



**DOSH**

Return to Session 1

**NATIONAL CONVENTION ON NUCLEAR &  
RADIOACTIVE MATERIAL SAFETY,  
SECURITY & SAFEGUARDS  
PUTRAJAYA INTERNATIONAL CONVENTION CENTER,  
PUTRAJAYA**

**ACCIDENT IN CONVENTIONAL  
INDUSTRIES VS NUCLEAR INDUSTRY**

**10<sup>TH</sup> DECEMBER 2007**



## OBJECTIVES

### Participants should be able to understand

- The role & function of Department of Occupational Safety and Health (DOSH);
- Definition of accidents and occupational disease & occupational poisoning;
- Regulations pertaining to Accident Reporting;
- Statistics on accidents & incidents;
- Statistics of conventional vs radiological accidents/incidents; and
- How to manage risk



# DOSH – AN INTRODUCTION

## THE DEPARTMENT



MINISTRY OF HUMAN RESOURCES

Department:

- ▶ Manpower Department
- ▶ Department of Skills Development
- ▶ Occupational Safety and Health
- ▶ Labour Department (Peninsular Malaysia)
- ▶ Labour Department (Sabah)
- ▶ Labour Department (Sarawak)
- ▶ Trade Union Affairs
- ▶ Industrial Relation Department
- ▶ Industrial Court

Department of Occupational Safety and Health

Level 2,3 & 4, Block D3,  
Complex D, 62530 Putrajaya

## VISION

To be the ultimate leader of Occupational Safety and Health



# DOSH – ROLE & RESPONSIBILITY

## GENERAL

Ensuring the occupational safety, health and welfare of people at work as well as protecting other people from the hazards arising from activities of various sectors

## LEGISLATION

The administration and enforcement of legislations related to occupational safety and health

- Factories and Machinery Act 1967
- Occupational Safety and Health Act 1994
- Petroleum (Safety Measures) Act 1984



# DOSH – CORE ACTIVITIES

## ***STANDARD SETTING***

- POLICY ANALYSIS
- FORMULATION AND REVIEW OF REGULATIONS, INDUSTRY CODES OF PRACTICE & GUIDELINES

## **ENFORCEMENT**

- APPROVAL
- REGISTRATION
- CERTIFICATION
- INSPECTION
- INVESTIGATION OF ACCIDENTS & COMPLAINTS
- LEGAL ACTIONS

## **PROMOTION**

- ENTERPRISE
- PUBLIC



# DOSH – SCOPE & LIMITATION

## COVERS

- Manufacturing
- Mining And Quarrying
- Construction
- Agriculture, Forestry And Fishing
- Utilities (Gas, Electricity, Water And Sanitary Services)
- Transport, Storage And Communication
- Wholesale And Retail Trades
- Hotels And Restaurants
- Finance, Insurance, Real Estate And Business Services
- Public Services And Statutory Authorities

## EXCLUDE

- On board ships governed by Merchant Shipping Ordinance
- Armed forces



## **DEFINITIONS – OSHA 1994**

### **THE REGULATIONS - NADOPOD**

Occupational Safety and Health (Notification of Accident, Dangerous Occurrence, Occupational Poisoning and Occupational Disease) Regulations 2004

### **ACCIDENT**

Means an occurrence arising out of or in connection with work which results in fatal injury or non-fatal injury

### **OCCUPATIONAL POISONING & OCCUPATIONAL DISEASE**

Means a poisoning or a disease arising out of or in connection with work



## **DEFINITIONS – ATOMIC ENERGY LICENSING ACT 1984 (ACT 304)**

- Atomic Energy Licensing Board (AELB)  
established in 1985 under Department of Prime Minister
- Now under Ministry of Science, Technology and Innovation
- Responsible to control and supervise activities using radioactive material and/or nuclear material including the disposal of radioactive waste
- Lead Agency for Radiological Accident /Incident in Malaysia



## DEFINITIONS – ATOMIC ENERGY LICENSING ACT 1984 (CONT.)

### NUCLEAR INCIDENT

means any occurrence or a series of occurrences, having the same origin, which causes or cause **nuclear damage**

### NUCLEAR DAMAGE

means any loss of life, injury to the person, loss of, loss of use of, or damage to, property, or loss in, loss of use of, or damage to, the environment, which arises out of or results from-

