



Swedish Civil
Contingencies
Agency

Joint CBRNE Strategy



Joint CBRNE Strategy

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PREFACE

In your hand you have the second edition of the Joint CBRNE Strategy. It is aimed at all the Swedish actors who operate within – or are affected by – the CBRNE field. The texts have been generally updated and processes aimed at identifying and prioritising the CBRNE areas have been added.

CBRNE, also referred to as hazardous substances, concerns several different organizations, demands a range of competencies and affects every section of society. Extensive collaboration is therefore required to ensure that joint efforts within the field are effective. This Strategy creates the foundation for cooperation and collaboration within the field and specifies a common direction for all the various inputs.

The goals and sub-goals drawn up in 2012-2013 remain unchanged. They were formulated based on a number of fundamental principles which can be found in Annex 6.

The goals of this Strategy are to render joint efforts more effective and strengthen opportunities for cooperation and joint planning. Achieving these targets will also clarify the roles played by the various civil actors and help them to move these issues up to the appropriate level.

This in turn will provide the preconditions for creating and maintaining the nation's capability in the CBRNE field.

Every actor has the responsibility of identifying their roles and working towards the achievement of the goals stated in the Strategy. In order to facilitate implementation, this document also contains guidelines for how actors can work with others to achieve these goals.

Prioritised areas, that is important development areas, have been identified within the framework of these strategic activities. Annex 1 specifies the areas deemed to require urgent development and which will demand commitment and participation on the part of multiple civil actors. Other important development areas are specified in Annex 2.

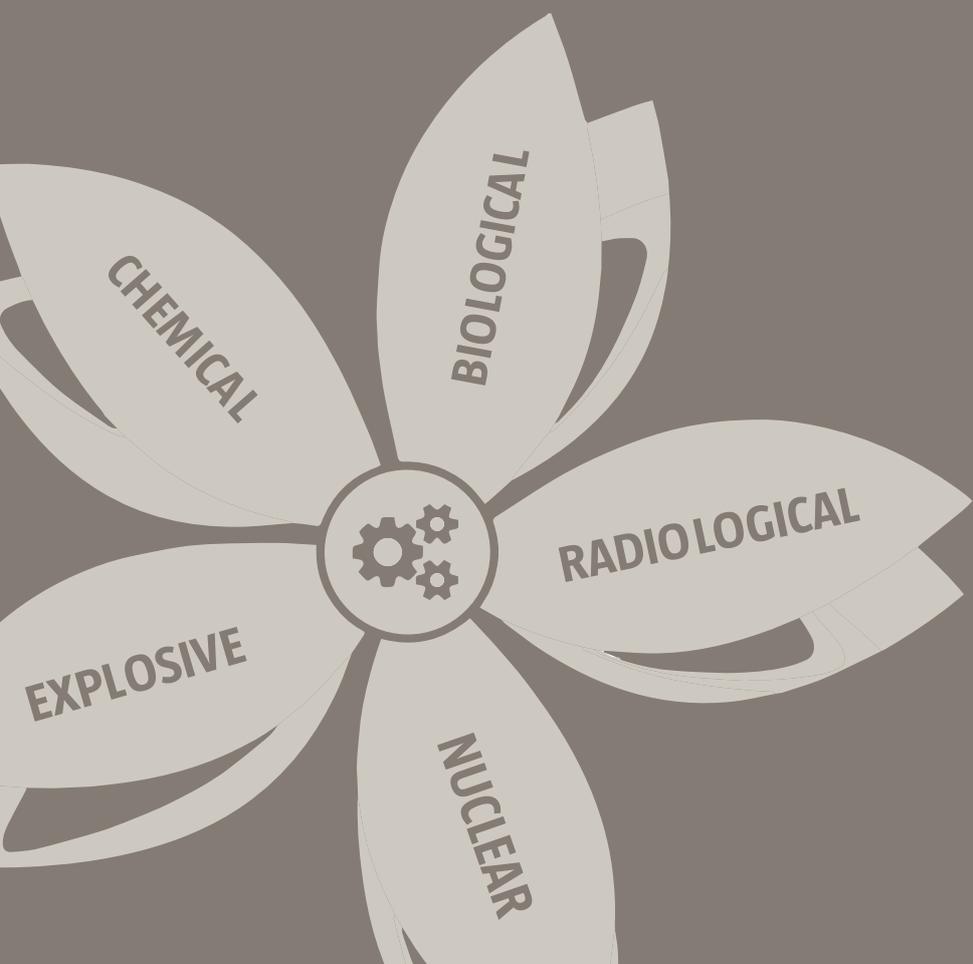
Using this Strategy, we hope to facilitate joint efforts within this complex field. Excellent work has already been carried out but much remains to be done!

