

# Policy and management of M MPAs in China

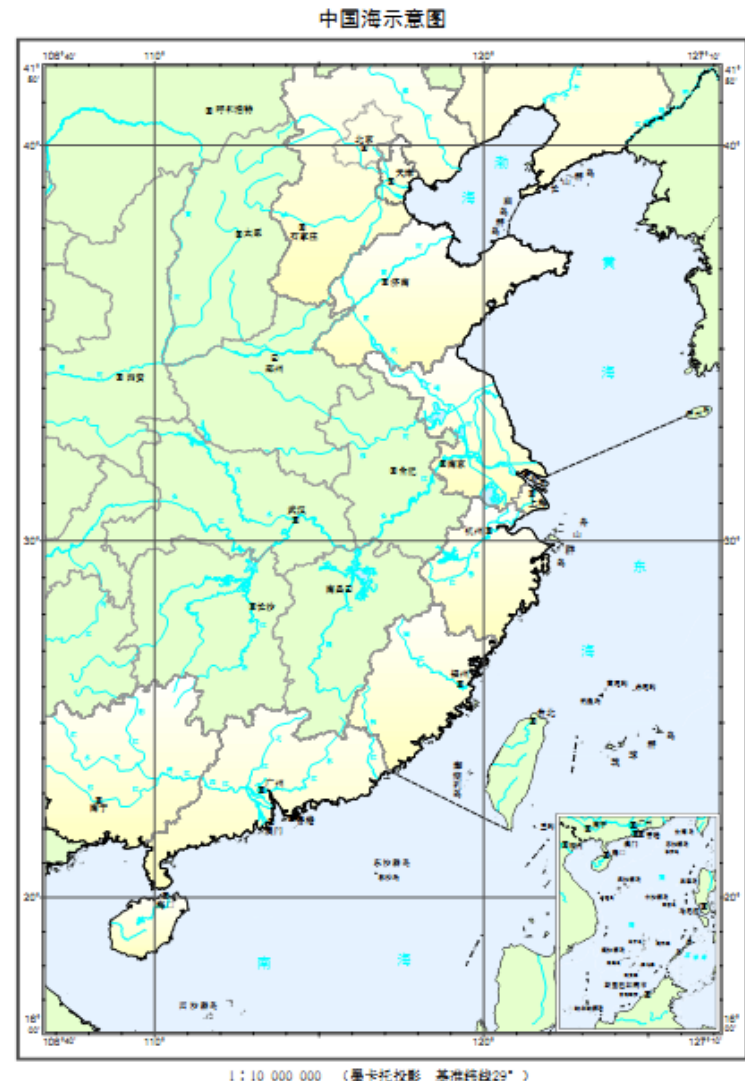


**Dr. Zhaohui ZHANG**  
**First Institute of Oceanography, SOA**  
**2014.03 . 19 Incheon**

# 1. Background

## Basic information of China seas

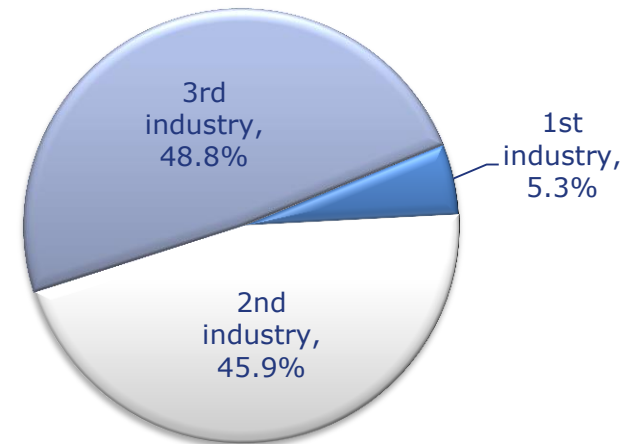
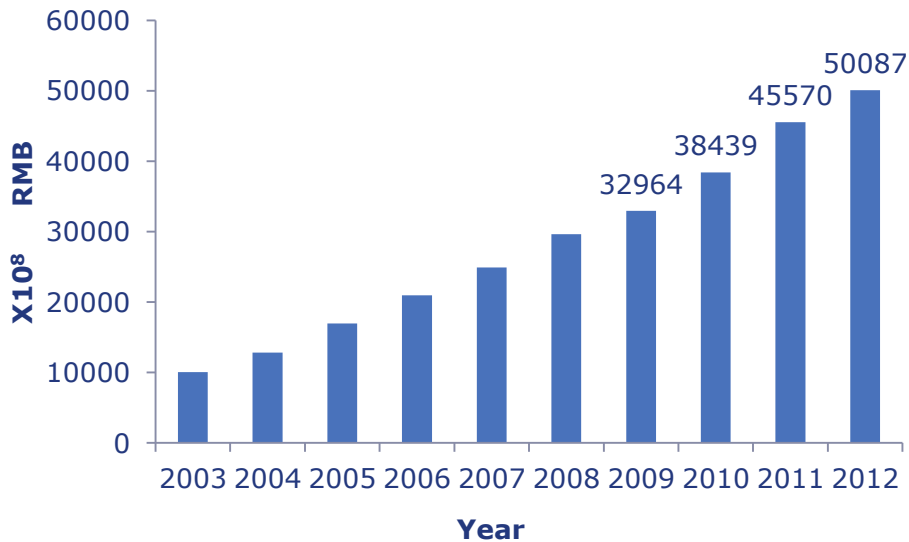
- Sea area: 3 million Km<sup>2</sup>,
