



# EPPM Program Progress Report

(1 Aug 08 – 30 Jun 09)  
Updated to end Oct 09

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EPPM Seminar 2

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Coordinating Committee for Geoscience  
Programmes in East and Southeast Asia (CCOP)

# Contents

- ◆ EPPM program profile
- ◆ Technical projects - a learning journey
- ◆ Accomplishment report
  - Aug 2008- June 2009
- ◆ Budget & Expenses
- ◆ Way forward



# EPPM Program

- ◆ **CCOP-Norway Cooperation Program for Enhancing Public Petroleum Management of the CCOP Member Countries (EPPM)**

- The goal is to create the highest possible value for society from petroleum resources in order to improve the quality of life of the people in the CCOP Member Countries.



# EPPM Program

- ◆ Agreement between Norway & CCOP signed on 10 July 2008
- ◆ 4-year, July 2008- June 2012
- ◆ Budget: NOK15 Million
- ◆ Implementing agency: CCOP TS
- ◆ Cooperating agency: NPD & PETRAD
- ◆ Beneficiaries: CCOP Member Countries



# EPPM Program

## ◆ 3 Projects

- **(P1) Petroleum Resource Management with focus on Natural Gas**
- **(P2) Natural Gas Field Development and Environmental Issues**
- **(P3) Metadata on Natural Gas Resources in the CCOP Region**



# EPPM Program

## ◆ Outputs

- Trained and more knowledgeable professional staff in the MC
- Working Group and Expert Group formed
- Project Report
- Improved Natural gas database that is easily accessible
- Project website for information, reporting, knowledge sharing and preservation
- Networking and cooperation among MC is further strengthened



# EPPM Strategic Focus

- ◆ **Natural Gas development & Environmental issues**
- ◆ **Practice of Knowledge Management**



# P1- Petroleum Resource Management with focus on Natural Gas

- ◆ **Objectives:** To enhance the capability and capacity of MC in assessment of the undiscovered petroleum resources with focus on natural gas
- ◆ **Implementation thru cross-border case study**
  - Supported by 6 workshops, field works & trainings