March 2016

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INTRODUCTION

Background, aim and goals

Background

The necessity of a strategy within the CBRNE field originated from a desire to direct joint Swedish initiatives in a more effective manner and a will to jointly plan, implement and follow up on efforts within the field, from local up to national level. This need had been identified by the relevant actors, and so the basis of these activities was less a formal assignment and more a shared agreement that a strategic direction for this field was essential. The Swedish Civil Contingencies Agency (MSB) was appointed project manager for these strategic efforts which began in March 2012.

Once the work had begun, MSB was also tasked by the Government to “Develop a joint strategy for the CBRNE Strategy field in cooperation with the relevant actors.” The task of the Strategy was to “specify principles, methods and working methods that generate a robust accident and crisis preparation capability” (Ministry of Defence, 2013).

This work resulted in two documents: A Joint CBRNE Strategy that was reported to Government in December 2013 and a Guide to the Swedish Joint CBRNE Strategy.

In 2014, MSB launched a new joint project whose aim was to establish processes for managing and following up on initiatives within the CBRNE Strategy field and to propose priority areas. Project management comprised representatives from the Ministry of Defence, the Swedish Board of Agriculture, the Swedish Coast Guard and MSB. Results are presented in this updated version of the Joint CBRNE Strategy which replaces the two previous documents. Another purpose of the project was to provide information about the Strategy, and a

more detailed description of information-related initiatives can be found in the report Communicating a CBRNE Strategy, which can be found as an annex to the final project report. (Final Report – Joint CBRNE Strategy – processes and prioritised areas).

Aim and goals

The aim of the Strategy is to establish a common basis and direction for Swedish CBRNE initiatives at every level; from local to international. The goals specified in Chapter 2 are expected to contribute to better and more efficient joint Swedish efforts within the CBRNE field, thus enhancing the preconditions for cooperation and joint planning which in turn can create the opportunity to systematically identify any needs for improvements to Swedish capabilities within this field and can direct CBRNE initiatives in Sweden.

Target groups

The Strategy is to be applied by all Swedish actors who operate within – or are affected by – the CBRNE field. The document is targeted at all actors: municipalities, county administrative boards, county councils and regions, central authorities, voluntary organizations, stakeholder organizations, the Government Offices and private actors.

CBRNE Strategy links to other initiatives and documents

The Joint CBRNE Strategy provides the basis of Swedish CBRNE initiatives and describes a working method that is intended to permeate all CBRNE-related initiatives at all levels; from local to international. There are many comprehensive initiatives and documents that affect the CBRNE field in different ways, for example EU initiatives, Övergripande inriktning för samhällsskydd och beredskap (General aims of civil

protection and preparedness), *Gemensamma grunder för samverkan och ledning vid samhällsstörningar* (Joint grounds for collaboration and management during social disruption), the Swedish Counter-terrorism Strategy and initiatives linked to civil defence.

There are specific activities for certain subject areas that complement the CBRNE Strategy, for example relating to protection from oil spillages, initiatives within the field of Radioactivity and Nuclear (RN) and initiatives within the National Working Group for Explosives Safety (NAG-ExpSec). It is important for the working method specified in the Strategy to permeate these initiatives, but also for future revisions of the CBRNE Strategy to take into consideration and incorporate any other aspects that are generated during specific activities.

Strategy relationship to focus on civil protection and preparedness

In the document Overall focus for civil protection and preparedness (MSB, 2014), a system was presented that the CBRNE Strategy follows, see Figure 1. At the heart of this is the need to protect certain functions (objects of protection) against undesirable incidents (threats). The capability that is to be created relates to the ability to prevent incidents that are at risk of occurring and managing the consequences of incidents that do occur. A number of different actors are responsible for building and maintaining such capability. Developments can be influenced by different types of governing instruments that help to achieve the desired capability.