- Inner waters and territorial sea: 380,000Km<sup>2</sup>
- Islands: 6900(>500m<sup>2</sup>)
- Costal line: 32000km, mainland coast: 18000km



# 1. Background

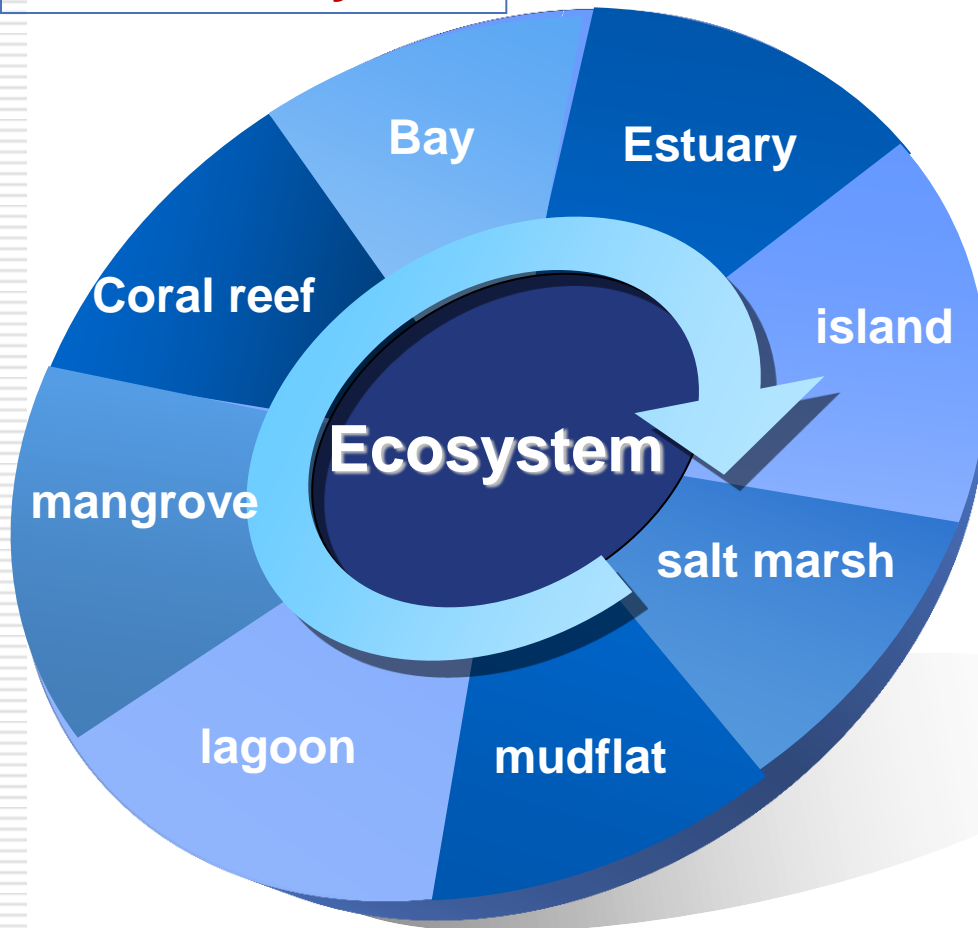
## Marine economy

- **GOP 2013: 5400 billion RMB**
- **9.6% of GDP**
- **5.3:45.9:48.8**
- **52 million people**



