2007 Accountability Workshop Strasbourg, France June 5-7, 2007

# New Initiatives for Research Funding Administration Reform in Japan

- Activities of "ORFA (Office of Research Funding Administration)" -

KIYOURA Takashi

Director

Office of Research Funding Administration (ORFA)

Science and Technology Bureau Ministry of Education, Culture, Sports, Science and Technology (MEXT)

### Content

- What is "ORFA" ?
- Background
- "moth" or "mold" ?
- Countermeasures for misuse
- Steps toward effective and efficient funding system

# What is "ORFA" ?

- ORFA = "Office of Research Funding Administration"
  - 2007 is the first year for ORFA.
  - Science and Technology Bureau
    Ministry of Education, Culture, Sports,
    Science and Technology (MEXT)
  - 9 staff

# What is "ORFA"?

1. Planning and conducting countermeasures against misuse of research fund

2. Developing research funding reform

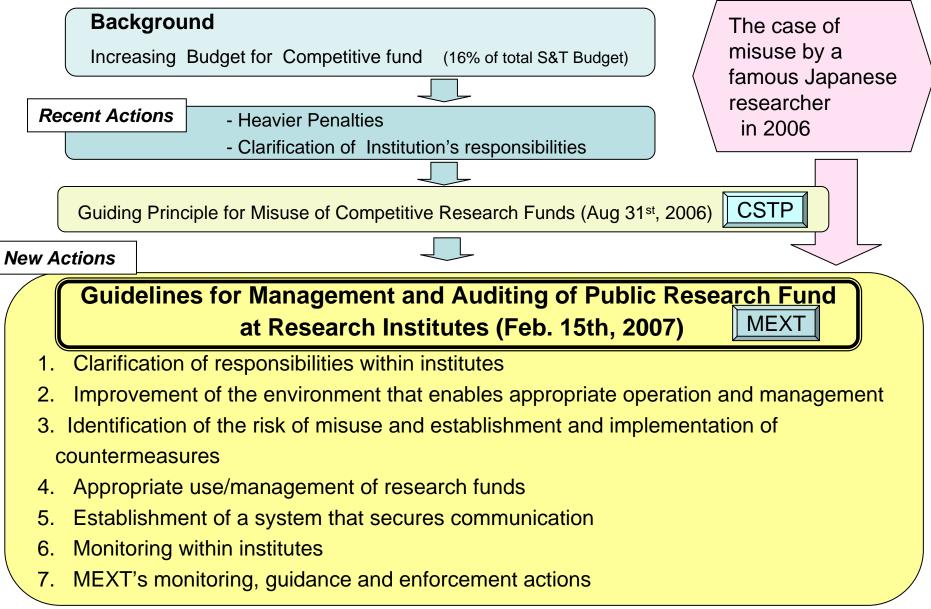
- Cross-Ministerial "R&D management system"
- Common rules for funding administration

\* Other division covers "Scientific misconduct" issues.

### Content

- What is "ORFA" ?
- Background
- "moth" or "mold" ?
- Countermeasures for misuse
- Steps toward effective and efficient funding system

# Countermeasures against misuse of research fund



### **Science and Technology Basic Plans**



S&T Basic Plans are formulated to implement a 5-year S&T policy with a 10-year outlook, based on the S&T Basic Law.

<b>-</b> FY1996	[ First S&T Basic Plan ] Total expenditures for governmental R&D investment: approx. 17 trillion yen System reforms for construction of a new R&D system
	[ Second S&T Basic Plan ]
<b>-</b> FY2001	Total expenditures for governmental R&D investment:
	approx. 24 trillion yen (21 trillion yen including local gov.)
	Clarification of Japan's objectives
	Strategic priority setting for S&T
	Promotion of basic research
	Priority setting for four prioritized fields, etc.
	S&T System Reforms
	Building a competitive environment for research
	Human resource-fostering and university reform, etc.
<b>-</b> FY2006	[ Third S&T Basic Plan ]
$\checkmark$	7

#### Third S&T Basic Plan (FY2006 - FY2010)



#### Total expenditures for Governmental R&D Investment: approx. 25 trillion yen

#### < Basic Stance >

- 1. Continuous improvements in the level of science, and returning the fruits of research to society and the public through innovation.
- 2. Emphasis on the training of human resources and the establishment of a competitive environment.