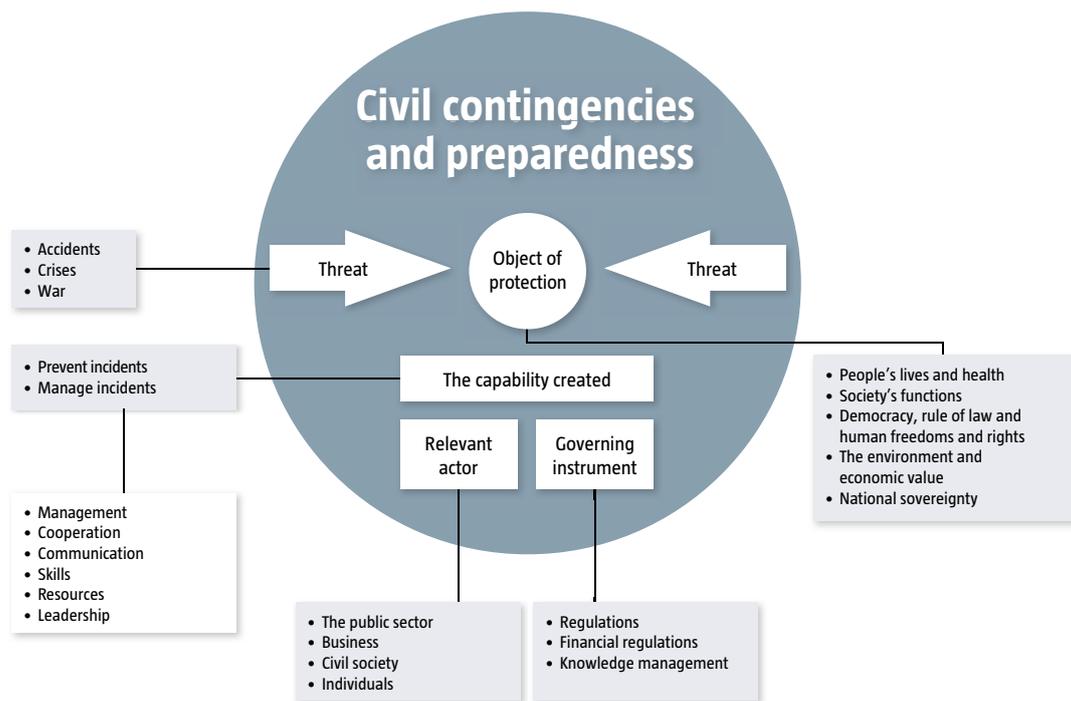


Figure 1. Civil protection and preparedness – a description

Goal 1 of the Strategy – cooperation and coordination – is not linked to any particular part of the figure above, as it applies to fundamental cooperation within the CBRNE field. After this, however, the division of goals follows the system specified in the figure.

Goal 2 – Threats and Risks – specifies how to work with threats and risks within the CBRNE field, corresponding to the boxes objects of protection and threats in the figure.

Goal 3 – Create Capability – specifies how to work to identify the need for, and establish, capability within this field. It is covered by the Capability to be established and Parties who are to take action in the figure.

Finally, Goal 4 – Governing Instruments – specifies how governing instruments can be used to establish CBRNE capability.

Intended application

The Strategy consists of two chapters and seven annexes;

- *Chapter 1* offers fundamental information about the CBRNE subject area and Swedish initiatives.
- *Chapter 2* specifies the goals of the Strategy governing ongoing cooperation, coordination and joint planning within the CBRNE field, along with a description of the management process and the process for establishing priority areas.
- *Annex 1* describes the priority areas established in 2015 and the work planned in relation to them. The list of literature used as a basis for identifying these areas in 2015 is available as a PDF at www.msb.se/cbrne.
- *Annex 2* specifies titles of other areas identified during the course of this work. The list of these areas is subject to confidentiality in accordance with the Public Access to Information and Secrecy Act (2009:400).
- *Annex 3* contains a template that can be used when identifying priority areas. It is available in PDF form at www.msb.se/cbrne.
- *Annex 4* contains a table specifying the planned management process.
- *Annex 5* contains references.
- *Annex 6* sets out the fundamental principle used when goals and sub-goals were established in 2012-2013. It is available in PDF form at www.msb.se/cbrne.
- *Annex 7* contains a list of the actors who participated in these activities to produce the Strategy and the work of establishing priority areas.