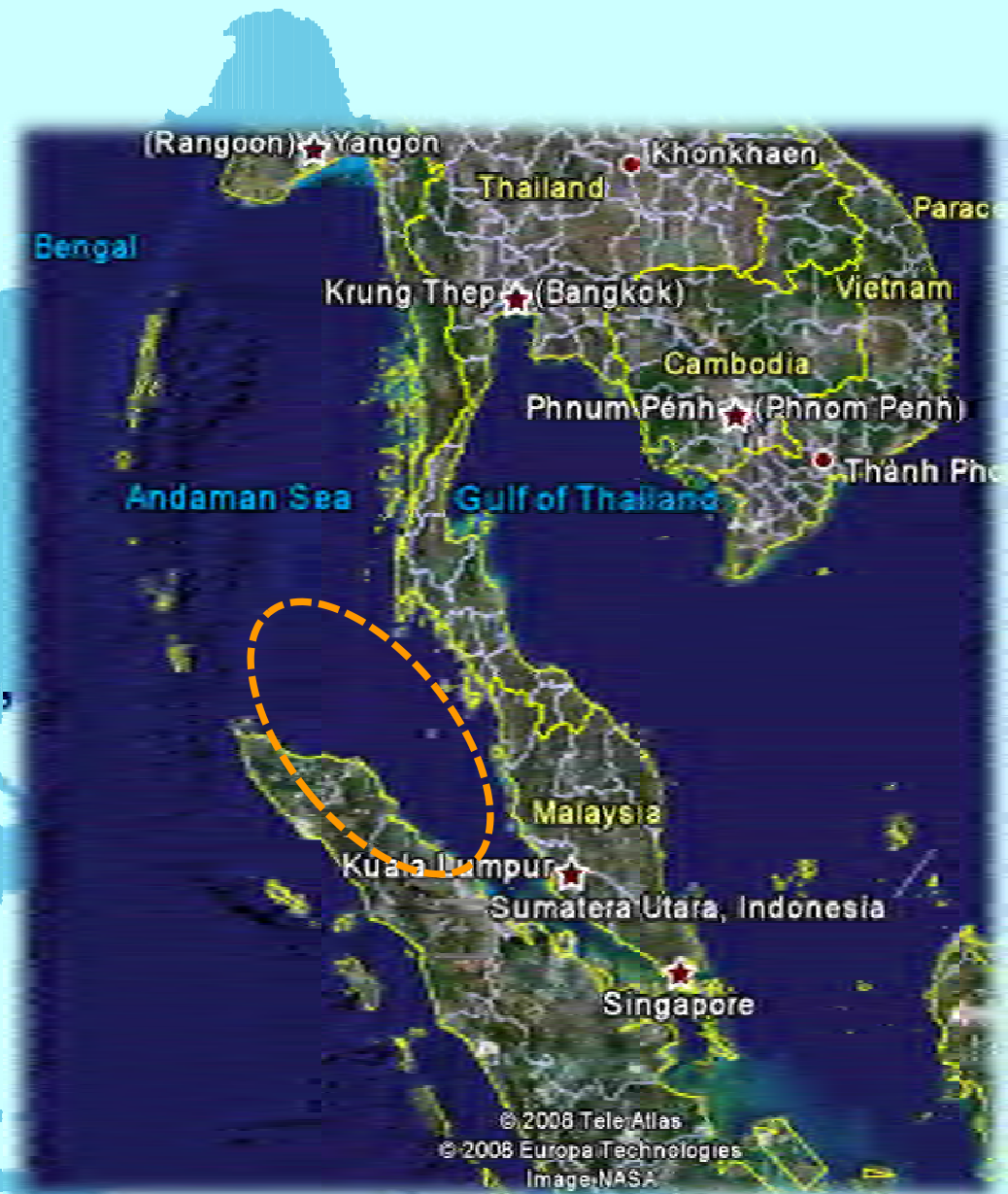




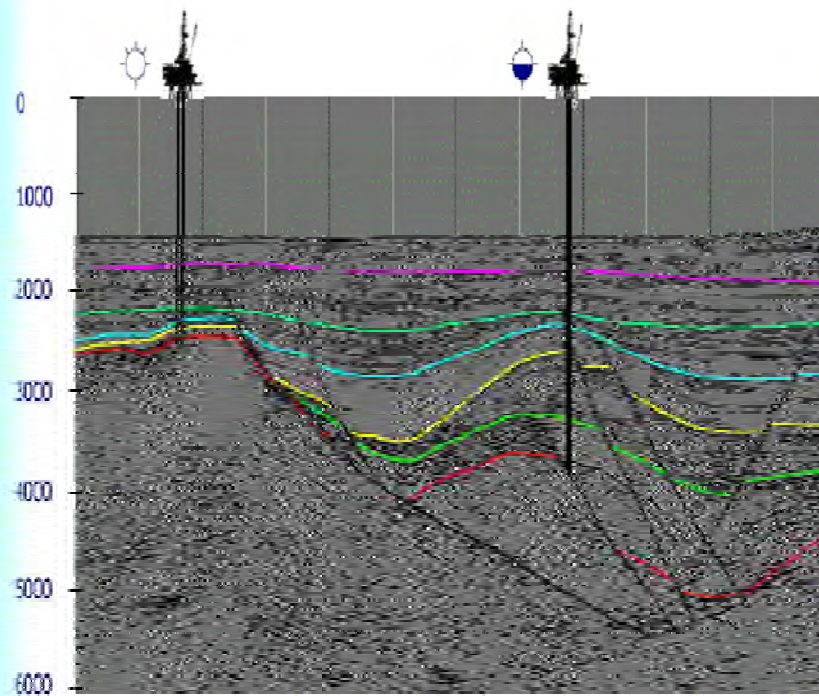
# P1

## ◆ Cross-border Case study area: **North Sumatra – Mergui basin**

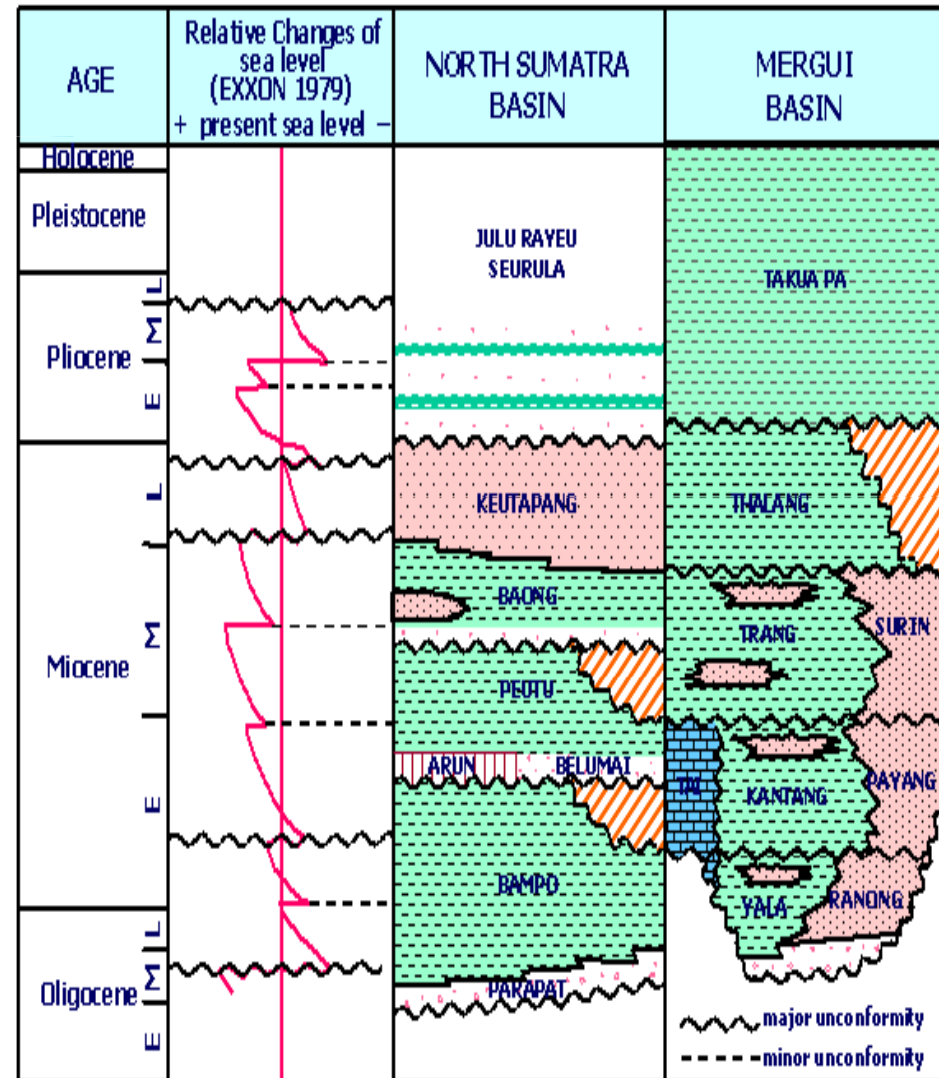
- Shared by Thailand,  
Malaysia &  
Indonesia



Seismic Cross-Section of the Mergui Basin



Stratigraphy of the Mergui Basin



# **P2 -Natural Gas Field Development and Environmental Issues**

- ◆ **Objectives:** To enhance the capacity and capability of MC in natural gas development and clean development mechanism & environmental issues
- ◆ **Implementation:** series of 6 workshops
  - China (SINOPEC) has offered their Puguang gas field for case study on challenges to gas production/development (CO<sub>2</sub> / H<sub>2</sub>S & HP /HT)



# **P2 -Natural Gas Field Development and Environmental Issues**

## **◆ Others topics**

- **CO<sub>2</sub>- alternative use, IOR & EOR technologies**
- **Gas hydrates**
- **Gas flaring & Clean development mechanism**
- **Carbon capture & storage (CCS)**
  - **Potential in CCOP**
  - **CCS geological risks, appropriate technologies for assessment & monitoring**



# **P3 - Metadata on Natural Gas Resources in the CCOP Region**

- ◆ **Objectives:** To set up an easily accessible metadata on natural gas resources of the CCOP Countries for knowledge sharing & preservation on natural gas resource exploration, exploitation and environmental impact mitigation



# **P3 - Metadata on Natural Gas Resources in the CCOP Region**

## ◆ **Implementation**

### – **Series of workshops on**

- ☞ **Requirements Analysis, metadata contents & definitions referring to international standard(s)**
- ☞ **Database structure design & software development**
- ☞ **Developing capacities for software usage**
- ☞ **Population & validation of data base**