#### < 6 Policy Goals under 3 Basic Concepts >

- 1. Quantum jumps in knowledge discovery & creation 2. Breakthroughs in advanced S&T
- 3. Sustainable development economic growth & environment protection -
- 4. Innovator Japan strength in the economy & industry -
- 5. Nation's good health over a lifetime 6. Making Japan the world's safest country

#### < Strategic Priority Setting in S&T>

- 1. Promotion of basic research
- 2. Four primary priority fields, four other fields to be promoted, promotion strategies of each of the 8 fields
- 3. Strategic Prioritized S&T topics

(Key technologies of national importance, Safety and security, International competitiveness)

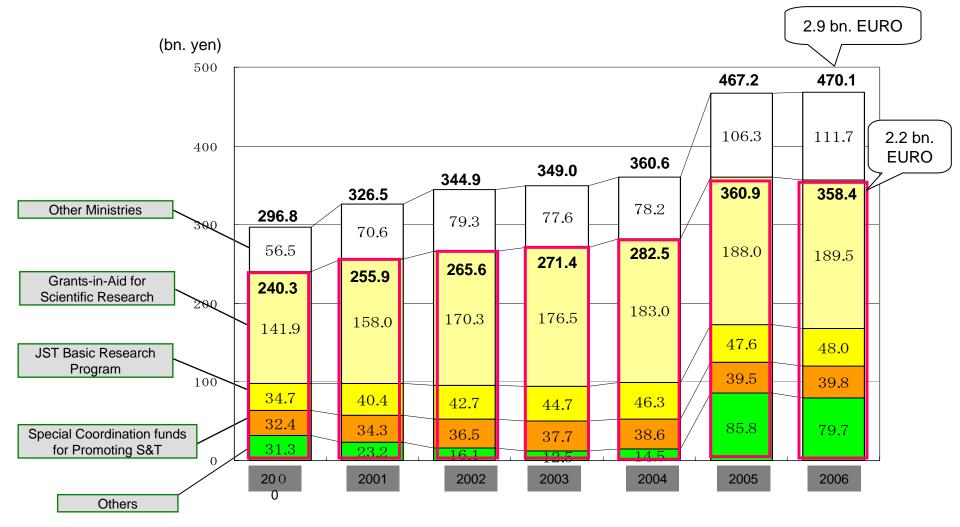
#### < Reforming the S&T System >

- 1. Developing, securing and activating human resources
  - (young researchers, female researchers, foreign researchers)
  - Enhancing the human resource development functions in universities
- 2. Creating scientific development and persistent innovation
- 3. Reinforcing the foundation for promoting S&T

#### <Strategically promoting International Activities (Cooperating with Asian Nations)>

< S&T to be support from the society and the public >

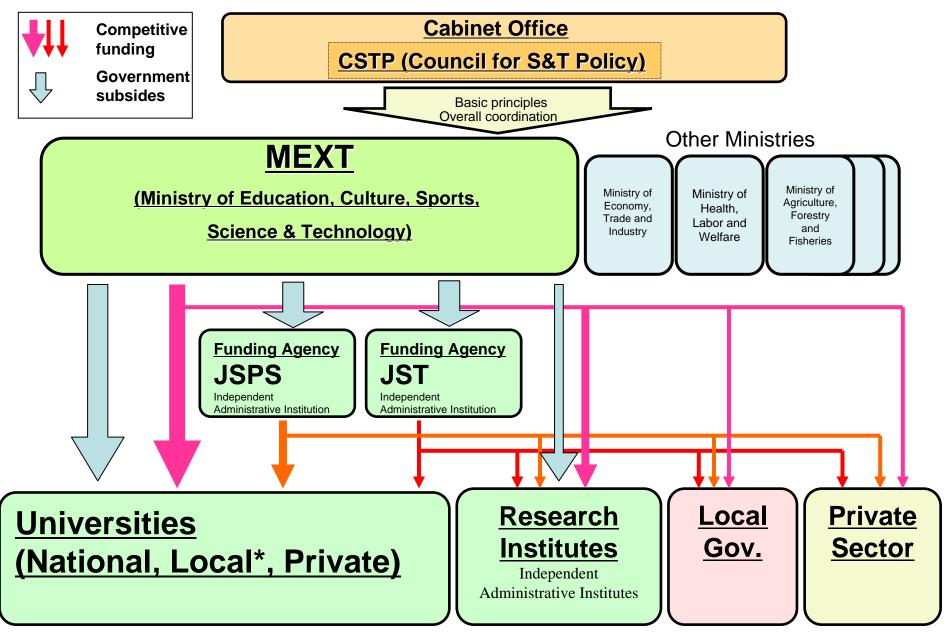
### **Time-trend of Competitive Research Funds**