How the Strategy is to be used

The Strategy is to be used as part of joint Swedish coordination and development initiatives within the CBRNE field. All actors who operate within, or are affected by, CBRNE should be able to use the Strategy as a basis for joint planning and cooperation, as well as identifying how they can contribute to coordinated Swedish CBRNE initiatives at every level – from local to international.

A number of concrete goals and sub-goals are included in the Strategy relating to cooperation, coordination and joint planning within the CBRNE field. These were established based on principles identified during the course of 2012 (see Annex 6). The goals aim to create coherent processes linked to Swedish CBRNE activities and to provide a working method that can be used to tackle all kinds of issues: needs of national importance, EU initiatives, issues linked to crisis preparedness and civil defence as well as issues such as protection from accidents or crime-prevention initiatives, as long as these have a link to the CBRNE field. Actors identify the goals that affect their own operations and work together with others to achieve the targets that are not currently fulfilled.

There are guidelines linked to each goal explaining how to proceed in order to attain the goals and sub-goals. The guidelines indicate the tools that can be used to attain the goal and are designed in a manner that provides actors at different levels with a guide that corresponds to their individual situation. There are also proposals concerning the tools that must be developed.

Inputs are required from many actors at different levels. Initiatives must be implemented in a coordinated manner and it must be possible to follow them up.

The bases of CBRNE activities

This chapter provides a general description of the meaning of the abbreviation CBRNE, why initiatives are being taken in relation to the CBRNE field, how Swedish organizations within this field are designed and the necessity of cooperation.

What is CBRNE?

CBRNE is the international abbreviation for Chemical, Biological, Radiological, Nuclear and Explosive and is used when describing operations within the areas of hazardous chemicals, infectious agents, radioactive, nuclear and explosive substances. In this Strategy, CBRNE refers to such substances as well as the threats and risks linked to them.

Below is a general description of the various groups of substances:

C substances are chemical substances that could cause harm to plants, animals and/or people, and could include toxic industrial chemicals or chemical weapons.

B substances refer to microorganisms, cell cultures, toxins and parasites that could cause infection, allergy or toxicity in people, animals or plants.

One characteristic that differentiates B substances from other CBRNE substances is that they can be infectious.

RN substances comprise radiological and nuclear substances. These can cause radioactive damage/injury and are, in many cases, highly toxic. Depending on half-life, radiation can remain in situ for a long period of time following its emission or distribution.

E substances are explosive substances, including explosive mixtures. They can cause direct harm/injury through blast, splintering and/or heat radiation, but can also be used to spread harmful substances, for example by way of dirty bombs, whereby E and R substances are combined.

Why are activities within the CBRNE field necessary?

A common feature of CBRNE substances is that they can cause harm to humans, animals, plants, property and the environment. The characteristics of the substances may differ, as may the way in which they are able to cause damage. Combined with the fact that incidents involving these substances can occur for a range of reasons and that the effects may mean serious consequences for a long period of time, the potential threat and risk profile within this field is extremely broad.

Below is a description of potential CBRNE incidents.

C incidents: Hazardous chemicals represent a danger irrespective of whether they originate from:

- an accident during the transportation, storage or manufacturing of chemicals,
- deliberate distribution through terrorism or other criminality, or
- use of chemical weapons.

B incidents: Infectious microorganisms represent a danger irrespective of whether they originate from:

- natural distribution,
- an accident that causes distribution,
- deliberate distribution through terrorism or other criminality, or
- use of biological weapons.

R and N incidents: Ionizing radiation represents a danger irrespective of whether it originates from:

- an accident at a nuclear facility, other accidents involving radioactive substances or ionizing radiation,
- deliberate distribution through terrorism or other criminality, or
- use of nuclear weapons.

E incidents: Blasts, splintering, projection and heat radiation from an explosion represent a danger irrespective of whether they originate from:

- an accident during the transportation, storage, manufacturing or use of explosive substances,
- deliberately causing an explosion through terrorism or other criminality.

In addition to damage/injury, an incident involving CBRNE substances may also lead to considerable strain on society's resources. The incident could entail wide-ranging inputs from society, considerable demands on communication to the public and, in some cases, even evacuation. An incident involving CBRNE substances may also generate fear and panic, which could hinder the management of the incident and further increase the strain on society's resources. Furthermore, an incident could have considerable financial consequences, not least if it involves decontamination, blockades and a fall in production over an extended period.