## ◆ **Will collaborate with existing metadata work group in CCOP**

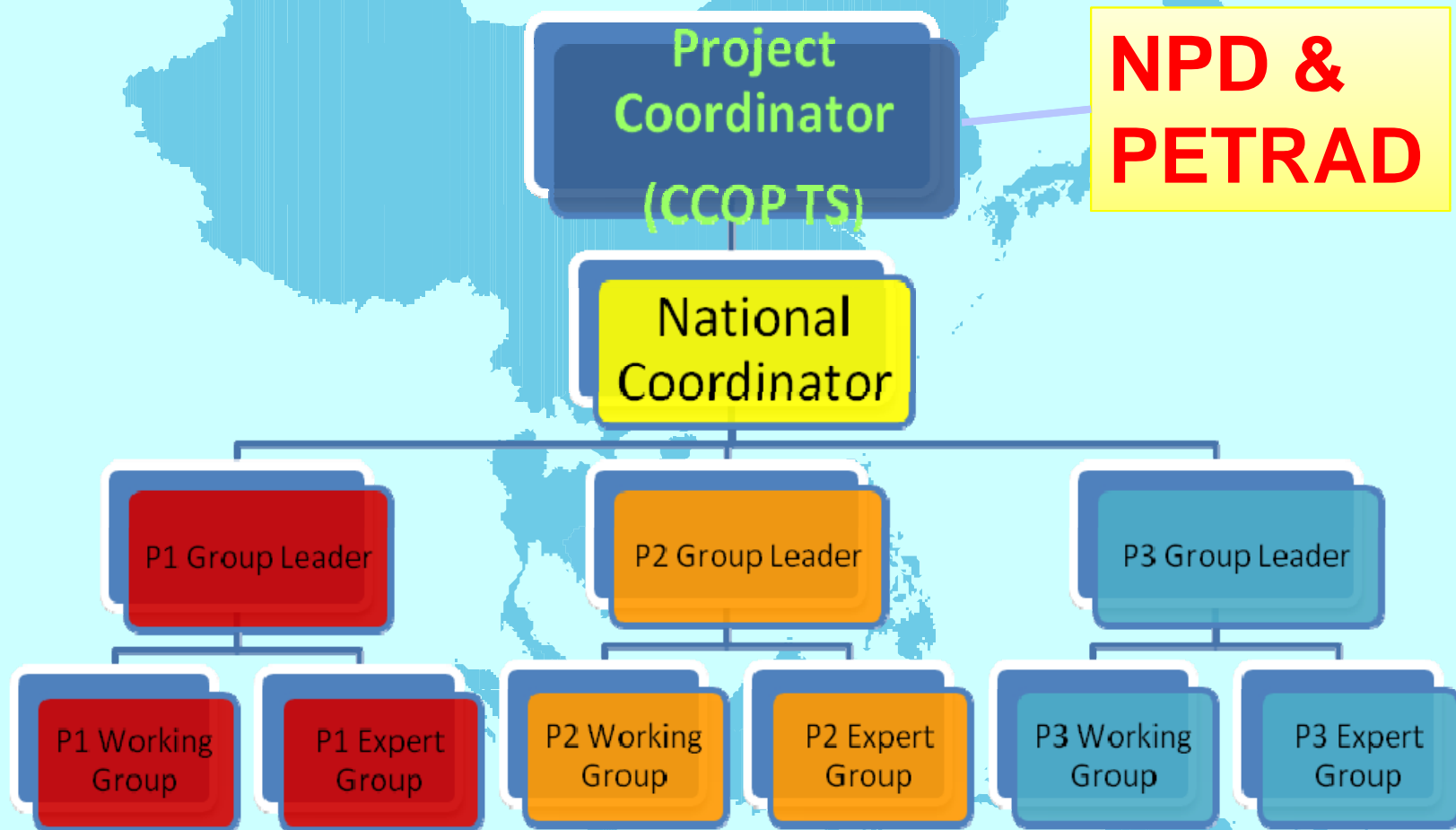


# Building on Lessons Learned

- ◆ **Workshops** supporting the case studies
- ◆ **Cross-border** studies
- ◆ **workgroups** & expert groups
- ◆ **Website** for knowledge storage, information dissemination, networking, publication & promotion



# EPPM Program – coordination setup





# Coordination set up

## ◆ WorkGroups – established in the MC

- multi-disciplinary, including local experts
- would follow the progress of the Project activities
- Would secure the data required for the technical activities
- **A facility for the practice of knowledge management – focus on knowledge sharing & use**
- Led by a Group Leader



# Coordination set up

## ◆ National Coordinators

- **Main contact person** in the MC- to work closely with the Proj Coordinator in the TS
- Can be one of the Workgroup Leader
- Responsible for the management of the WorkGroups & the facilitation of knowledge transfer/sharing

## ◆ ASCOPE & other NOC's and academic institutions are invited to participate in the Program





## Program for Enhancing Public Petroleum Management (EPPM)



Home

### Search

search...

