

WORKSHOP ON THE PRACTICE OF KNOWLEDGE MANAGEMENT FOR ENHANCED PERFORMANCE

**10 June 2009
Danau Golf Club
Universiti Kebangsaan Malaysia**

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In conjunction with the Eleventh Regional Congress on Geology, Mineral and Energy Resources of Southeast Asia (GEOSEA 2009), 8-10 June 2009 to celebrate the successful conclusion of the International Year of Planet Earth (IYPE) by the Malaysian National IYPE Committee, the Southeast Asia Disaster Prevention Research Institute, Universiti Kebangsaan Malaysia (SEADPRI-UKM), the Coordinating Committee for Geoscience Programme in East and Southeast Asia (CCOP), the Geological Society of Malaysia (GSM) and the Mineral and Geoscience Department Malaysia (JMG), organised the "Workshop on the Practice of Knowledge Management for Enhanced Performance" on 10 June 2009 at the Danau Golf Club, Universiti Kebangsaan Malaysia (UKM). The objective of the workshop is to bring awareness to the participants of the concept of knowledge management as a modern effective tool that can help achieve organisational excellence. 48 participants attended the workshop and were mainly from the government agencies, research institutions and academia from Malaysia and the region. The workshop was opened by Prof. Dato' Dr. Ibrahim Komoo, Director of SEADPRI-UKM and subsequently moderated by Mr. Chen Shick Pei, Associate Fellow of SEADPRI-UKM. Three presentations, the first one on the principles and practice of knowledge management, followed by two presentations on the actual application of the practice in a successful national oil corporation and another in an international organisation (CCOP) set the scene for the workshop. The presentations are as follows:

1. Principles and Practice of Knowledge Management by Dr. Frankie Ow, Chief Knowledge Architect of JT Frank Academy;
2. Implementing Knowledge Management: The PMU Model by Ms. Che Zan Binti Yassin, Senior Manager of PETRONAS Malaysia;
3. Implementing the Practice of Knowledge Management: The CCOP Experience by Mr. Simplicio P. Caluyong, Project Coordinator of CCOP Technical Secretariat.

The paper on "Principles and Practice of Knowledge Management" presented by Dr. Frankie Ow, Chief Knowledge Architect, from JT Frank Academy. The presentation consists of introduction, history, and definition for the Practice of Knowledge Management (POKM). Dr. Frankie highlighted that the POKM emerged from the Practice of People Management. He stated that most people think that POKM is similar to Knowledge Management System (KMS). The practice consists of nurturing mindset, habit and behaviour, with technology as an enabler. Dr. Frankie also stated that POKM is a continuous journey of transformational of organisation. Therefore, POKM is not a project, but a journey in pursuit of organisational improvement by capitalizing on tacit and explicit knowledge for significant performance and competitive advantage. Tacit knowledge is knowledge nurtured from nature, experience, and given by God itself while explicit knowledge is knowledge documented. Dr. Frankie demonstrated the differences between tacit and explicit knowledge. The knowledge he delivered at the workshop is tacit knowledge, and any publication made on what he delivered today at the workshop is

explicit knowledge. Dr. Frankie then elaborated on the JT Frank POKM Model. The 8 key mindsets and competencies for this model are Knowledge Identification, Knowledge Sharing, Knowledge Application, Knowledge Acquisition, Knowledge Innovation (Creation), Knowledge Development, Knowledge Preservation, and Knowledge Measurement. The knowledge measurement means that progress is measured by pre-established methods. For example, the number of innovations made in the year, the number of applications we have implemented for the past 6 months, etc. Dr. Frankie also stressed that by using the POKM, we can transform the organisation for the better enhancement and for future benefit, not only by involving the upstream management, but also include all the staff downstream within the organisation, from top to the bottom. Second presentation was given by Ms. Che Zan Binti Yassin, Senior Manager, from PETRONAS. She presented on "Implementing Knowledge Management: The PMU Model". Ms. Che Zan shared with the participants PETRONAS experience in implementing POKM within the Petroleum Management Unit (PMU). She stated that nowadays Oil and Gas Companies are facing major challenges; exploiting oil and gas is more difficult and more costly and it needs application of new technology. Other challenges are that worldwide discoveries continue to decline and wide experience and knowledge gaps exist between young and senior technical staff. PETRONAS actually have built certified Knowledge and Change Management (KCM) Team. This team is responsible for the development and encouragement of all staff at PETRONAS to practice knowledge management. She stated that KCM's role and responsibility were to initiate and lead in the development of knowledge management (KM) as a corporate culture and promote awareness and internalization of the right mindset and leadership behaviour among staff through PMU Mindset Change programmes and initiatives. She gave the comparison of KM activities with change management (CM) activities. Familiarisation Program is essential as a first step in initiating POKM. This program consists essentially of "brainwash" sessions especially on PMU work culture. Main objective of this program is to build awareness and inculcate PMU work culture and habits on new executives. This program consists 3 parts:

