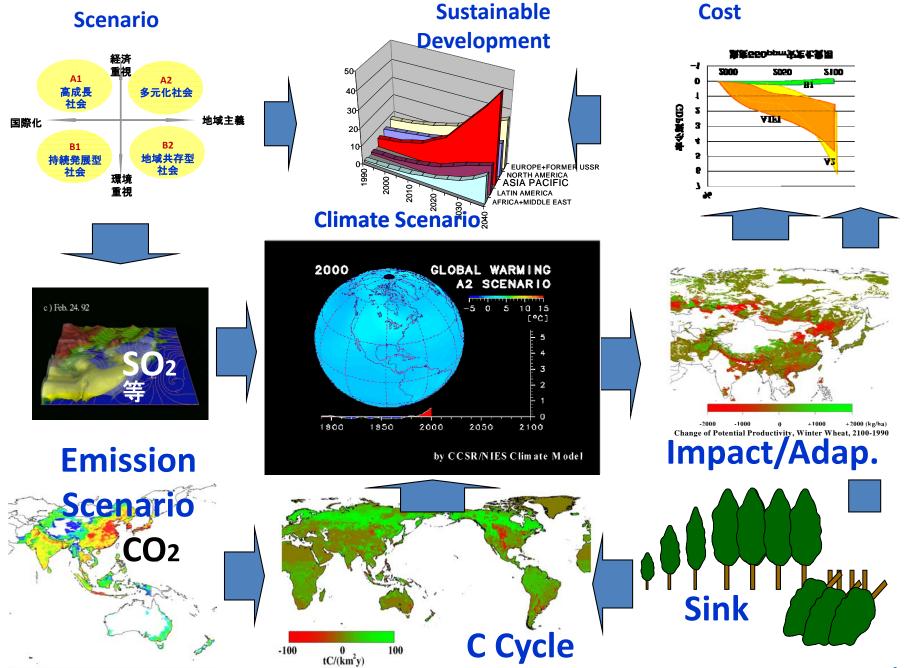
- with the aim of supporting local governments, private sectors and individuals to adapt to climate change,
- by providing national and local climatechange impact data and other useful information.

### Kickoff Symposium (30 Aug. 2016)



### Web site: http://www.adaptation-platform.nies.go.jp/





### **Future of AIM Impacts and Adaptation**

### Global

Sendai Framework (2015.3) UN SDGs (2015) COP21/Paris Agreement (2015)

#### **National**

Global Warming Prevention Law and Plan (2016) National Adaptation Plan (2015.11) Local Government Adaptation Plan

### **AIM Impacts and Adaptation**

Paris Agreement: 2°C and 1°C, long term strategy of mitigation and adaptation

Global: Mitigation and Adaptation, Env. Security, Food Security, etc.

National: Various Impacts and Adaptation models and tools

Database: Climate Scenario, d4PDF, Socio-economic Scenario

Platform: Climate Change Adaptation Platform (Japan)

Impacts and Adaptation (NIES 4<sup>th</sup> 5 year Plan)

COP22 Yamamot Initiative (CC Adaptation Platform in Asia and Pacific)

Future Earth (Trans-disciplinary Research)

#### Network

S-14, Sousei & Post Sousei, SI-CAT Asia-Pacific Impacts and Adaptation Network (APAN, APN, etc.)