MEXT Total

**75%** of total governmental Competitive Research Funds <sup>9</sup>

### **Research Funding System in Japan**



# Case of Misuse

Refund Order for misused expense (2004FY – 2006FY)

- 30 cases

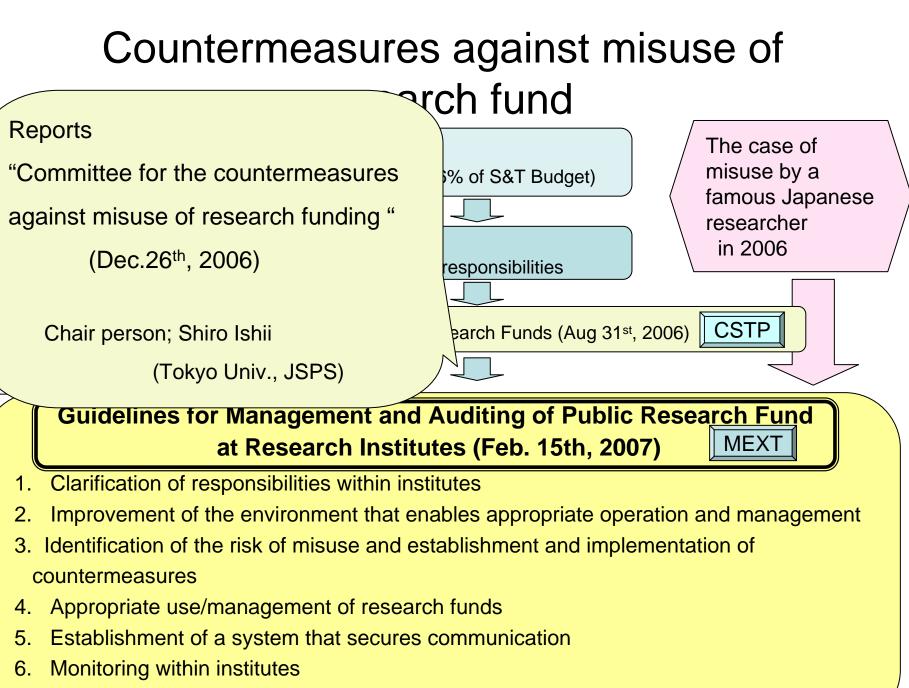
- 0.55 bn. JPY (3.4M EURO)

\* > 50,000 active projects / year

\* 997 bn. JPY (6.2 bn. EURO) (MEXT's total expenditure for Competitive funds (2004FY – 2006FY))

### Content

- What is "ORFA" ?
- Background
- "moth" or "mold" ?
- Countermeasures for misuse
- Steps toward effective and efficient funding system



7. MEXT's monitoring, guidance and enforcement actions

# Cause of Misuse

(Report "Committee for the countermeasures against misuse of research funding)

(Dec.26th, 2006)

- Researchers (moral issue) *penalties*Lack of organizational management system within research institutes *guidelines*
- Inflexibility of funding system

funding system reform

### Law of "moth" and "mold"

#### Misuse in U.S. ---- "moth" type

- motivation "personal interest"
- sporadic

\*countermeasures ---- penalties for individuals "insecticide"

#### Misuse in Japan ---- "mold" type

- motivation "organizational interest"
- lasting along with the "position"

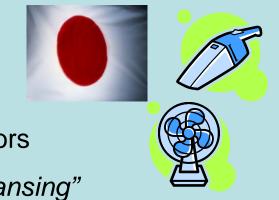
\*countermeasures ---- eliminate underlain factors

"dehumidifying and cleansing"

