### **RECOMMENDATIONS ON SAFETY, HEALTH**

# Joint ECTA-EPCA-CEFIC WORKING Group

### AND ENVIRONMENTAL MANAGEMENT

### PRACTICES FOR LOGISTICS SERVICE PROVIDERS









ISSUE1 • April 2002

### ISSUE 1 - April 2002

Recommendations on Safety, Health and Environmental Management Practices for Logistics Service Providers

#### **CONTENT OF BOOKLET**

4	Objective & Scope
5	Safe Management Practices
	1. Commitment & Awareness of SHE-Policies
	2. Data, Information & Regulations
	3. Risk Assessment & Reduction
	4. Selection & Monitoring of Subcontractors
	5. Specification & Maintenance of Equipment
	6. Training
	7. Reporting & Evaluation of Incidents & Accidents
	8. Emergency Response
	9. Control of Operations
	10. Auditing
10	Reference List
10	Contacts

RECOMMENDATIONS ON SAFETY, HEALTH AND ENVIRONMENTAL MANAGEMENT PRACTICES FOR LOGISTICS SERVICE PROVIDERS

## OBJECTIVE & SCOPE

Logistics service providers need to have management systems in place to ensure that the risks arising from the transport of chemicals have been fully identified and are being properly controlled and managed.

The recommendations on safe management practices contained in this booklet address the different elements of the management systems that chemical logistics service providers should have in place in order to ensure that the transport and associated handling of chemicals is unlikely to have adverse safety, health and environmental (SHE) impacts.

Implementation of these recommendations should result in a continuous improvement in the safety and environmental performance of the logistics service providers.

These recommendations apply to the transport of chemicals by the different modes of transport. They also apply to other distribution activities associated with the transport of chemicals, carried out by logistics service providers, such as storage, loading and unloading and to any subcontractors who are working on a contract basis for logistics service providers.

Implementation of the current recommendations on SHE management practices will fulfil most of the requirements of the Safety and Quality Assessment Systems (SQAS) developed by CEFIC.



## Safe Management Practices

#### 1. Commitment & Awareness of SHE-Policies

#### Management Practice

The logistics service providers should have clear safety, health and environmental policies in place, which emphasize the paramount importance of safety and the protection of employees, customers, the public and the environment from the adverse effects of all logistics operations, whether carried out by or on behalf of the company.

#### **Guiding Principles**

The policies should outline the organisation, arrangements and responsibilities for achieving the required results and should be known and understood by all employees. Prime responsibility should lie with line management who should be required to demonstrate a high level of commitment to safety, health and environmental protection not only in terms of logistic operations but also in terms of personal behaviour. Management must lead by example in order to influence positively workers attitude and behaviour and to continuously improve the safety culture within the company.

#### The Policies should:

- be signed either by the Chief Operating Executive on the site, or alternatively by the Chairman or Managing Director of the company, reflecting the fact that the overall responsibility for SHE rests at the top of the organisation.
- · be reviewed at regular intervals, or following any major change in company organisation.
- recognise the importance that individuals play in achieving successful implementation.
- · be supported with goals and targets.

#### 2. Data, Information & Regulations

#### Management Practice

The logistics service provider needs to ensure that he has an effective system in place for the receipt and collection of appropriate technical product data from the shipper for all the products he is handling. A system should be in place to ensure that any changes in these technical data are taken into account.

The logistics service provider also needs to have a system in place for the interpretation and application of all relevant national and international regulations and industry codes covering transport and related operations, as well as for monitoring and implementing of any changes in these regulations and codes.

#### **Guiding Principles**

Within the organisation of any logistics service provider, a qualified person should be designated to interpret and disseminate SHE information relating to all products that are handled. This information should be used as the basis for the selection of appropriate transport equipment, provision of training, safe operating procedures and the labelling of vehicles.

The data should be reviewed whenever there are changes in regulatory or product technical data, in classification and any consequential changes communicated to relevant personnel.

It is the task of the Dangerous Goods Safety Adviser, under the responsibility of the head of the undertaking, to facilitate by

all appropriate means and actions that all the transport activities and related loading or unloading of dangerous goods are carried out in accordance with the applicable rules and in the safest possible way.

#### 3. Risk Assessment & Reduction

#### Management Practice

A system should be in place with which it is possible to assess and reduce potential risks in the logistics chain. The system should identify, evaluate and continuously reduce potential risks by taking into consideration the hazards of chemical products during the operations of containing, packing, handling, transporting and storing them. The system should take into account all risks of possible accidents, which may cause human and environmental exposure at production plants, final customer sites, storage facilities and during transport movements.