### Main Menu

- [Discussion Forum](#)
- [FAQ](#)

### Who's Online

We have 2 guests online

### Calendar

November 2008  
Sun Mon Tue Wed Thu Fri Sat

### Counter

00001535

### Welcome To The EPPM Program Homepage

WEDNESDAY, 23 OCTOBER 2008 07:00

Here you will find all the latest information about the EPPM Program, the 3 Projects under the Program, the capacity building case studies & workshops under each Projects, the Dissemination Seminars, information about the recently conducted workshops as well as of past workshops/seminars, Upcoming Events, Frequently ask Questions and Answers, and a discussion forum with information on who is online. We have also added information & documents from the past Petroleum Policy Management Projects (PPM).

To return to the CCOP home page, just click on the CCOP Logo.

#### Recent Events

[S1: EPPM Program Launching Seminar, 9-10 October 2008, Bangkok, Thailand](#)



Group photo of the EPPM Launching Seminar



# Partnership with Norway



## Signing of the cooperation Agreements (10.10.08)

- CCOP - NPD
- CCOP - PETRAD



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# Work plan for 2009

	O '08	N	D	J '09	F	M	A	M	J	J	A	S	O	N	D	
S	Orange bar														Orange bar	
P1								Red bar				Pink bar				
P2						Green bar						Green bar				Green bar
P3							Dark blue bar						Dark blue bar			

S- Seminars

 - postponed to 1Q 2010



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# **FS OF NETWORKING OF GEOSCIENCE AND PETROLEUM INSTITUTES IN THE CCOP MEMBER COUNTRIES**

- ◆ **The purpose of the study is to determine whether a platform could be provided for promoting the**
  - sharing of knowledge and human resources,
  - sharing of facilities and funds for joint research,
  - exchange of researchers and sharing experiences in curriculum development in the field of geoscience and petroleum geoscience,

while at the same time enhancing capacities and capabilities as well as promoting cooperation and collaboration among CCOP Member Countries in the region
- ◆ **The study is conducted in cooperation with SEADPRI-UKM**



# Work plan for 2009

- ◆ **P1** - geology & tectonic setting, database, data correlation, fieldworks
- ◆ **P2** – CO<sub>2</sub> & CCS, CO<sub>2</sub>- IOR & EOR, Puguang case study (H<sub>2</sub>S & CO<sub>2</sub>), Gas hydrates
- ◆ **P3** – MC metadata & standards, requirement analysis,, database structure & sw development, sw usage training



A light blue map of East and Southeast Asia is centered on the page. The map shows the outlines of China, Korea, Japan, and the Southeast Asian archipelago. The word "Accomplishments" is overlaid in a large, bold, dark blue font.

# Accomplishments



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## **P2W1: Workshop on development of natural gas resources with high CO<sub>2</sub> & Carbon Capture and Storage (CCS) in CCOP, Bali, Indonesia, 17-20 March 2009**

- ◆ **Development of high CO<sub>2</sub> natural gas resources and CCS as solution to climate change issues**
- ◆ **Conclusions:**
  - **CCS is doable for oil and gas companies**
  - **Globally there is general lack of enabling financial or legal framework on CCS**
  - **Great opportunity of using CO<sub>2</sub> for EOR**



# P2W1

- Challenges of geological storage cannot be underestimated
- ◆ 55 participants (*from 10 MC*)
  - Mostly management representatives from various regulatory & research agencies, NOC's, academe, etc
  - Resource persons from Norway, Germany & Indonesia



**P2W2: Workshop on natural gas field development with high CO<sub>2</sub> and H<sub>2</sub>S, Chengdu, China 15-18 Sep 2009**

- ◆ **A case study of a gas field with high CO<sub>2</sub> & H<sub>2</sub>S**
- ◆ **Conclusions:**
  - **Technology is available to develop high CO<sub>2</sub> + H<sub>2</sub>S gas field**
  - **HSE regulations & awareness are built in the operations of the gas field**
  - **Efforts are on-going (within SINOPEC) to bring down the cost of operation**



# **P3W1: Workshop on metadata standards & requirement analysis for the CCOP Natural Gas Database Metadata, 1-3 Apr 09, Shanghai, China**

- ◆ metadata standards that can be used for the CCOP natural gas metadata-*harmonizing the existing metadata database*
- ◆ **Conclusions:**
  - To develop a simple practical metadata proto-type – to become a template for MC to use



# P3W1

- Metadata – to be compatible to each country's standards (as possible)
  - TS will be the portal hosting the metadata server- to be easily accessible by the general public
- ◆ **31 participants** (*from 10 MC*)
- Resource persons from Norway & MC