*Part I: a) Global Champion Mindset
b) Foundational Leadership Behaviour
c) PETRONAS Shared Values
d) PMU House & Challenge*

Part II: a) PMU Knowledge Practices

*Part III: a) PMU Data, Information & Knowledge Tool
b) Individual Capability Tool*

KCM also established Knowledge Change Agents (KCA). These agents set and boost the momentum in implementing POKM. The main responsibilities of KCA are to serve as a liaison and coordinator, to promote and instil KM practices and culture in working environment, recommend knowledge issues and initiatives, and also to participate and supports KM initiatives. As a result, this agent becomes useful and appropriate in facilitating the development of PMU Individual and Institutional Capability. Ms. Che Zan also shared with all the participants PETRONAS's KM Operating Policy to provide focus. The focus was on acquired knowledge and expertise from the subject matter experts and by capitalising on "the Frontier". The practitioners also can manage knowledge through sharing and transfer of both tacit and explicit knowledge, best practices and work process using "the Frontier". Other focus is on the capture and preservation of critical knowledge in PETRONAS's corporate repository, the progress and outcome of these activities are communicated via "the Frontier". She also briefed about PETRONAS's PMU Knowledge Management Roadmap. This roadmap covers 10 year program, starting from year 2003 to 2012. This roadmap workflows consist of 3 stages; Stage 1 focus on

consciousness and awareness, Stage 2 cover growing momentum and Stage 3 breakthroughs and knowledge creation. The PMU also practiced the 8 key habits and mindsets to support individual capability development; Identify, acquire and apply knowledge from available resources, develop the self-responsible learning habit and innovate while working, share with others what have been learnt and create new findings such as sharing gained from attending conference, capture and populate the learning into a central place accessible by others and finally always measure the progress and outcome of the task and learning. She pointed out that there are 3 types of lesson-learnt captured or referred to by PMU Model. The Formal type requiring facilitation and involves team effort. The Informal/Ad-Hoc type relates to smaller event such as meetings or presentation. PETRONAS also formed Community of Practice (COPs), a group of people with common interest in a specific area/domain. Basically, COPs in PMU's are formed for specialize areas such as sand management, rotating equipment, knowledge management, basin studies, CO₂, and enhanced oil recovery, etc. Ms. Che Zan also explained on the use of "The Frontier" as an enabler in knowledge management. "The Frontier" works as a tool and acts as a knowledge repository and communication among PETRONAS staff for sharing and capture of knowledge. This tool gives some snapshots on the activities conducted on knowledge management. It includes a training corner, calendars, KCA and PMU staff Directory, PMU workflows, and also an Advertisement Corner which provides guidance to all staff. All the knowledge nurtured from the activities will be preserved. The PMU Sharing Forum is also held annually to capture best practices across PMU, translate best practices into a shared knowledge base, and also promotes fundamentals of knowledge and its impact to the business. Ms. Che Zan then explained about rewards and recognition in motivating knowledge management practices in PETRONAS. She stated that PETRONAS Gas Berhad for example, has introduced rewards and recognition program to encourage more staff to attend sharing events (as presenter or attendees) and upon active participation they are recognised and rewarded. The rewards include Knowledge Reward Coupon that can be redeemed for free petrol or merchandise at PETRONAS Kiosk. The assessment on tracking and monitoring knowledge management performance can be done by a short survey. This assessment can be conducted internally or externally. The key for this assessment is basic initiative measure, participation measure, knowledge creation and location, knowledge application, and business results. Ms. Che Zan also highlighted PETRONAS's knowledge management challenges. Among the challenges are to sustain knowledge capturing and reuse, instilling knowledge management practices into the business, inculcating good practices and habits as part of working culture, and to nurture and transform into the right mindset. Mr. Simplicio P. Caluyong, a Project Coordinator from CCOP Technical Secretariat then presented his paper on "Implementing the Practice of Knowledge Management: The CCOP Experience". The presentation consists of a brief introduction to the Coordinating Committee for Geoscience Programmes in East and Southeast Asia (CCOP); background and organizational including the Technical Secretariat (TS). Mr. Caluyong also informed that Timor-Leste has recently become the 12th Member Countries in CCOP. The Practicing Community (PC), established in the Technical Division of the TS, with its main tasks in organizing and holding seminar and workshop for the Member Countries. This division is responsible for the coordination and facilitation of CCOP Technical Programs. There are 6 members in this Technical Division. The strategic benefits are speeding up response time to requests from Member Countries and also to improve work performance that would promote greater impact and sustainability of CCOP activities. The PC formulated its own operating-level POKM policy. There are 2 key habits and 4 enablers. The 2 key habits are knowledge sharing and knowledge preservation. The four key enablers are existing technology, physical architectures, structural design, and Innovative Knowledge Professionals (IKP). The PC has also established its POKM Roadmap, as a key success tool. But according to Mr. Caluyong, CCOP is still learning at this stage, and therefore it is at the beginning of its POKM journey. CCOP also has created Communities of Practice