# 1. Background

## Marine ecosystem



- Rich biological diversity: >26000
- Many typical marine ecosystem: from temperate to subtropical zone
- Vulnerable and fragile
- High pressure
- Many human disturbance
- pollution
- Habitat degraded
- Overharvest
- Biodiversity loss
- Structure changed
- Ecosystem services reduced

**Coral reef**



**Salt marsh**



**mangrove**



**Seagrass bed**

# Bay



## 2. MPA's management system

### Legislation- Marine Environment Protection Law

#### Article 21:

State Council departments and coastal provincial people's governments shall, according to the need to protect the marine ecosystem, electing & planning, the **establishment of marine nature reserves.**

#### Article 23:

Where has a special geographical conditions, ecosystems, biological and non-living resources, marine development and utilization region for special needs, shall **establish marine special protection areas** and take effective protection measures with scientific approach for management.



中华人民共和国海洋环境保护法

中国法制出版社

## 2. MPA's management system

### Legislation- Fisheries Law

#### Article 29:

The State protects germplasm resources of aquatic products and their surviving environment, and establishes **preservation areas for germplasm resources of aquatic products** in the main regions where germplasm resources of aquatic products with high economic value and heredity and breeding value can grow and breed. No unit or individual shall be engaged in fishing activities in the preservation areas for germplasm resources of aquatic products without the approval by the department in charge of fishery administration of the State Council





## 2. MPA's management system

### Authorities

#### MEP

national MNR, especially rare and endangered species  
<http://www.zhb.gov.cn/>

#### SOA

national MNR, especially typical ecosystem and resource  
MSPA, national and local  
<http://www.soa.gov.cn/>

#### SFA

Some coastal wetland reserves  
<http://www.forestry.gov.cn/>

#### BOF/MOA

Some MNR, especially aquatic wild animals and plants  
Aquatic Germplasm Resources Conservation Areas  
<http://www.moa.gov.cn/>

## 2. MPA's management system

### Technology standards for MPAs

#### National standard (GB/T17504-1998)

Principles of type and level of classification of marine nature reserves

#### National Standard (GB / T 19571-2004)

Technical specifications of marine nature reserve management

#### National Standard (GB / T 25054-2010)

Selection technology guidelines of marine special protection areas

#### Marine industry standards (HY / T 117-2010)

Special marine protected area classification and grading standards

#### Marine industry standards (HY/T118-2010)

Technical guidelines for the preparation of overall planning, function zoning in marine special protection areas

## 2. MPA's management system

### Regulations of MPAs

1994

- Regulations of The People's Republic of China on Nature Reserves

1995

- Marine nature reserve management practices

1998

- Principles of type and level of marine nature reserves (GB / T 17504-1998)

2004

- Specification of marine nature reserve management (GB / T 19571-2004)

2005

- Interim management measures of marine special protected areas
- Opinions & regulations regarding establishment Chinese Marine Surveillance organization in national marine nature

2006

- Opinions & regulations regarding development activities management in marine nature reserves
- The further implementation work of marine protected areas
- Regulation to further strengthening the management of sea areas in marine nature reserves

## 2. MPA's management system

### Regulations of MPAs

2009

- Opinions to further strengthen the work of marine ecological protection and construction

2010

- Notice and related matters on election & declaration of ocean park
- Selection technology guidelines of marine special protection areas (GB / T 25054-2010)
- Marine special protection area classification and grading standards ( HY / T 117-2010)
- Technical guidelines for the preparation of overall planning, function zoning in marine special protection areas (HY / T 118-2010)
- Regulation of marine special protected area management
- Working Rules of National Marine Special Protection Area Committee
- National marine park reviewing standards
- Declaration of marine protected areas