Original source ; Prof. Gohara Nobuo

Toin Yokohama University, Compliance Research Center15Presentation (in Japanese) at MEXT's Committee for Research FundingMisuse, Oct. 4th, 2006

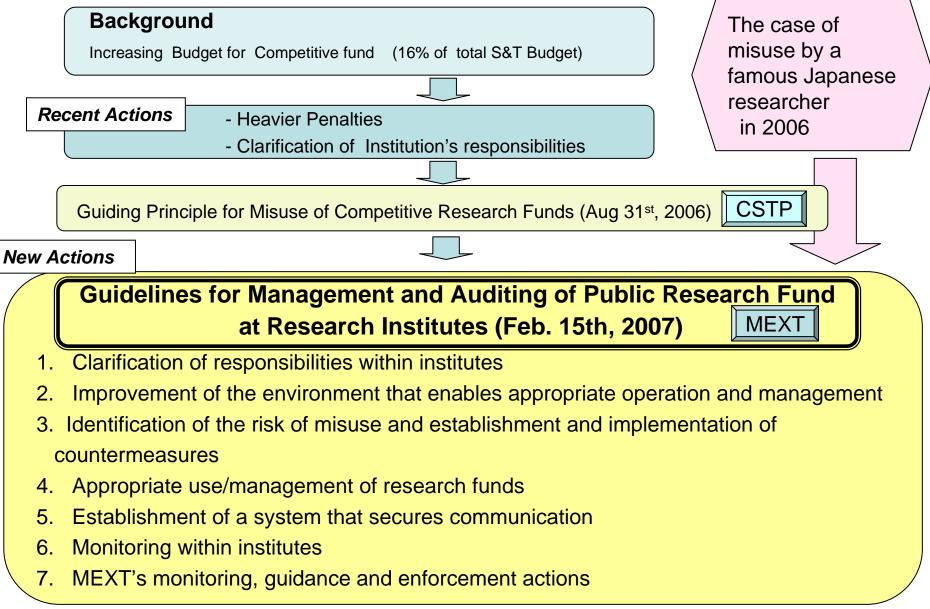




### Content

- What is "ORFA" ?
- Background
- "moth" or "mold" ?
- Countermeasures for misuse
- Steps toward effective and efficient funding system

# Countermeasures against misuse of research fund



# Guidelines require Institutes...

- 1. Clarification of responsibilities within institutes
- 2. Improvement of the environment that enables appropriate operation and management
  - clarification and simplification of rules
  - clarification of responsibilities
  - Improvement of the mind set



- Improvement of the guidelines on investigations and punishment for fraud

# Guidelines require Institutes...

- 3. Identification of the risk of misuse and establishment and implementation of countermeasures
  - risk management
- 4. Appropriate use/management of research funds
  - Check system for placing order/receiving goods by impartial third party



# Guidelines require Institutes...

- 5. Establishment of a system that secures communication
  - window for consultation
  - window for allegations
- 6. Monitoring within institutes.
  - monitoring and management system
  - internal auditing system