# **P3W2: Workshop on Metadata System Development – Davao City, Philippines, 7-9 Oct 2009**

- ◆ **Development of the Natural Gas Metadata System**
- ◆ **Conclusions**
  - **To use the metadata system developed for geoscience information**
  - **Our target users:**
    - ☞ **Investors / E & P companies**
    - ☞ **Government**
      - **Technical personnel (regulators / researchers)**
      - **Policy / decision makers**
  - **identify the metadata **oil & gas sub-category & its definitions****

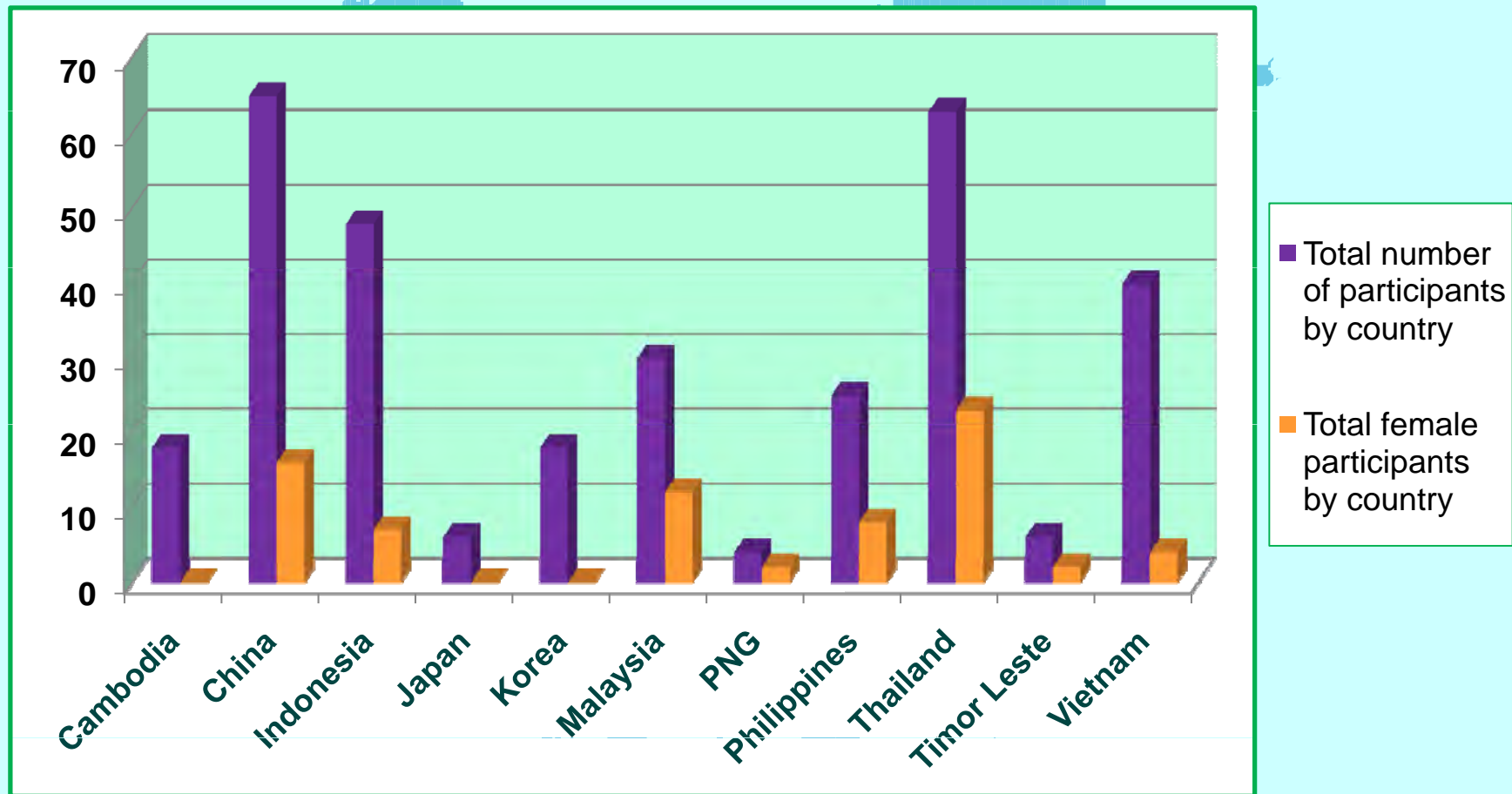


# **P1W1: Workshop on the North Sumatra – Mergui Basin Cross Border Case Study, KRABI, THAILAND 12-14 MAY 2009**

- ◆ **Common understanding of the case study basin**
- ◆ **Way forward – building up of database for the case study**
  - Basin analysis workflow process
  - Agreement on the deliverables
  - Regular consultation meeting of the case study countries
- ◆ **20 participants (from 9 MC)**