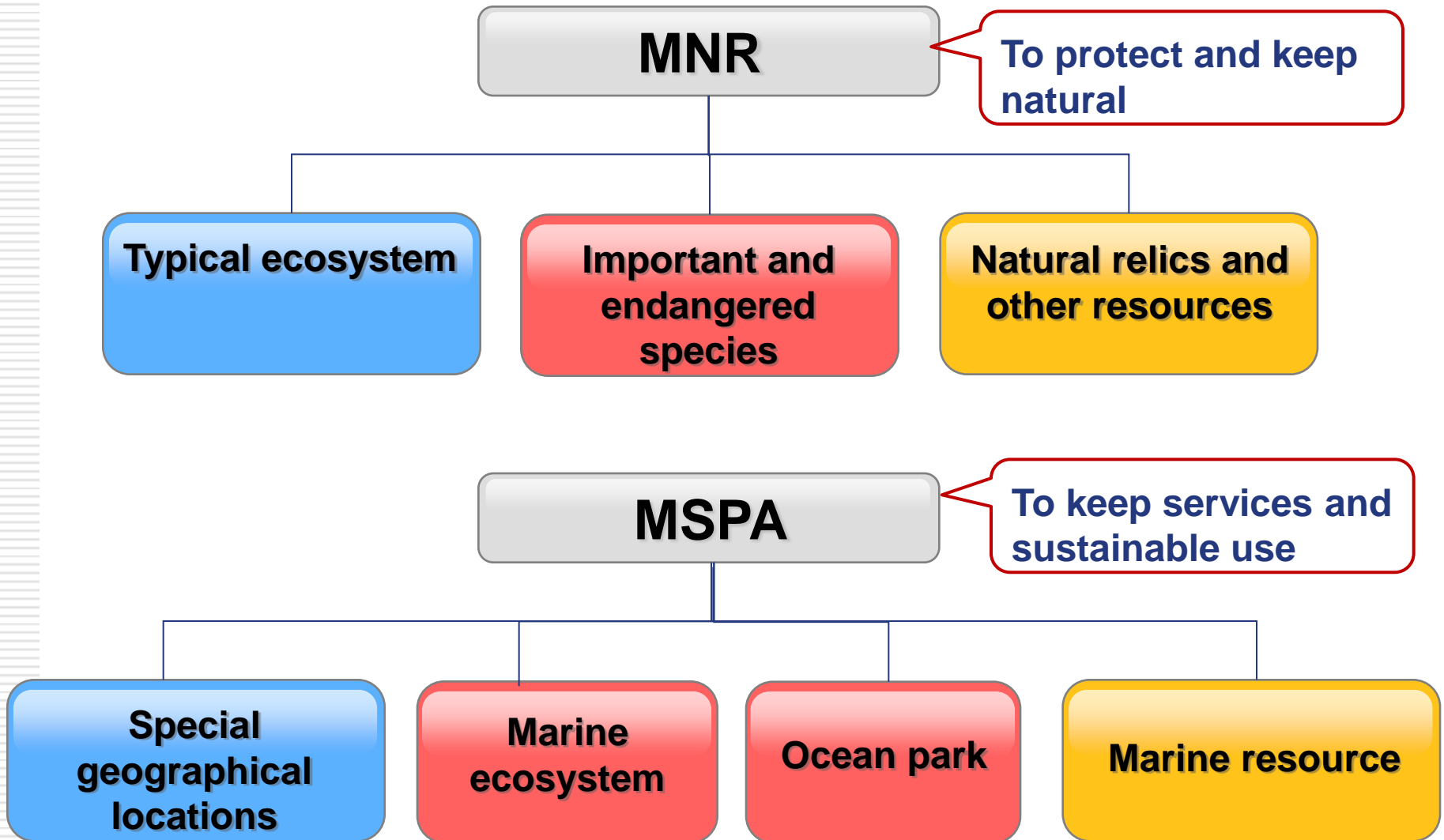
# 3. States of China MPAs

## Basic information

- **Up to 2013: 240 MPAs**
  - **Marine natural reserves: 157, in which National MNR: 34**
  - **MSPAs:83, in which National: 46**
- **Total area: 97 thousand km<sup>2</sup>, 3.23% of sea areas**