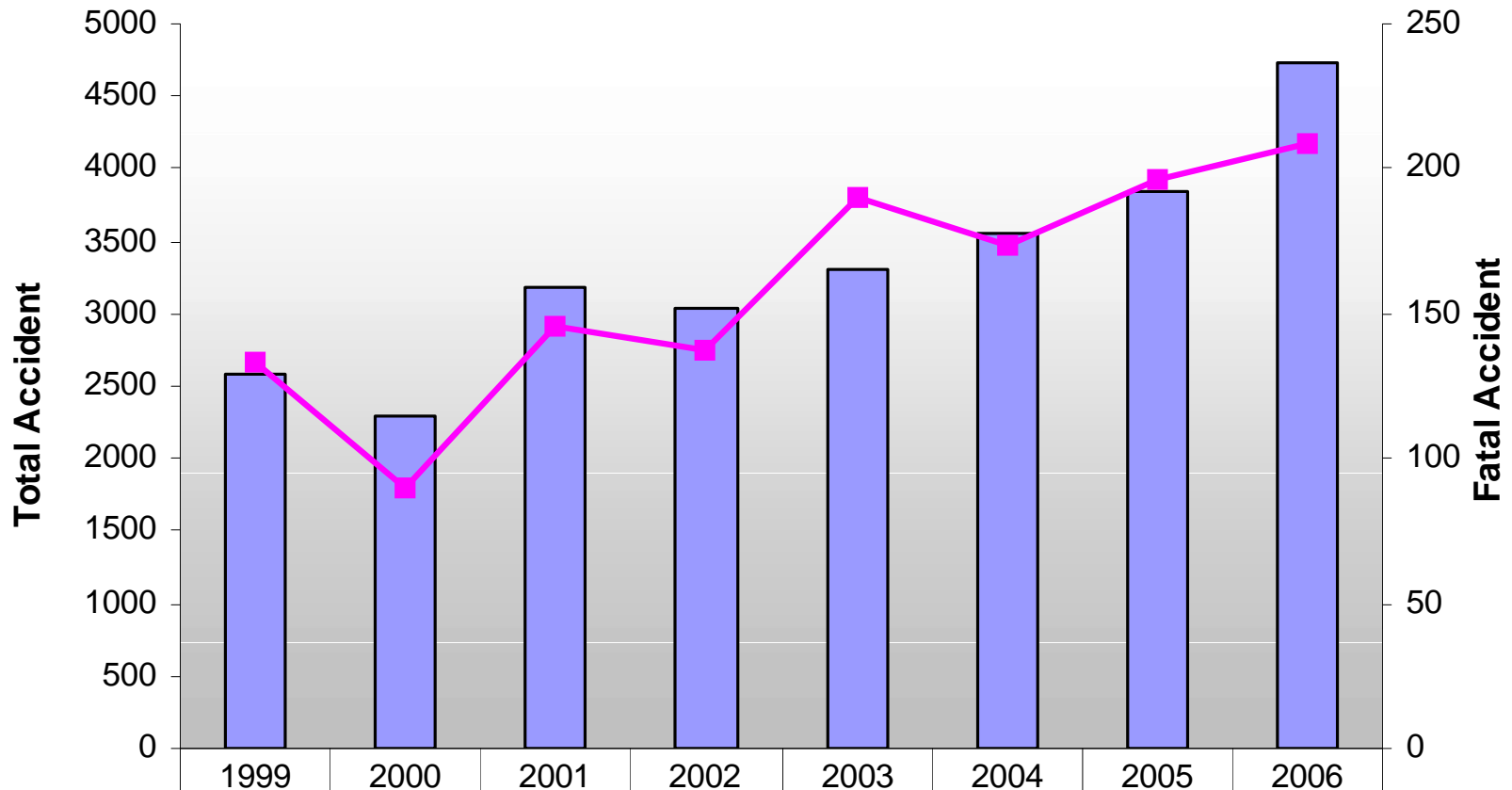
*(a)* radioactive properties or a combination of radioactive properties with toxic, explosive or other hazardous properties of nuclear fuel or radioactive products or waste in, or of nuclear material coming from, originating in, or sent to, a nuclear installation; or

*(b)* ionizing radiation emitted by any other source of radiation inside a nuclear installation;