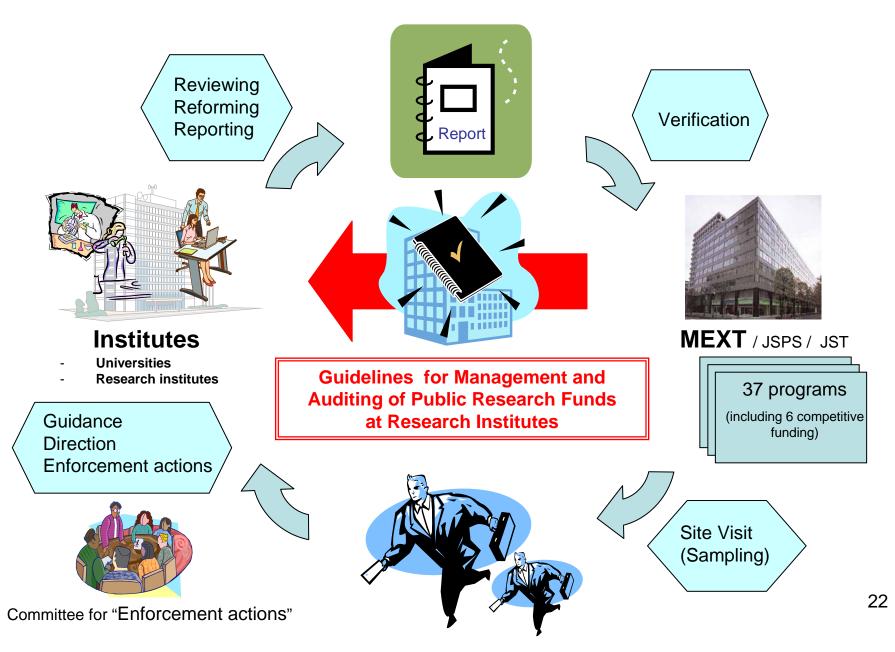


# Guidelines for MEXT/JSPS/JST..

- 7. MEXT's monitoring, guidance and enforcement
  - Committee for follow-up
  - Reviewing Annual reports from research institutions
  - Consulting
  - Site Visits
  - Find problems
    - Requesting "improvement plan"
    - Enforcement Actions



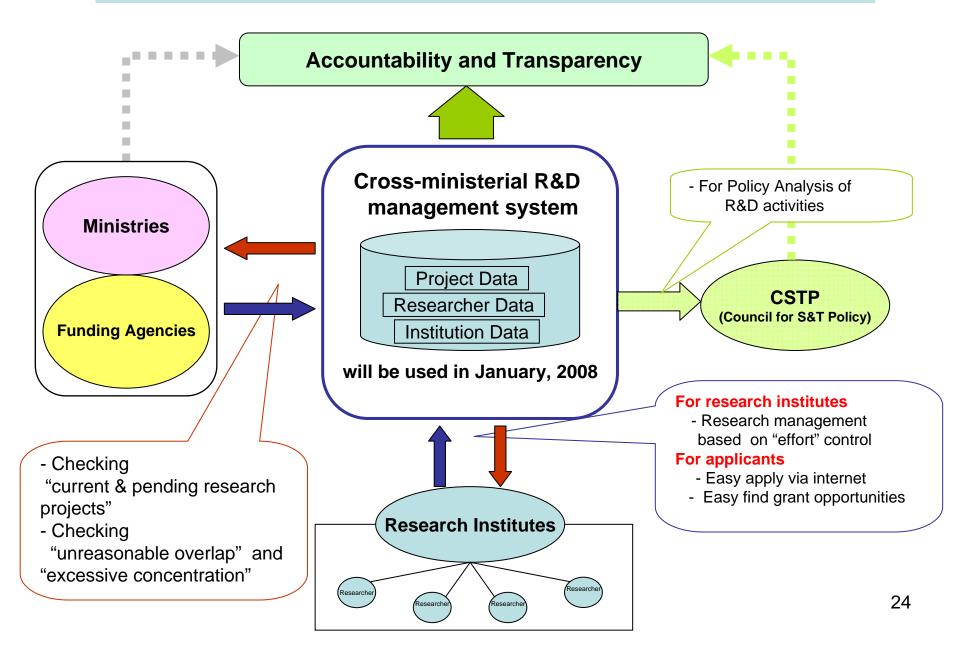
#### Audit Cycle based on Guideline



### Content

- What is "ORFA" ?
- Background
- "moth" or "mold" ?
- Countermeasures for misuse
- Steps toward effective and efficient funding system

#### Cross-ministerial R&D management system



# **Research Funding System**

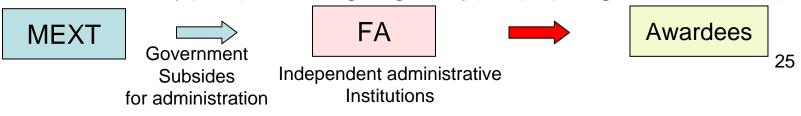
- < 3 major channels > (13 programs, 2006FY)
- 1. Grant type (2 programs, 63%)



2. Commission type (4 programs, 15%)



3. Commission type (Funding Agency) (7 programs, 21%)



## **Research Funding System Reform**

- 1. Single Accounting year Principle
  - Exceptional permission system for carry-over
  - More flexible system
- 2. Flexibility
  - Earlier transfer of money in advance
- 3. Comprehensiveness
  - Simplification / unification of complex rules of

the jungle of research programs

# Thank you!

## tkiyoura@mext.go.jp