\* Aquatic Germplasm Resources Conservation Areas not included in MPAs

### 3. States of China MPAs



### 3. States of China MPAs

#### Developing of NMR

1990, approved the first 5 national marine nature reserves by the State Council

2010, UN the International Year of Biodiversity

Further reading: Convention on Biological Diversity

SOA



20<sup>th</sup> anniversary of  
Marine nature reserves

《Declaration of  
China Marine  
Protected Areas》

## 3. States of China MPAs

### Basic information of NMR

**Total area 19011 km<sup>2</sup>**

**Protect target:**

**Ecosystem: mangrove, coral reef, salt marsh, estuary, bay, island, lagoon et al.**

**Endangered species: amphioxus, spotted seals, dolphins, sea turtles and other rare and endangered marine species**

**Others: rare marine natural heritage**

**34NMR, 17 managed by SOA, 50%**



# 3. States of China MPAs

已建海洋自然保护区分布图



1: 10 000 000 (墨卡托投影 基准纬线30°)

	Number of NMR
Liaoning	5
Hebei	1
Tianjin	1
Shandong	4
Jiangsu	2
Shanghai	2
Zhejiang	2
Fujian	3
Guangdong	7
Guangxi	3
Hainan	4
<b>Total</b>	<b>34</b>

# 3. States of China MPAs

## Developing of MSPA

2002, first MSPA approved by Fujian Province government,

2004, first national MSPA approved

2010, first MSPA Committee meeting

2011, first national Ocean park

2013, 46 national MSPA

Total area: 67494 km<sup>2</sup>



### 3. States of China MPAs

MSPA	Levels	
	National	Local
<b>Special geographical locations</b>	Important marine equity value, the special conditions of marine hydrological area or island	
<b>Marine ecosystem</b>	Rare and endangered species distribution ; Coral reefs, mangroves, seagrass beds, coastal wetlands and other typical ecosystems distribution; Fragile and eco-sensitive areas; Ecological restoration and recovery area	
<b>Ocean park</b>	Special marine landscape/seascape Distribution of major historical sites; Unique geological landscape distribution; Other historical and cultural relics.	
<b>Marine resource</b>	Important marine biological resources, mineral resources, oil and gas resources and other resources; Marine eco-industrial zone; Marine resources development coordination area.	