The changeable nature of CBRNE substances, combined with the different types of damage/injury that could be caused by such substances, means that society must maintain a range of capabilities in order to protect itself from such incidents, regardless of whether they occur as a result of intentional actions or not.

What do these activities entail?

Activities within the CBRNE field bring major demands in terms of different types of competencies. Many actors are also involved in this field, each one inputting into their areas of responsibility and level. For example, the Swedish Radiation Safety Authority is primarily focused on RN substances, while the Public Health Agency of Sweden maintains its focus on B substances. Other actors are working in every aspect of the field but each from a specific perspective. For example, the Swedish Customs Service works with all CBRNE substances, but mainly from a border-protection and customs perspective. MSB is tasked with developing and supporting society's preparedness and working on coordination between the relevant actors, both in the prevention and management stages.

Municipalities, county councils and regions, county administrative board and central authorities are all affected by CBRNE, which also involves significant efforts at EU level and as part of various international collaborations.

It should be noted that efforts to tackle both intentional and non-intentional incidents involving CBRNE substances can sometimes lead to varied requirements and involve different actors. That said, there are often more similarities than differences, and in Sweden we strive to coordinate efforts to prevent both types of incidents as far as possible.

Activities within the CBRNE field take a number of different forms. Preventive work aimed at unwanted incidents involving a CBRNE substance is required. Despite effective preventive work, there must also be preparatory work examining how incidents involving these substances are to be managed should they occur. If an incident occurs, it should be possible to implement activities to manage it and for socially vital operations to be maintained. This management also involves any reconstruction and decontamination necessary following an incident. It is also important for incidents involving CBRNE substances to be investigated and for lessons to be learned from incidents, exercises, other countries' initiatives etc. Research and development are also required to enable the country to protect society from incidents involving CBRNE substances.

The necessity of cooperation

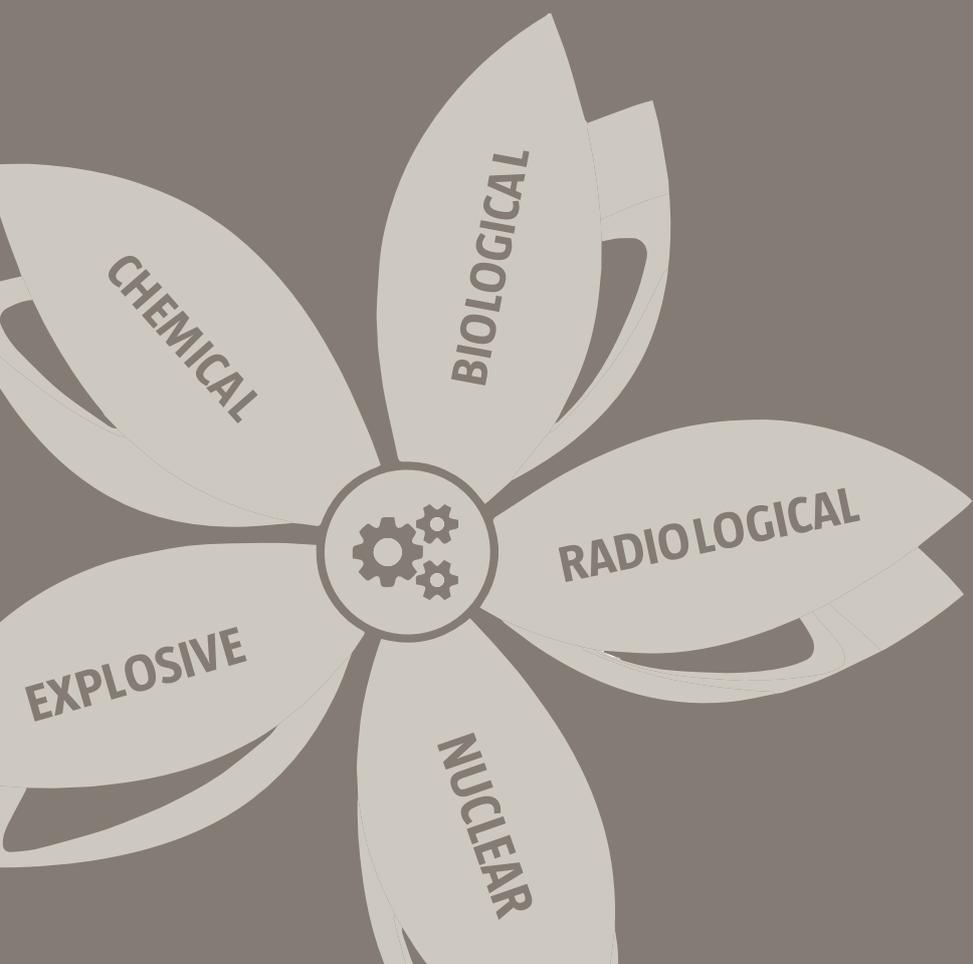
The large number of actors within this field place considerable demands on cooperation within and across subject areas and between local, regional and national levels. It is necessary to maintain a common thread throughout preventive, preparatory, management and learning activities.