# ACCIDENT STATISTICS

**TOTAL ACCIDENT & FATAL ACCIDENT REPORTED TO DOSH**



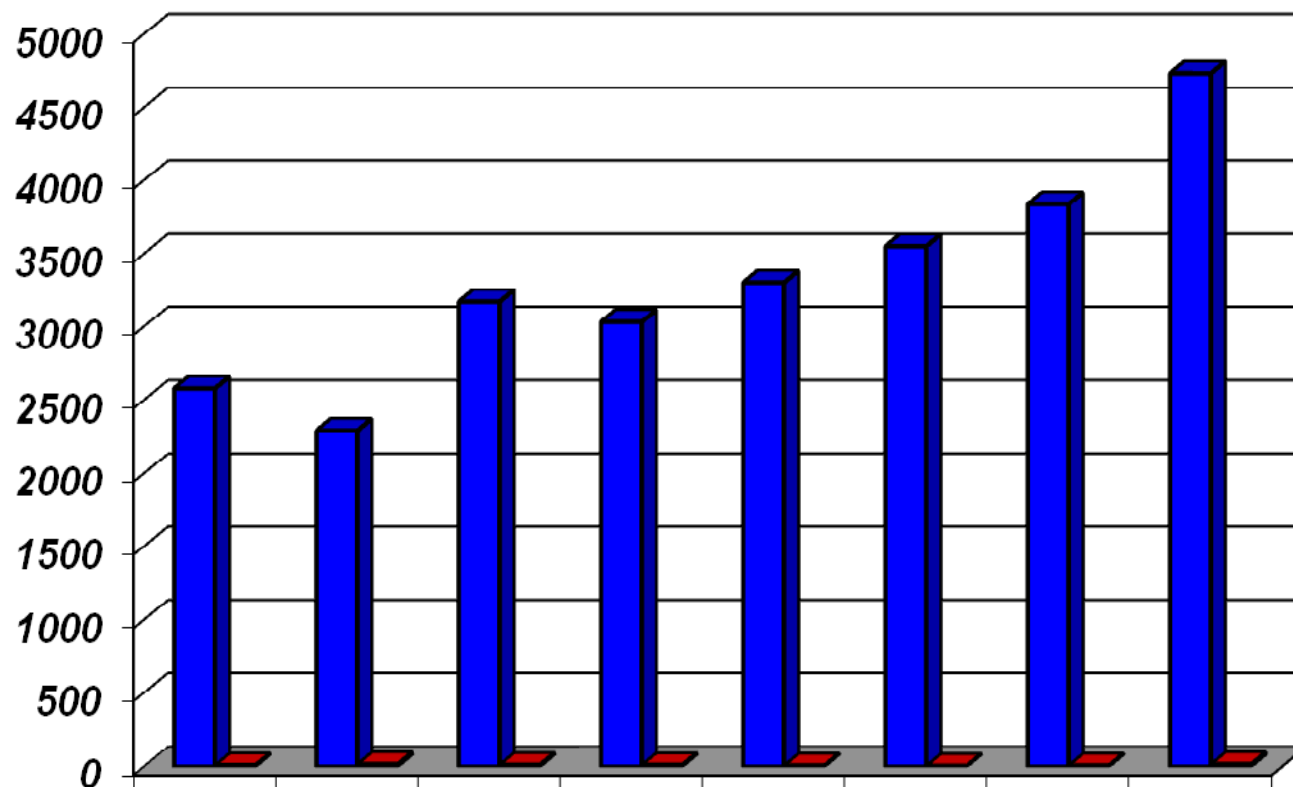
Source:  
DOSH

Total Accident	2578	2292	3172	3032	3304	3550	3837	4731
Fatal Accident	133	90	146	137	190	174	196	209



# ACCIDENT STATISTICS (CONT.)

## TOTAL OF ACCIDENT / INCIDENT CONVENTIONAL INDUSTRIES VS NUCLEAR INDUSTRIES



■ Total Accident/Incident in Conventional Ind.	2578	2292	3172	3032	3304	3550	3837	4731
■ Total Accident/Incident in Nuclear Ind.	8	15	11	10	6	4	6	15