#### **Guiding Principles**

As part of the risk assessment process all operations should be classified into groups according to their potential risk to adversely affect people and the environment. The methodologies which are used to assess the risk vary considerably.

The result of the assessment, whatever method is chosen, enables all operations to be ranked according to their risk level. The company should then determine the need for and the application of risk reduction measures.

Effective risk management should be regarded as a continuous process. The process should be repeated at regular intervals, based on practical experience and incident evaluation, to constantly improve the process. Higher risk activities should receive more frequent reviews. A risk assessment should also be carried out each time there is a significant change in the operational activities (e.g. handling of new products, use of new equipment, changes in operating procedures). All new projects should be evaluated at an early stage, to assess the acceptability of the risks compared with regular activities.

#### 4. Selection & Monitoring of Subcontractors

#### Management Practice

The logistics service providers should have a system in place for selection and monitoring of their subcontractors. This system should emphasize safety and environmental performance, regulatory compliance, equipment maintenance and training. Furthermore it should ensure regular review of safety and environmental performance and the implementation of necessary improvements.

#### **Guiding Principles**

#### Subcontractors should:

- be technically competent to carry out the work, using properly maintained equipment.
- have the commitment, resources and management structure to work according to the logistics service provider's SHE standards.
- have appropriate training arrangements for their personnel to provide them with a high degree of safety awareness.
- be able to demonstrate that they have the necessary skills and procedures to carry out the subcontracted work in a safe manner.
- · have systems in place to ensure that operations comply fully with relevant legislation and industry standards.
- · have systems in place for accident/incident reporting.

In order to ensure the implementation of the above requirements, various systems have been developed for the auditing, selection and monitoring of subcontractor; e.g. Safety and Quality Assessment System (SQAS), developed by the European Chemical Industry Council (CEFIC).

#### 5. Specification & Maintenance of Equipment

#### Management Practice

A system should be in place, which ensures that all equipment is appropriate for the (chemical) products which are stored, handled and transported. All equipment must comply with the relevant legal requirements and must be maintained in proper condition. A system should be in place for immediate reporting and prompt correction of any equipment defects.

#### **Guiding Principles**

A system should be in place requiring a written specification for purchase or lease of any equipment. These written specifications should take into account the joint CEFIC/ECTA/EPCA 'Guidelines for Standardisation of Road Transport Equipment' and the joint CEFIC/ECTA/EPCA 'Requirements for the design, construction and testing of standard rail tank cars for the carriage of liquid chemicals in bulk' - to be published in 2002.

Effective maintenance programmes should be in place, which require that all equipment (owned, leased or subcontracted) is adequately maintained to prevent and detect defects before they cause accidents or breakdowns.

#### 6. Training

#### Management Practice

A system should be in place to ensure that the training needs of all employees are identified and satisfied in an appropriate and adequate manner so that all operations are carried out safely and with proper regard for environmental protection.

#### **Guiding Principles**

Systems should ensure that the training needs are regularly reviewed so that all employees are competent at all times to carry out the duties for which they are responsible. In particular, it should be reviewed whenever there are significant changes in the work carried out or in the equipment to be used.

Training must take account of any statutory regulations but should also reflect industry codes or standards relevant to the work.

A designated person within the company should co-ordinate and manage the provision of training and maintain appropriate training records.

#### 7. Reporting & Evaluation of Incidents & Accidents

#### Management Practice

A system should be in place for the recording of all accidents, incidents and potentially hazardous situations, and for identifying and implementing preventive measures.

#### **Guiding Principles**

There should be a written reporting procedure to ensure the proper logging of all accidents and incidents, and communication to all parties concerned. Ownership and stewardship of the reporting system should rest with a nominated senior manager within the company. The system should be well understood by all personnel and by all subcontractors to ensure that all incidents/accidents are reported.

Each accident or incident should be investigated. In addition to the identification of the immediate cause, the root cause of the accident or incident should also be ascertained. Corrective actions should be identified to prevent a recurrence of similar events.

All accident/incident reports should be periodically analysed to search for trends and common causes. Identification of trends allows additional improvements to be developed.

Similar principles apply to the investigation and reporting of potentially hazardous situations.

Employees and all subcontractors should be encouraged to make use of the reporting system as a means for continuous improvement.

The reporting system should take into account the joint CEFIC/EPCA/ECTA 'Guidelines for Standardised Delivery Performance Measurement'- Issue 2 April 2002.

#### 8. Emergency Response

#### Management Practice

A system should be in place to enable a rapid and effective response to any accidents occurring during logistics operations.