Cooperation between actors is also essential in terms of ensuring that Swedish activities – within the framework of EU cooperation and various international forums – are coordinated.

The actual management of an incident involving CBRNE substances imposes demands on operational cooperation; very few incidents of this kind can be managed by an individual actor. This in turn imposes demands on preventive and preparatory efforts in the form of joint planning, training and exercises.

In addition to daily cooperation, long-term joint strategic planning and analysis is also required within the CBRNE field. This is a prerequisite for identifying common needs and creating a capability adapted to those needs. One important aspect of this is that the various cooperative forums are coordinated and managed as efficiently as possible.

Facilitating the significant cooperative requirements within this field is one of the reasons that this Strategy has been produced.



STRATEGY GOALS AND SUB-GOALS

The Strategy consists of four goals with accompanying sub-goals that were established in 2012–2013 and are based on the principles specified in Annex 6. When the goals have been achieved, we expect to see more efficient and coordinated Swedish CBRNE activities, a working method that is reflected in all activities and offers better opportunities to identify and create the capabilities necessary in this field.

How to attain the goals

A guide is included for each goal, describing how actors at different levels can work to achieve it. These proposals should be regarded as a tool for helping actors in their efforts to attain the goals. Sub-chapters 2.1, 2.2 and 2.3 are structured in the following manner.

Goal – describes what we want to achieve.

Sub-goals – breaks the goal down into parts.

- How local and regional actors can attain the goals (orange box)
 - » *Tools that can be used to attain the goal.*
This specifies the relevant tools that actors at each level can use to attain the goals and sub-goals.
 - » *Tools that should be developed.*
This specifies the tools that have not been fully developed but need to be produced to enable actors to more easily achieve goals and sub-goals.

- How central authorities can attain the goals (blue box)
 - » *Tools that can be used to attain the goal* (see above)
 - » *Tools that should be developed* (see above)
- How actors can cooperate to achieve goals (grey box)
 - » *Tools that can be used to attain the goal* (see above)
 - » *Tools that should be developed* (see above)

Local and regional actors refers to all actors operating at local and regional level: municipalities, county councils and regions, county administrative boards, private actors etc. *Central authorities* refers to authorities whose operations are not limited to a geographical area of the country. *Joint activities* refers to operations that exert an impact at local, regional and national level and require cooperation between these levels.

Following up on fulfilment of goals

It is important that Strategy goals be followed up and evaluated. The managing party (see Annex 4) is responsible for this follow up and evaluation.

Goal 1 – Cooperation and coordination

The purpose of Goal 1 is to establish a basic level of cooperation within the CBRNE field and to manage CBRNE activities as efficiently as possible on that basis. Cooperation within the CBRNE field is based on the comprehensive cooperative structures in place within civil protection and preparedness.

Goal 1: There must be well-functioning processes in place for CBRNE cooperation at local, regional and central levels as well as between these levels.

Sub-goals:

- 1 a) Clear structures must be in place in every county detailing how cooperation between local and regional actors in the CBRNE field is to be managed.
- 1 b) Processes must be in place to disseminate information, experiences and activities relating to CBRNE between actors in different counties.
- 1 c) Central authorities must coordinate their efforts to produce governing documents for the CBRNE field.
- 1 d) A management system must be in place to manage CBRNE issues that affect several different levels, actors or forums for cooperation. The process should permit joint preparation of issues that require decisions from several actors or operations across several forums for cooperation.
- 1 e) It must be possible for actors at every level to obtain an overview of how Swedish activities within the CBRNE field are developing.
- 1 f) It must be clear which forums for cooperation are available within the CBRNE field, as well as their purposes and areas of responsibility.

