Organisation de Coopération et de Développement Economiques Organisation for Economic Co-operation and Development OLIS : 20-May-1999 Dist. : 21-May-1999

**English text only** 

ENVIRONMENT DIRECTORATE
JOINT MEETING OF THE CHEMICALS COMMITTEE AND THE WORKING PARTY
ON CHEMICALS

Task Force on Harmonisation of Classification and Labelling

**Expert Group on Classification Criteria for Mixtures of the Task Force on Harmonisation of Classification and Labelling** 

DRAFT SUMMARY REPORT OF THE WORKSHOP ON FAMILIARISATION WITH EXISTING CLASSIFICATION SYSTEMS FOR MIXTURES

4th Meeting of the OECD Expert Group on Classification Criteria for Chemical Mixtures, 28th - 29th June 1999, Dublin, Ireland, beginning on 28th June at 9.30 a.m.

### DRAFT SUMMARY REPORT

#### Introduction

- 1. A one-day Workshop preceding the 3rd Meeting of the Expert Group on Classification Criteria for Mixtures was convened to familiarise delegates with the major existing classification systems for mixtures. The Workshop was structured around a series of chemical mixtures selected to illustrate conceptual, technical and practical differences between existing systems and, more importantly, to identify commonalities. The list of Workshop participants is added to this summary report as Annex 1.
- 2. The chemical mixtures were selected to cover the following categories: Industrial Products, Metal Alloys, Consumer Products and Pesticides. The major systems covered were: the EU Dangerous Preparations Directive (covering all preparations, irespective of their use), the US Hazard Communications Standard, Canadian WHMIS, US FIFRA, US CPSC and the Canadian CCCR. Unfortunately, the UN Transport system was not included in the excercise but will be added to the written material.
- 3. The material used at the Workshop to illustrate similarities and differences between the various systems contained in Annexes 2-5, for the industrial product examples, the stainless steel example, the consumer product examples and the pesticide comparison respectively.

### **Industrial Products**

### **Dilution Principle**

4. The EU conventional method incorporates the concept of dilution which results in classifying a mixture into step-wise levels of severity for some endpoints. For example, Very Toxic, Toxic and Harmful for acute oral toxicity. The US and Canadian systems assume the mixture has the hazard of the ingredient.

### Hazard Identification vs. Classification

5. The US and Canadian systems identify the potential hazards of the mixture while the EU system classifies the mixture into the existing EU hazard categories.

### "Additive" approach

6. For Acute Lethal Toxicity, the EU system adds the effects for all routes of exposure (oral, dermal, inhalation) to determine if the mixture is classified. The US and Canadian systems consider each route of exposure separately and do not add multiple component effects.

### **Professional Judgment**

7. The US and Canadian systems allow for the use of professional judgment/bridging data to read across results of testing to similar products. These practices are based on sound scientific principles. Currently, the EU allows this but very narrowly defines a "similar product." In the coming EU Directive bridging data will be possible based on scientific data and will become similar to the US and Canadian system.

### **Metallic Alloys**

8. Metallic alloys have specific physical, chemical and toxicological properties distinct from their elemental constituents and as such do not fit easily into either the existing EU or North American Classification Systems. In the European Union system for example, stainless steel alloys containing 1% or

more of nickel are classified as carcinogenic and the use of CMR test data is not allowed. In the North American system, alloys containing 0.1% or more of nickel are likewise classified as carcinogenic. However, the use of test results and bridging data are allowed.

9. In both jurisdictions, the use of test data for other endpoints such as dermal sensitization are allowed.

### **Consumer Products**

- 10. The consumer products examples illustrated differences in approach among the existing systems which apply to chemical products in the consumer use setting.
  - The EU applies the same system consumer products as for industrial chemicals in terms of classification. Thus, these products are subject to the same rules regarding the type of data used to classify chemicals, and the conventional method is applied in the absence of data on the mixture as a whole.
  - The Canadian consumer product system differs from the WHMIS Workplace Approach. It is currently based on a list of covered products but is being revised to be criteria-based.
  - The US system also differentiates between products in the workplace and in the consumer use setting. While the US workplace system uses a standardized system of concentration limits/cut-off percentages to assess the hazards of untested mixtures, the US Consumer Product Safety Commission (CPSC) does not use this approach to the classification of consumer products under the Federal Hazardous Substances Act (FHSA). The US approach to classification of consumer products is based on the need to communicate the "likelihood of harm" to consumer users of chemicals. To accomplish this, once a hazard is identified, there is a process to assess potential exposures and to determine the likelihood of harm (or risk) anticipated under expected conditions of consumer use or reasonably foreseeable misuse (including, for example, accidental ingestion by young children of chemicals used in the home). Thus, a consumer product label may not include all of the hazards included in the workplace label because of limited anticipated consumer exposure. This is particularly true in the case of chronic effects such as reproductive hazards, as illustrated in Example 2.

### **Data Used for Classification**

11. With regard to the data used for classification, the US consumer product system expresses a preference for human data and experience. A wider range of test data is permitted to be used as long as the methods are scientifically valid. Bridging data and professional judgement may be used, and may lead to a reduced need for animal testing. The EU system takes a more limited approach to data acceptance, particularly with respect to human experience. However, positive human evidence will override negative animal test results in both systems.