# Distribution of participants



**Total participants: 323** **Female participation: 27%**



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# Budget & Expenses

ITEM	Approve budget		Expenses	
	NOK	USD	USD	% of budget
P1	1,950,000	278,571	28,958.56	10%
P2	1,950,000	278,571	29,761.96	11%
P3	1,625,000	232,143	44,098.62	19%
SEMINAR	1,625,000	232,143	26,609.51	11%
Coordinator	1,920,000	274,286	89,053.80	32%
Coord. Operations	312,000	44,571	21,287.58	48%
H/Software	1,000,000	142,857	16,952.01	12%
NPD	1,600,000	228,571	43,293.60	19%
PETRAD	800,000	114,286	20,501.63	18%
REPORT/MISC	1,107,000	158,143	859.11	1%
CCOP MGMT	1,111,000	158,714	29,673.59	19%
FS NETWORKING	300,000	42,857	4,500.00	11%
<b>TOTAL</b>	<b>15,300,000</b>	<b>2,185,714</b>	<b>355,550</b>	

Note:

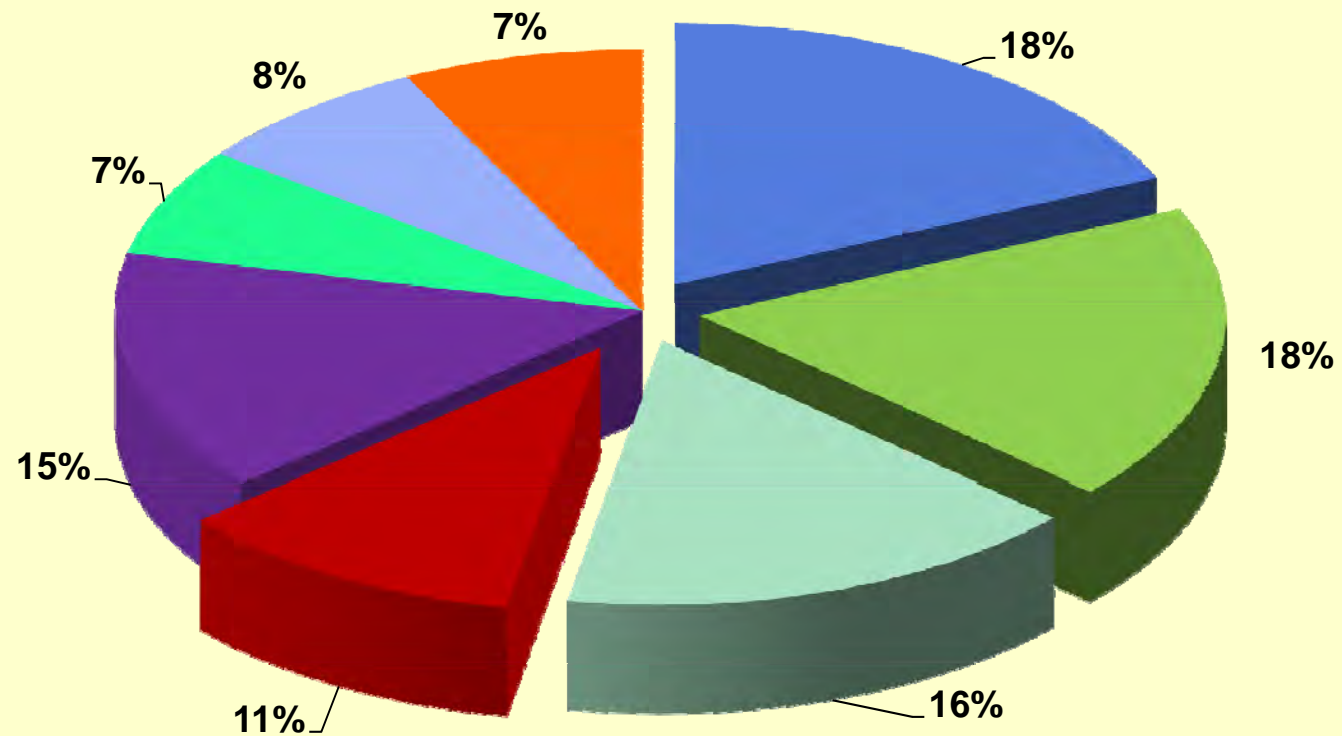
1. Exchange rate: 7
2. Payments to NPD & PETRAD for services in 1st half 09 were made after Jun 09.