(COPs) comprising practitioners in the Member Countries. At this early stage, CCOP does not plan to create COPs in the TS. When all the PC members and Management has become more familiar with POKM, then COPs will be created. According to Mr. Caluyong, CCOP had so far held two POKM workshops on; Certification and Assessment. CCOP TS IKP will lead in the institutionalization of POKM. These IKP's are coming from various different technical backgrounds, nationalities, and culture and they have participated in many POKM related seminars and workshops. POKM is embedded in the CCOP TS annual business plan. The existing technology is used by CCOP such as hardware and software for networking, internet portal, planned e-library, and other ICT tools. The proposed technology to improve services to the Member Countries is to customize database software to help facilitate the POKM at the same time provide better and sustainable service to Member Countries. Mr. Caluyong pointed that CCOP is implementing POKM under the Norway supported program; 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. This program is an agreement between Government of Norway and CCOP signed on 10 July 2008. It is a 4 year program, starting from July 2008 to June 2012. The allocated budget is NOK15 Million. CCOP TS is the implementing agency while the beneficiaries are CCOP Member Countries. POKM is one of the strategic foci in the CCOP – EPPM Program. Work groups are encouraged to be set up in the Member Countries. This work groups are multi-disciplinary, including local experts that would follow the progress of the Project Activities set-up by this program. All work groups would secure the data required for the technical activities. Therefore, this program is a facility for knowledge sharing and use among Member Countries. In building on lesson learned, CCOP held workshops attended by work groups and expert groups to support the case studies and cross-border studies. The goal to create a website by CCOP is for knowledge storage, information dissemination, networking, and also for publication and promotion.

During the discussion, the participants acknowledged that a champion is needed for the implementation of POKM. In addition, the establishment of Practicing Communities (PC) to implement the POKM is also important. By selecting an appropriate PC, the practice of POKM can be linked with the organisational goal to put in place the implementation roadmap that must not be forgotten that it must be tangible and measurable. It is a whole team effort, from up-stream to the down-stream level that is responsible for ensuring that knowledge management is implemented. There are 3 most important factors in POKM. Firstly is to select appropriate PC; a group of practitioners or an appropriate department is identified to implement its practice. Secondly, all must be familiar with what is relevant knowledge. It means that they have a similar appreciation or entry level in knowledge to the organisation that can lead to easier implementation of POKM. The last factor is to select the mindset and enablers that are most relevant. It may not be necessary to try all the 8 mindsets and the 6 enablers as stated in Dr. Frankie presentation. Networking among the peoples internally and externally also plays an important role in POKM. The people must network with each other to gain knowledge and share the experiences. The participants with insights of the concept and practical experience of POKM, that is equally important to knowledge generation. SEADPRI-UKM will continue to promote POKM internally and create platform for building capacity and sharing of experience.