## ENV/JM/HCL/M(99)2

## **Pesticides**

- 12. For pesticides normally test data on the formulation are required for the acute lethal effect (all three routes of application), skin and eye irritation/corrosion, and sensitization to achieve a registration. Bridging of data is normally accepted in the US and in the EU.
- 13. Although chronic effects are assessed, they are not normally labelled in the US system.

## Annex 1

# List of Participants to the Workshop on Familiarisation with Existing Classification Systems for Mixtures

# Paris, 1st February 1999

## ALLEMAGNE/GERMANY

Mr NEUSTADT, T. Tel: 49-231 9071 586
BAUA Fax: 49-231 9071 611
Federal Inst. for Occupational Safety E-mail:amst@baua.do.shuttle.de

POB 170202

D-44149 DORTMUND

Friedrich-Henkel-Weg 1-25

## **AUSTRALIA/AUSTRALIE**

Mr HOLLAND, Stephen

Manager, Hazardous Substances

National Occupational Health and Safety

Tel: 61-2 9577 9426

Fax: 61-2 9577 9204

E-mail: holland@worksafe.gov.au

Commission GPO Box 58 Sydney NSW 2001

## **AUTRICHE/AUSTRIA**

Ms STOCKER, Eva Tel: 43-1 31304 671
Federal Environment Agency Vienna Fax: 43-1 31304 655
Spittelauer Lände 5 e-mail: stocker@ubavie.gv.at

1090 Vienna

## **BELGIQUE/BELGIUM**

Dr LAKHANISKY, Thaly

Chef de Section, Toxicologie

Institut Scientifique de Santé Publique

Tel: 32-2 642 51 04

Fax: 32-2 642 52 24

E-mail:Thaly.Lakhanisky@iph.fgov.be

16, rue Juliette Wytsman

B-1050 Brussels

CANADA/CANADA

 Mr BRYDON, Jim
 Tel: 1-613 722 9842

 711 Golden Avenue
 Fax: 1-613 724 3084

 Ottawa, Ontario K2A 263
 E-mail:ruth.brydon@ec.gc.ca

Ms HEADRICK, Kim

Health Canada

Fax: 1-613-952 9597

Fax: 1-613 954 2486

Program Development Bureau

E-mail:kim\_headrick@hc-sc.gc.ca

Room 139 Environmental Health Center

Address Locator: 0801A1 Ottawa, Ontario K1A 0K9

Dr SAVARD, JacquesTel: 1 613 990 1154Director, Regulatory AffairsFax: 1 613 993 5925Transport of Dangerous GoodsE-mail: savarjj@tc.gc.ca

Transport Canada 330 Sparks St., 9th Floor Ottawa, Ontario K1A 0N5

ETATS-UNIS/UNITED STATES

Ms LOWE, Mary Frances

International Relations Officer

Bureau of Oceans & Int. Env. Scientific Affairs

Tel: 1-202 736 4660
Fax: 1-202 647 5947
E-mail:mlowe@state.gov

Office of Environmental Policy

US Department of State 2201 C Street, NW

Washington, D.C. 20520

Ms RISPIN, Amy S. Tel: 1-703 305 5989 US EPA Fax: 1-703 308 1805

Office of Pesticide Programs (7506C) E-mail:rispin.amy@epa.gov

Field and External Affairs Division 401 M Street, S.W.

Ms SILK, Jennifer Tel: 1-202-693-2110

Chairwoman, IOMC, CG-HCCS Fax: 1-202-693-1644
OSHA E-mail:Jennifer.Silk@osha-no.osha.gov

200 Constitution Avenue, NW

Room N3655

Washington, D.C. 20210

Washington, D.C. 20460

FINLANDE/FINLAND

Ms SUNDQUIST, Anna-Liisa Tel: 358 3 2608 443

Senior Counsellor Fax: 358 3 2608 425

Ministry of Social Affairs and Health E-mail:Anna-Liisa.Sundquist@stm.vn.fi

PO Box 536

FIN-33101 Tampere

**GREECE** 

M. Yorgos Klidonas Tel: 01.45.02.24.10
Permanent Greek Delegation Fax: 01.45.00.71.55

15, Villa Said 75016 Paris

## JAPON/JAPAN

Dr JONAI, Hiroshi
Senior Researcher
Ministry of Labour

Tel: 81-44 865 6111
Fax: 81-44 865 6116
E-mail: jonai@niih.go.jp:

National Institute of Industrial Health

6-21-1 Nagao, Tama-ku Kawasaki City 214

## PAYS-BAS/THE NETHERLANDS

Mr ROELFZEMA, Henk
Tel: 31-70 340 6965
Ministry of Health, Welfare and Sport
Fax: 31-70 340 5087
Parnassusplein 5
E-mail:h.roelfzema@minvws.nl

2511 VX Den Haag, Postbus 20350

2500EJ Den Haag

## ROYAUME -UNI/UNITED KINGDOM

Ms BAINS, SharanTel: 44-171 717 6183Health and Safety ExecutiveFax: 44-171 717 6221Chemicals Policy DivisionE-mail:sharan.bains@hse.gov.uk