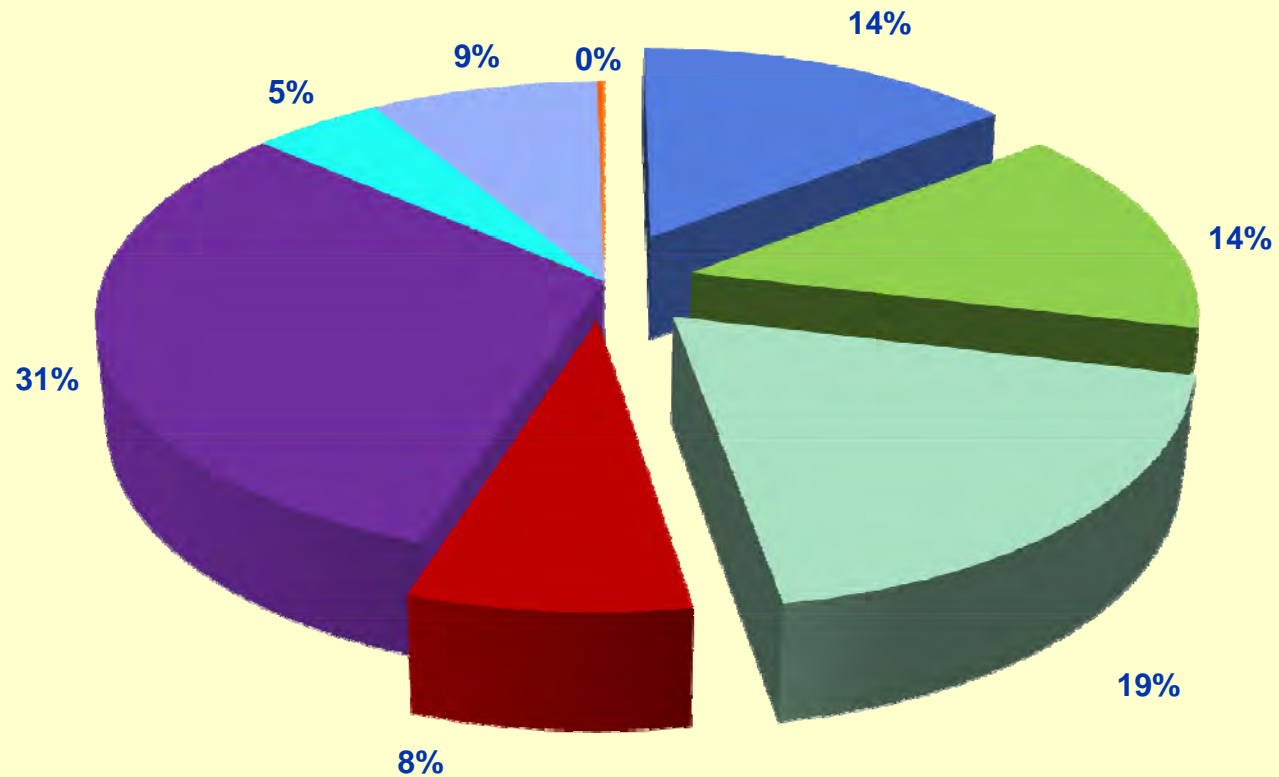
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# Budget Distribution

■ P1 ■ P2 ■ P3 ■ SEMINAR ■ Coordination ■ H/Software ■ CCOP ■ OTHERS



# Expense Distribution



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# Way Forward



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# Work plan for 2010

				J	F	M	A	M	J	J	A	S	O	N	D	
S																
P1																
P2																
P3																

S- Seminars



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# 2010 Workshop contents

## ◆ P1

**W2:** data integration & fieldwork

**W3:** Basin analysis

## ◆ P2

**W4:** Regulatory framework for CCS (incl HSE), CDM & gas flaring

**W5:** Mapping of CCS potential reservoir and selection criteria

## ◆ P3

**W3:** metadata proto-type deployment & usage training

**W4:** database buildup & management





# THANK YOU!

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Programmes in East and Southeast Asia (CCOP)**