#### **Guiding Principles**

The logistics service providers should have an emergency plan for responding to any accident. This emergency plan should contain:

- · action to be taken in case of different types of emergencies.
- · individual responsibilities.
- arrangements for handling incoming emergency calls.
- arrangements for 24 hours coverage.
- training requirements of the responsible personnel.
- the specific arrangements required by individual customers.
- a list of the different parties to be informed with their contact details (customers, authorities,....).

Exercises should be held at appropriate intervals to test communications and practical response.

Ownership of the Emergency Response Plan should rest with a nominated person, who should be responsible for ensuring that the plan is kept up to date, that individuals are trained as required, that training records are kept, that emergency equipment is regularly checked for completeness and continued suitability and that exercises are held at appropriate intervals.

#### 9. Control of Operations

#### Management Practice

Systems should be in place to ensure that day-to-day operations are carried out in compliance with legislation, industry codes and standards, to protect people and to minimise impact on the environment.

#### **Guiding Principles**

The company should identify and prepare an inventory of all the operations that are carried out. Each operation should be broken down into its individual tasks. Procedures should be developed for each task and the responsibility for completing that task should be clearly defined. The operating procedures should cover the selection of proper equipment for handling the products taking into account their hazards and relevant national or international legislation and the precautions to be taken both in normal and emergency situations.

Where the operation involves interfaces with third parties, procedures should ensure full alignment.

Procedures should be updated whenever changes occur in the legislation or in industry codes and standards. Procedures should be regularly reviewed, covering all aspects of the operation.

#### 10. Auditing

#### Management Practice

A process should be in place for the regular internal auditing of the SHE management system. Deficiencies observed during audits should be recorded, their implications assessed, and remedial actions prioritised and implemented.

#### **Guiding Principles**

The objectives of auditing can be summarised as follows:

- to review the implementation of company SHE policies.
- to verify compliance with legislation, industry codes and standards.
- to promote awareness of SHE protection.
- to assess the SHE performance.

Auditing is an integral part of the management process. The responsibility for auditing and implementing remedial measures rests with line management, although specialists can assist in developing audit procedures and in auditing.

An audit plan should be developed which is appropriate to the size and scope of the company's operations. This should incorporate all aspects of the company's SHE management system.

The internal audits should be carried out by people trained in auditing and evaluating techniques. A significant portion of auditing can be carried out by the local management. On occasion, it may be appropriate to have external audits by auditors who are independent of the location or even of the company to be audited.

Based on the recommendations of the audit report, there should be an action plan with follow up to which line management is fully committed.



### REFERENCE LIST REFERENCE LIST

Joint CEFIC/ECTA/EPCA Guidelines for Standardisation of Road Transport Equipment, Issue 1/November 1999

Joint CEFIC/ECTA/EPCA Requirements for the design, construction and testing of Standard Rail Tank Cars for the carriage of liquid chemicals in bulk, to be issued 2<sup>nd</sup> semester 2002

Joint CEFIC/ECTA/EPCA Guidelines for Standardised Delivery Performance Measurement, Issue 2/April 2002

CEFIC SQAS Road Questionnaire and Guidelines, September 2001

CEFIC Recommendations on Safe Management Practices in Distribution, March 1993

CIA Guidance on Implementation of CEFIC Safe Management Practices in Distribution, March 1997

Joint CEFIC/ECTA/EPCA Guidelines for Safety Awareness and Behaviour in the Supply Chain, Issue 1/April 2002

Joint CEFIC/EPCA/ECTA Guidelines on Subcontracting, in preparation





#### Bernhard Haidacher

LKW Walter Internationale Transportorganisation AG Zellerstrasse 1 A-6330 Kufstein

#### Jos Verlinden

SQAS Manager CEFIC European Chemical Industry Council Avenue E. Van Nieuwenhuyse 4, bte 1 B-1160 Bruxelles

#### Chris Borgmans

Purchasing Manager Dry Cargo DSM Physical Distribution Poststraat 1 NL-6135 Sittard Tel. +43 577 77 4331 Fax +43 577 77 54331 Haidacher@LKW-Walter.com

Tel. +32 2 67 67 395 Fax +32 2 676 74 32 jve@cefic.be

Tel. +31 464 773 884 Fax +31 464 770 003 Chris.Borgmans@dsm-group.com











Avenue de Tervueren 149 Tervurenlaan - 1150 Brussels - Belgium Tel.: (32/2) 741 86 81 • Fax : (32/2) 741 86 82 • E-mail: ecta@epca.be