Directive concerning the storage of gas cylinders LEX 1.5.6

10th June 2013, status as at 15th March 2021

This text is no longer in force

The Direction of the Ecole polytechnique fédérale de Lausanne hereby adopts the following:

Preamble

There are different types of gas: inert, inflammable, toxic and/or oxidant. This directive determines the storage instructions and quantities of compressed gas authorised on premises. It also determines the measures to take in case of accident.

Section 1 Instructions

Article 1 General measures

- ¹ All compressed gas cylinders must be stored in a secure cabinet of the EI90 type minimum. Cabinets must be ventilated in accordance with established security regulations (which can be consulted <u>here</u>). A detector, in the place of use and in the cabinet, with servo control must be present for toxic and/or inflammable gases. A detector may be installed in cases deemed particularly hazardous (for example, large quantities of CO₂).
- ² Gas cylinders must be physically separated according to their chemical incompatibilities¹.
- ³ No cylinders of 50 I to 200 bars must be present in the premises outside of the cabinets.
- ⁴ For any special needs that may require greater quantities than those specified above, a possible dispensation may be requested by contacting the Department of Security, Safety and Facilities Operations (DSE-OHS).

Article 2 Maximal gas volume

- ¹ The total maximum number of gas cylinders authorised per premises is 4.
- ² **Inert gases**: the maximum volume of inert gas authorised per premises outside of cabinets is 2 Nm^3 . For one cylinder, $\text{Nm}^3 = \text{p (bar)} \cdot \text{V (I)} / 1000$.
- ³ **Inflammable gases**: the maximum volume of inflammable gas authorised per premises outside of ventilated cabinets is 0.8 Nm³ (maximum 2 out of 4 cylinders).
- ⁴ **Toxic gases**: the maximum volume of toxic gas authorised per premises outside of ventilated cabinets is 0.2 Nm³ (maximum 2 out of 4 cylinders).
- ⁴ **Oxidant gases**: the maximum volume of oxidant gas authorised per premises outside of ventilated cabinets is 0.8 Nm³ (maximum 2 out of 4 cylinders).

Section 2 In case of accident

Article 3 Turn off the gas supply

Close the valve whenever possible.

Article 4 Immediately alert 115

Try to gather ad hoc information concerning the gas or mixture involved in the accident.

Directive on **Gaz liquéfiés, 1ère partie**; Récipients, stockage, transvasement et remplissage (# 1941) Information sheet: **Bouteilles à gaz, Entrepôts, rampes, systèmes de distribution de gaz (#** 66122)

Version 1.3 1/2

¹Directive on **Laboratoires chimiques (#** 1871)

Section 3 Final provisions

Article 5 Entry into force

The present directive entered into force on 10th June 2013 (version 1.1) and was revised on 18th May 2020 (version 1.2) and on 15th March 2021 (version 1.3).

On behalf of the EPFL Direction:

President: Martin Vetterli Director of Legal Affairs: Françoise Chardonnens

Version 1.3