How local and regional actors can attain the goals

There are a number of actors working within the CBRNE field in each county. Structures and processes relating to cooperation and management are required to ensure that county CBRNE activities are able to function and work efficiently. These are also necessary in order to obtain an overview of local resources, competencies, division of responsibilities, threats, risks, capabilities and capability deficiencies. Sub-goals 1 a) and 1 b) were formulated in the light of this.

Tools that can be used to attain the goal

CBRNE activities in a county follow the usual procedures in place governing cooperation and management within the field of civil protection and preparedness, for example through work in regional crisis management councils and by way of regional needs analyses – something that is often coordinated by county administrative boards. The actors in a county must adopt a holistic approach when working within the CBRNE field, thus taking healthcare, crisis preparedness, the environment, protection against accidents etc. into consideration. Regional representatives will also be involved in relevant areas, such as county veterinary surgeons, preparedness coordinators at county councils or regions and chemical coordinators employed by the emergency services.

- The regional coordination function (RCF) is one example of a concept that can be used to facilitate cooperation in a county. The concept of regional coordination is based on pre-existing cooperative structures and aims to create opportunities for the emergency services, police, healthcare sector and county administrative boards to cooperate on operational issues, exercises and training. The concept can be used in, and adapted to, the preconditions in every county. (MSB, 2010)
- A seminar concerning regional coordination efforts, whereby actors can share information and experiences between counties is held to facilitate the attainment of sub-goal 1b).
- There is a comprehensive management process aimed at helping local and regional

actors attain Goal 1 described under 2.1.3 and in Annex 4.

Since experiences and solutions offered by one county can often be applied in other counties, it is important for counties to take advantage of each other's efforts, not least in terms of saving resources.

Tools that should be developed

- An evaluation is required of the extent to which cooperation between local and regional actors who work on CBRNE issues can be enhanced. It is important for this work to be conducted in cooperation with relevant central authorities. For example, it should be assessed to what extent the concept of regional coordination can be reinforced and how it could also form part of overall national CBRNE activities in the future.
- The methods by which good examples of effective CBRNE cooperation within a county can be incorporated and distributed to other counties must also be evaluated.
- Public-sector actors in a county will establish and maintain an awareness of the private actors, stakeholder organizations and voluntary defence organizations in their county and what types of cooperation are necessary with these groups.
- Counties must form networks to facilitate ongoing dissemination of information and knowledge exchange.

How central authorities can attain the goals

Tools that can be used to attain the goal

In terms of central authorities, there are a relatively large number of forums for cooperation on issues that affect the CBRNE field so establishing new forums is not the primary concern here. Rather, what is necessary is a clear and commonly understood allocation of responsibilities, functioning cooperation and an understanding of the tasks and mandates that each forum for cooperation has within the field. All of this forms part of the typical operations of the government agencies in question.

- There is a comprehensive management process described under 2.1.3 and in Annex 4 aimed at helping authorities attain Goal 1.
- Central authorities will cooperate to identify gaps or potential overlapping areas in the distribution of responsibilities within the CBRNE field. If any such issues are discovered, the authorities need to cooperate to rectify them, within the relevant forums for cooperation when necessary, or by drawing the attention of the Government of Government Offices to the problem.
- The need for cooperation with private actors, stakeholder organizations and voluntary defence organizations should be considered on a continuous basis.

In addition to legislation, there are a number of governing documents within the CBRNE field that specify emphases for either all or parts of this field, for example action plans, guidelines, policies or instructions. Often, one or several central authorities are responsible for producing and managing these and it is important that such documents do not conflict with each other.

- To achieve Sub-goal 1 c), central authorities that produce governing documents within the CBRNE field must be careful to make a record of such documents that already exist. Conflicts between new and already-established documents should be avoided.

How actors can collaborate to attain the goals

The majority of issues and problems that occur within the CBRNE field can be solved by the relevant actors independently and by way of normal cooperation. However, some issues are so complex and difficult to resolve that they must be managed using a holistic approach. A precondition for success in such situations is that an overview of the actors working on the issue is available and how they are working, how the inputs from different actors are coordinated and that efforts are undertaken based on a joint decision-making process.

Tools that can be used to attain the goal

Management process (Sub-goals 1 d and 1 e)

The foundations of a management process were established in 2010 to facilitate work on CBRNE issues that cannot be managed using ordinary cooperative procedures only. These were developed as part of the Joint CBRNE Strategy Project – Processes and Priority Areas. The results of this work are described in the text below, as well as in Figure 2 and Annex 4. MSB is the relevant managing party.