## DEFINITIONS – ATOMIC ENERGY LICENSING ACT 1984 (CONT.)

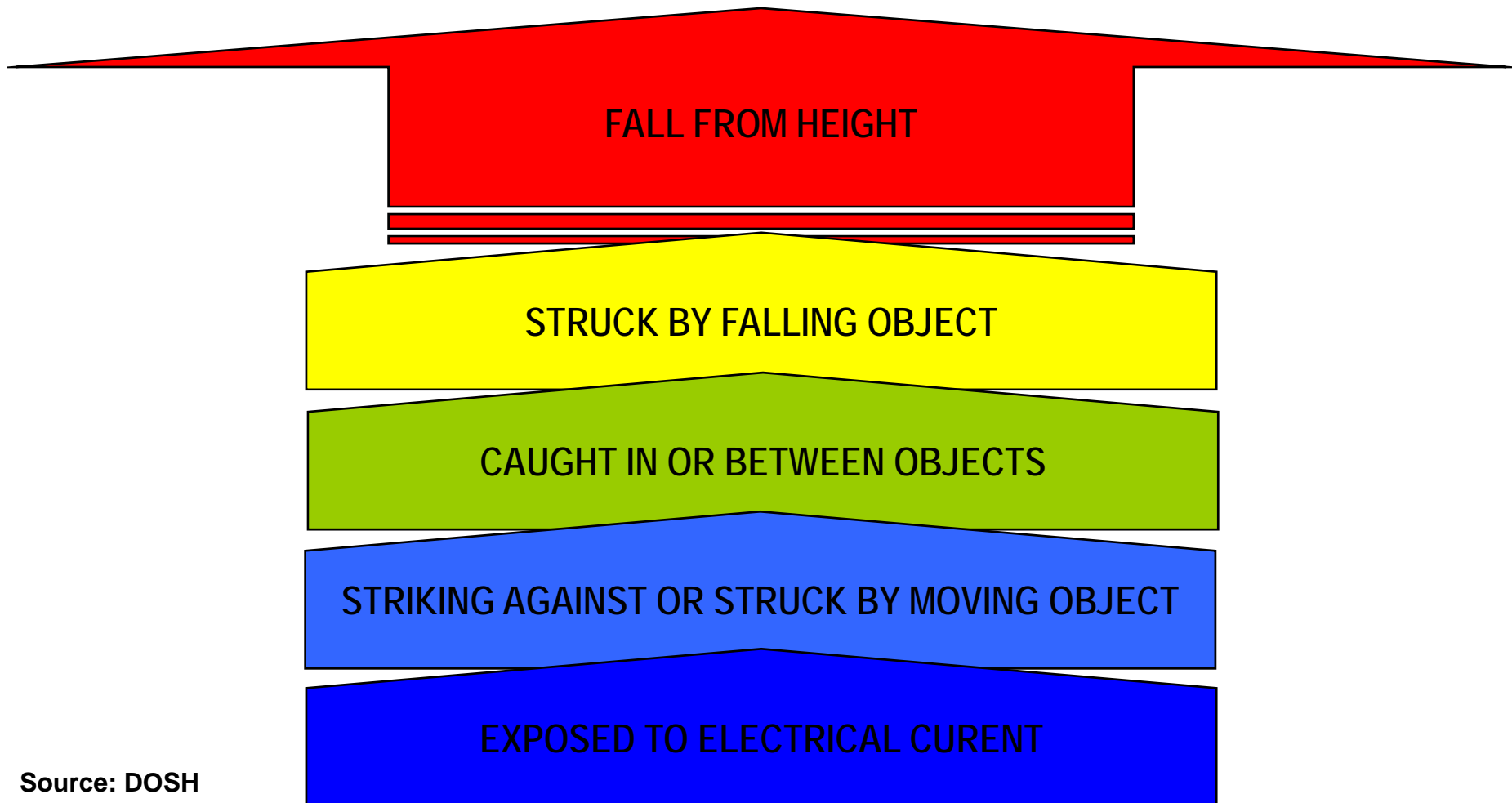
### EXAMPLES OF NUCLEAR INCIDENT IN MALAYSIA

- Dose exceed the annual dose limit of 50 mSv/year
- Radioactive material container leakage
- Radioactive material stuck during oil logging activities (in sea)
- Fire at facilities that uses radioactive material as the gauging tool (to measure level of melted steel in mould)



# TOP 5 KILLERS IN CONVENTIONAL INDUSTRY - 2006

FROM DATA ANALYSIS



Source: DOSH



# WHAT YOU SHOULD DO

**RISK CONTROL**

**RISK ANALYSIS**



**IDENTIFY HAZARDS**





# WHAT IS NEXT

## DOSH

Formulating policy to improve:

- Enforcement
- Promotion
- Standard Setting

## INDUSTRY

Better OSH management:

- OSH MS
- Strategic Alliances (Government & NGO's)
- Good neighborhood



DOSH

**THANK  
YOU**



Return to Session 1