6SW Rose Court 2, Southwark Bridge London SE1 9HS

## SUEDE/SWEDEN

Ms OREDSSON HAGSTROM, Brita Tel: 46-8-730-6727
Hazard & Risk Assessment Division Fax: 46-8-735-7698
Nationa Chemicals Inspectorate E-mail:britao@kemi.se.de

P.O. Box 1384

Solna

EC

Mr SCHUBERT, Roland Tel: 32-2 295 0504 European Commission Fax: 32-2 295 0281

DG ÎII/C/4 E-mail: roland.schubert@dg3.cec.be

Rue de la Loi 200 B-1049 Bruxelles

Belgium

UNCETDG

Dr. Sergio BENASSAI Tel. +39.06.500 72937

Agenzia Nazionale per la Protezione dell'Ambiente Fax: +39.06.500.72078

Via Vitaliano Brancati 48

100144 Roma

Italy

CONCAWE

Dr. R. A. J. Priston- Principle Toxicology Adviser Tel: +44 (0) 171 934 2796

Shell Centre Fax: 44 (0) 171 934 7627 London SEI7NA E-mail: Robert.A.Priston@Opc.shell.com

**BIAC** 

UK

Mr BRIGANDI, P. W. Tel: 1-609 224 4614 Fax: 1-609 224 4653 Mobil Oil Corporation

PO Box 310 E-mail:paul\_w\_brigandi@email.mobil.com

600 Billingsport Road Paulsboro, NJ 08066-0310

USA

Tel: 1-919 544 77 22 Dr CURCIO, Lawrence N. NIPERA Fax: 1-919 544 77 24 E-mail:lcurcio@nipera.org

2605 Meridian Parkway

Suite 200

Durham NC 27713

USA

Ms DERO, Brigitte Tel: 32 2 775 6313 Eurométaux Fax: 32 2 779 0523 Email:dero@eurometaux.be

Avenue de Broqueville 12

B-1150 Brussels

Belgium

Dr DONNELLY, P. J. Akcros Chemicals Ltd Akcros Headquarters Eccles Site, Bentcliffe Way Eccles Manchester M30 )BH UK	Tel: 44-161 787 1253 Fax: 44-161 787 7518 E-mail:peter.j.donnelly@akcros.com
Mr FOERSTER, R. U. Dupont de Nemours GmbH Du Pont Strasse 1 D-61352 Bad Homburg v.d.H. Germany	Tel: 49-6172 872 005 Fax: 49-6172 872 013 E-mail:Ralf-Udo.Foerster-1@deu.dupont.com
Mr HAMAIDE, Noel CEFIC 3, rue Claude Debussy 78530 BUC France	Tel: 33-1 39 56 59 34 Fax: 33-1 39 56 59 34 E-mail:nhamaide@club-internet.fr
Ms HILGERS, Genevieve Procter & Gamble Europe Eurocor N.V. Temselaan 100 B-1853 Strombeek-Bever Belgium	Tel: 32 2 456 2198 Fax: 32 2 456 2850 E-mail:hilgers.g@pg.com
Dr KOHRMAN, Karen The Procter and Gamble Company Miami Valley Laboratories PO Box 538707 Cincinnati OH 45253-8707 USA	Tel: 1-513 627 26 70 Fax: 1 513 627 11 67 E-mail:kohrman.ka@pg.com
Mr MORLEY, Mike Nickel Development Institute Uplands, Little Birch Hereford HR2 8AZ UK	Tel: 44-1981 54 05 10 Fax: 44-1981 54 05 10 E-mail:morley04@globalet.co.uk
Mr NASH, Stephen M. Eli Lilly and Company Lilly Corporate Center Indianapolis, Indiana 46285 USA	Tel: 1 317 276 3537 Fax: 1 317 276 1800 E-mail:s.nash@lilly.com

### ENV/JM/HCL/M(99)2

TUAC

Mr GREEN, Reg
Health, Safety and Environment Officer
Fax: 32-2 626 2020
Fax: 32-2 648 43 16
F-mail:reg.green@icem.org

109, avenue Emile de Béco

B-1050 Brussels

Belgium

Ms MARKOWITZ, Adrienne

Director of Health and Safety

Retail, Wholeseale & Dept Store Union

Tel: 1-212 684 5300

Fax: 1-212 779 2809

E-mail:RWDSU@aol.com

AFL-C10, CLC 30 E. 29th Street New York, NY 10016

USA

OCDE/OECD

Dr. KOETER, Herman

Environmental Health and Safety Division

Environment Directorate

Tel: +33-1 45 24 98 61

Fax: +33-1 45 24 16 75

Email:Herman.Koeter@oecd.org

# Annexes 2-5

**ANNEX 2 "The Industrial Products Examples"** 

**ANNEX 3 "The Stainless Steel Example** 

**ANNEX 4 "The Consumer Product Example"** 

**ANNEX 5 "Pesticide Comparisons"** 

These documents are <u>not</u> available electronically, please contact the OECD Secretariat for copies.