# 3. States of China MPAs

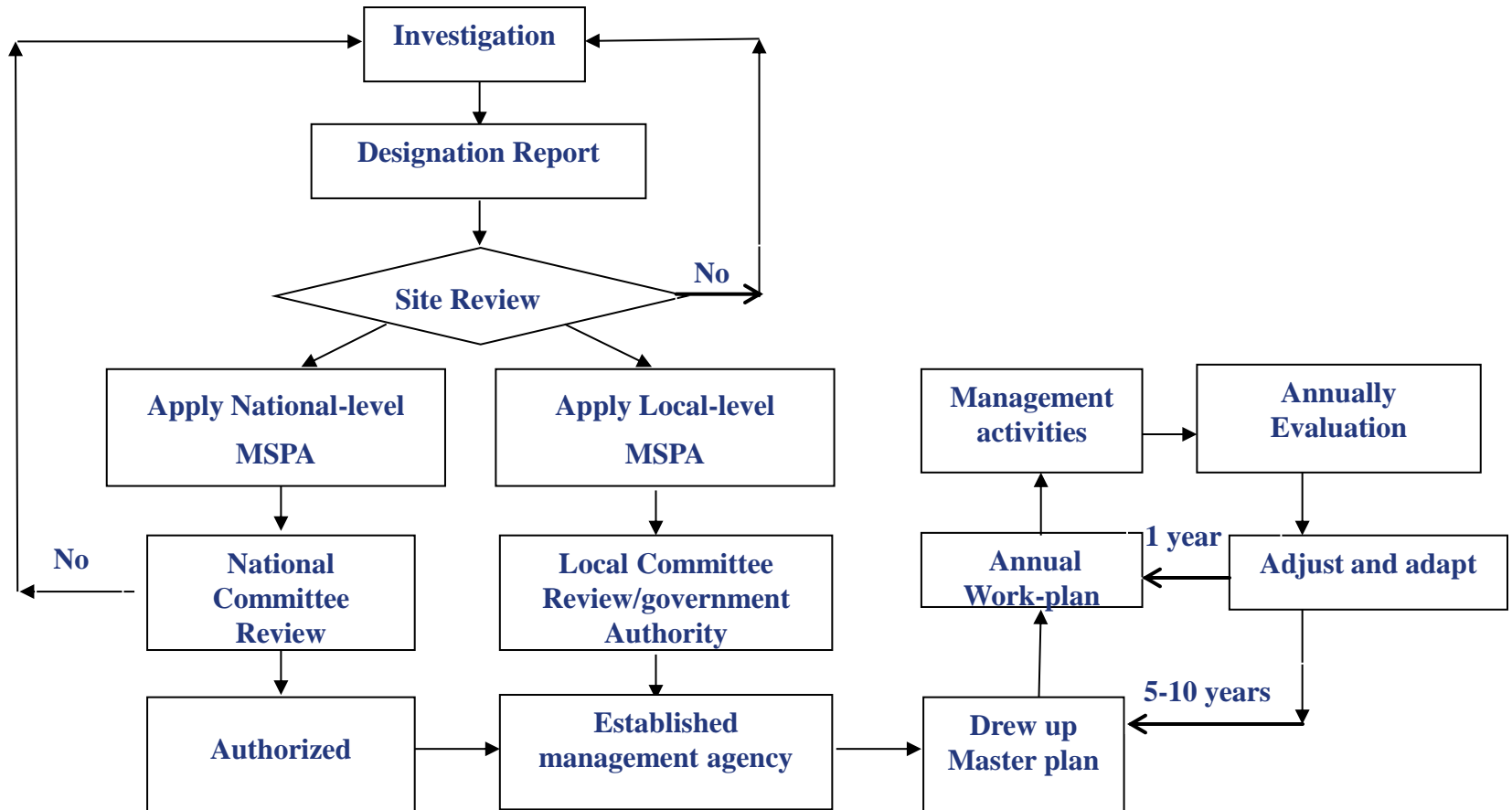
已建海洋特别保护区分布图



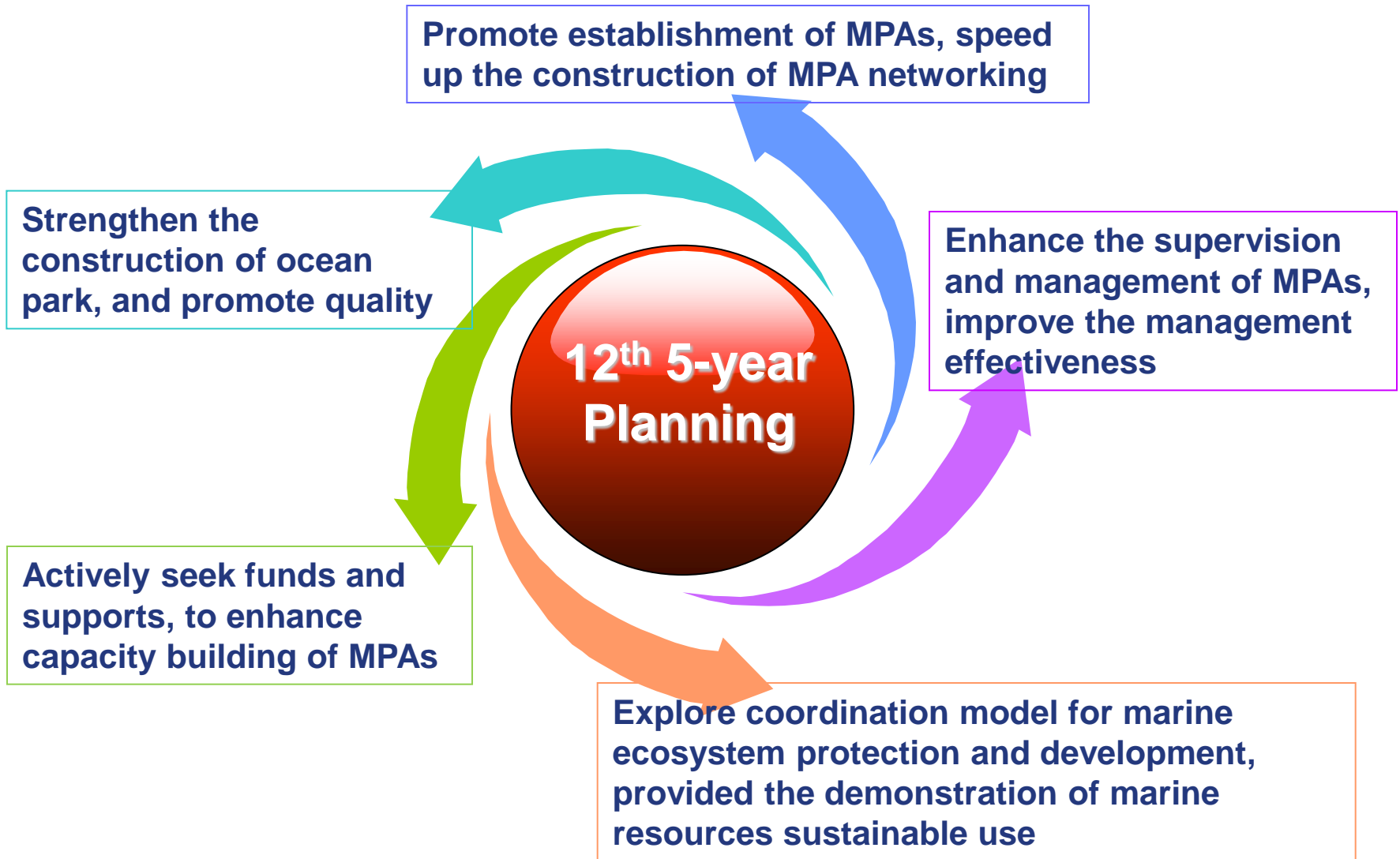
	Number of NMSPA
Liaoning	1
Hebei	0
Tianjin	1
Shandong	21
Jiangsu	3
Shanghai	0
Zhejiang	6
Fujian	5
Guangdong	3
Guangxi	2
Hainan	3
others	1
<b>Total</b>	<b>46</b>

