



REsilience Support for critical Infrastructures through Standardised Training on CBRN

Extract of WP2 Results Validated list of Modules and Equipment

This project was funded by the European Union's Internal Security Fund – Police. The content of this report represents the views of the author only and is his/her sole responsibility. The European Commission does not accept any responsibility for use that may be made of the information it contains.

EXECUTIVE SUMMARY

As agreed during the workshop held in Rome on February 5, 2020, this deliverable reports the Final Output of WP2, focusing on the validation of priority training modules for CIs operators and the requirements for the Basic Equipment Kit.

The aim of the Validation Workshop was presenting, discussing and validating the findings related to the studies conducted as part of Work Package 2. The Workshop was structured in three main sessions:

- Revision of the Categorisation of CBRN events.
- Presentation and discussion of the Training Needs Assessment (TNA).
- Presentation and discussion of the Equipment Needs Assessment (ENA).

A parallel session dedicated to CI representatives was held to engage public and private operators of Critical Infrastructures in the set-up and testing of a tailor-made CBRN capacity building programme for the creation of the first 10 European “CBRN Intervention Groups”, trained and equipped to operate in contaminated environments.

In line with the Project Proposal, the Validation Workshop Outputs reported in this deliverable - let alone the final steps of WP2 (“Categorization of CBRN events and Assessment”) before the “Preparation of Training Curricula and Intervention Kit” as foreseen by WP3 - are:

- The production of a list of focal horizontal and sector specific training modules for CIs operators.
- The definition of technical specifications for Personal Protective Equipment to be included Intervention Basic Kit.

1. PRIORITY TRAINING MODULES

The training needs of CI operators informed the identification of focal basic Training Modules targeted to the identified CIs and produced for operators with no prior knowledge of CBRN events.

Besides outlining the content of each of the modules, during the Validation Workshop project partners reached consensus on the duration (5-days) and the period (between September 2020 and May 2021) of the course. Ideally, each of the sessions will target a single CI sector. Least but not last, partners agreed about concluding each of the 5-day sessions with a simulation/exercise at the Joint NBC School in Rieti.

In light of the exchanges occurred during the Workshop, below is a list of validated focal training modules, to be further elaborated under WP3 – “Preparation of Training Curricula and Intervention Kit”.

CBRN TERMINOLOGY AND BASIC CBRN AWARENESS	
TYPES OF AGENTS:	<ol style="list-style-type: none"> 1. Biological risk and threat 2. Chemical agent characteristics 3. Radiological risk and practical aspects about protection against ionizing radiations
EFFECTS:	<ol style="list-style-type: none"> 1. Toxicology of CBRN agents 2. Panic psychology 3. Operational decontamination and rescue of exposed personnel
CBRN HISTORY TO INCREASE RECOGNITION CAPABILITIES	
TYPES OF AGENTS:	<ol style="list-style-type: none"> 1. Biological case study 2. Chemical risk scenarios and emergency response 3. Radiological risk scenarios and past events
PERSONAL PROTECTIVE EQUIPMENT:	<ol style="list-style-type: none"> 1. Illustration of the identified Kit for personal protection 2. Practical activities of donning and doffing 3. Basic principles of personal decontamination
IMPROVED COMMUNICATION WITH EXTERNAL AUTHORITIES FIRST RESPONDERS	
	<ol style="list-style-type: none"> 1. Warning and reporting principles 2. Main CBRN incident indicators 3. Methods for information dissemination in case of a CBRN incident
PRACTICAL EXERCISES	
<p>To achieve optimal results in team activities at each of the CIs, the last training module will require Leaders (II Level course) and Operators (I level Course) to simulate a Practical exercise involving a CBRN event, conducted in specific scenarios emulating the CI where participants operate.</p>	

Table 2 – Validated List of Modules

2. EQUIPMENT INTERVENTION KIT

The second Output of WP2, “Basic Intervention Kit requirements” for CI operators dealing with CBRN events, was validated during the Workshop held at the Istituto Affari Internazionali on 5 February 2020.

Item	Protective Performance Features
Respiratory protective equipment:	The gas mask protects against nerve and blister agents
	The gas mask protects against biological agents
	The gas mask protects against radiological particulates
	The gas mask protects against all TICs/TIMs agent
	The gas mask protects up to 12 h
	The canister mount should be centered, right, or left and interchangeable
	Easily manageable, can be worn for long periods with no effects
	The don/doff time should be less than or equal to 10s
	The gas mask should be monocular
	The field of view should enable from 90 % to 100 % of visibility
	Can be cleaned and reused 25 to 50 times
	Available in different sizes
Protective suits	Able to protect against nerve and blister agents
	Able to protect against biological agents
	Garment has the capability to provide protection against radiological particulates
	Protects against all TICs/TIMs agents
	Should be permeable
	The garment provide protection up to 12 h
	The average time should be <60s for donning and/or doffing; assistance not required
Protective gloves	Can be cleaned and reused from 3 to 5 times
	Able to protect against nerve and blister agents
	Able to protect against biological agents
	Gloves have the capability to provide protection against radiological particulates
	Protects against all TICs/TIMs agents
	Glove has three attributes (textured gripping, rounded fingertips, comparable performance under wet and dry conditions)
Protective overboots	Protects up to 12h
	Able to protect against nerve and blister agents
	Able to protect against biological agents
	Overboots has the capability to provide protection against radiological particulates
	Protects against all TICs/TIMs agents
	Closures available (can be adjusted)
	Sole has met the slip resistance standard
	Protects up to 12h
	Easily manageable, cab be worn for long periods with no effects
	Assistance not needed, boots have a mechanism(s) for donning/doffing
Protective canister	The overboots can be reused
	Protects against nerve and blister agents
	Protects against biological agents
	Able to protect against radiological particulates
	Protects against all TICs/TIMs agent
	CBRN certified
	ABEK2 – P3 certified

Table 2 – List of Validated Equipment Kit