# 3. States of China MPAs

## Management procedure for a MSPA



# 4. Planning and future prospects



# 4. Planning and future prospects

- 1 Promote establishment of MPAs, speed up the construction of MPA networking



## "China's Biodiversity Conservation Strategy and Action Plan" (2011-2030)

### Objectives

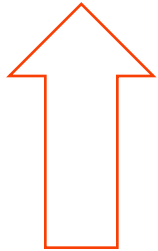
- Areas of MPAs account for China's sea area of 5%;
- Initially form a network system with various types, reasonable layout, efficient managed, effective protected MPAs.

## 4. Planning and future prospects

### 2 Strengthen the construction of ocean park, and promote quality

#### Objectives

To play an effective coordination practice on resources protection and utilization by ocean Park



- According to “Management regulations of Marine Special Protection Areas”;
- To explore the management model of ocean parks and promote the qualities of ocean parks by focusing on the ecological environment in different regions, according to the characteristics and location advantages;
- To learn from the good practices and experience of construction and management of ocean park abroad;
- To regulate the management standard of ocean parks;



## 4. Planning and future prospects

- 3 Actively seek funds and supports, to enhance capacity building of MPAs

### National Planning

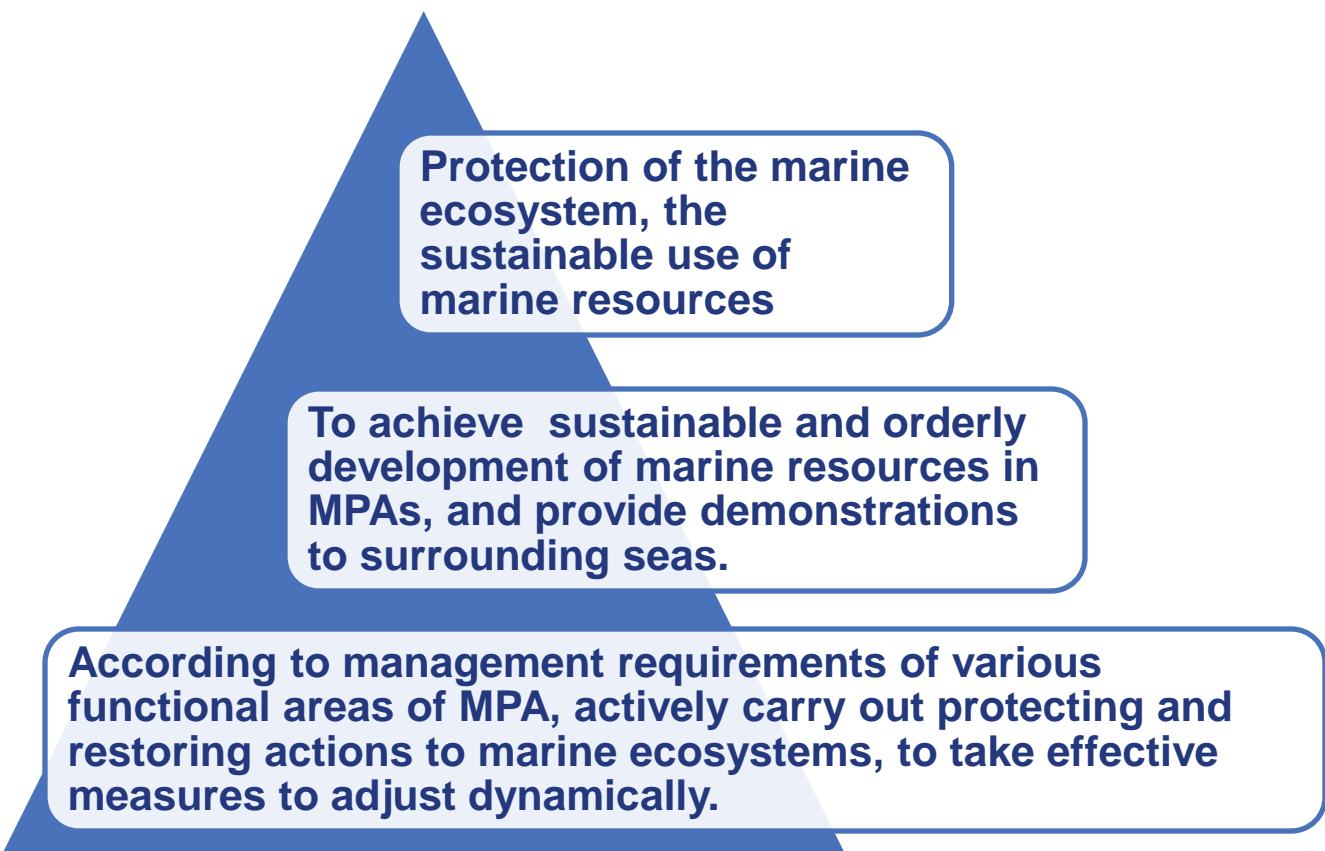
MPAs and marine ecological protection had been included in the National Plans, the tasks and construction of MNR and MPA, management capacity building, and important projects were listed in the national planning system, which means the national financial supports for next 10 years.

### Fee of sea usage

Providing more returns from fees of sea usage by central and local governments to support the management program, projects, and capacity buildings to enhance the effectiveness in MPAs.

## 4. Planning and future prospects

- 4** Explore coordination model for marine ecosystem protection and development, provided the demonstration of marine resources sustainable use



Protection of the marine ecosystem, the sustainable use of marine resources

To achieve sustainable and orderly development of marine resources in MPAs, and provide demonstrations to surrounding seas.

According to management requirements of various functional areas of MPA, actively carry out protecting and restoring actions to marine ecosystems, to take effective measures to adjust dynamically.

## 4. Planning and future prospects

- 5** Enhance the supervision and management of MPAs, improve the management effectiveness

### Management agencies

- In accordance with the requirements of relevant laws and regulations
- To Carry out the works and management activities
- Gradually improve the internal regulations
- To finalize the preparation of master plan
- To clarify management objectives of MSPAs

### All MPAs

- To strengthen the daily supervision,
- to stop illegal activities and irrational exploitation in MSPAs

### All working staff

- To study the relevant laws and regulations, marine ecosystem theories, knowledge and management skills,
- continuously improve professional quality

## 6. Suggestion for Short-term Activities

- a) **Advisory committee**
- b) **Target MPAs selection/Joint research for networking**
- c) **Membership authorization/workshop**
- d) **Knowledge/experience sharing platform building**
- e) **Publication/training materials preparation**
- f) **Training course for MPAs**
- g) **Management effectiveness assessment for members**



# THANKS

**Contact information:**

**Dr. Zhaohui ZHANG**

**First Institute of Oceanography SOA,  
Xianxialing Rd. 6#, Qingdao 266061**

**Mobile: +86 186 532 15129**

**Email: [zhang@fio.org.cn](mailto:zhang@fio.org.cn)**