A key part of the management process is the joint CBRNE meetings that are to be implemented twice annually, in line with Figure 2. These meetings are to serve as the driving force behind efforts to manage the CBRNE Strategy and the priority areas but should also function as a link between the activities undertaken in different forums for cooperation and at different levels and to facilitate cooperation across subject areas.

MSB bears responsibility for ensuring that the joint CBRNE meetings take place.

MSB is to appoint a joint working group that will actively support efforts to manage the CBRNE Strategy and work within the field of the Strategy. The intended tasks relating to this management are specified in the process in Annex 4.

Together with the working group, MSB is to take responsibility for ensuring that matters are well prepared and that documents are produced and communicated prior to the meetings. This is a prerequisite if the meetings are able to fulfil their function as a driving force behind management efforts. When issues within the field affect several areas (for ex. C, B, R, N, E, crime-prevention activities, crisis preparedness and protection against accidents) or several levels, the production of relevant documentation is vital. In order to manage this, it is essential that the working group be composed of individuals from different actors and that

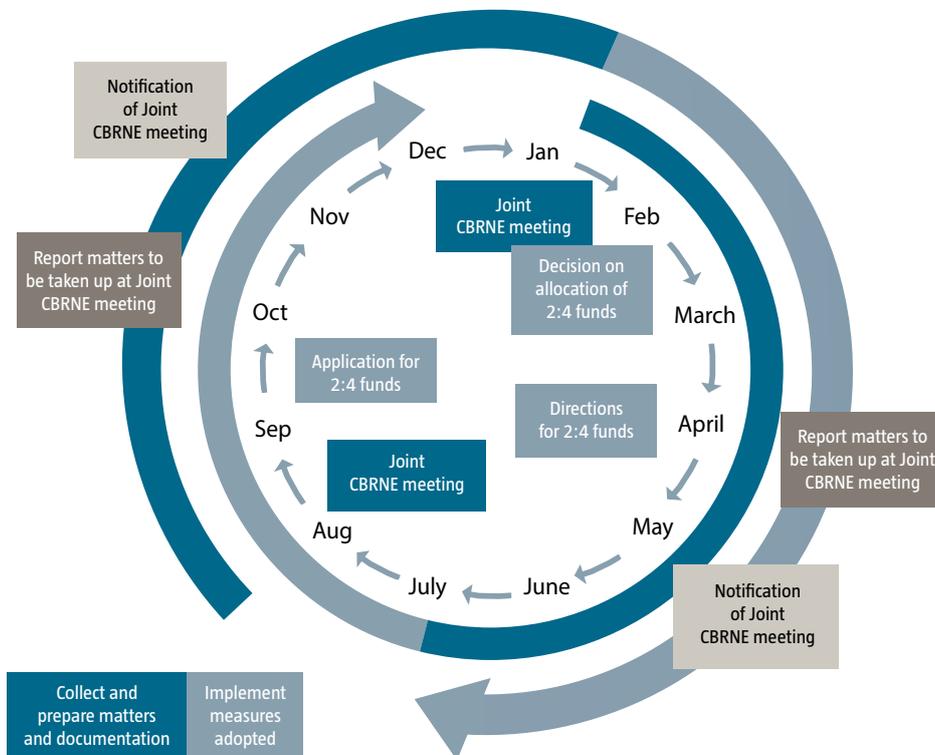


Figure 2. Annual work cycle for the field of the CBRNE Strategy

the group possesses a wide, combined network. Another precondition for success is that participating actors are well prepared and contribute information, have formulated questions and, following the meeting, disseminate feedback on the discussion and results within their own organization.

A final condition for the functioning of the management process is that ordinary cooperation is effective at different levels. If, for example, there are no structures in place in a county to identify challenges and areas that need to be highlighted at a CBRNE meeting, it will be difficult to achieve their basic purpose.

The managing party is responsible for producing an Annual Report that aims to contribute to Goal 1e, among other aspects. The report should detail the work that has been undertaken within the Strategy field during the year, how the Strategy has been managed and any other information that could be useful for actors within the system, such as new legislation, new Government commissions, EU activities and important development activities at county level etc. There must also be references to where more information can be found. All actors must be prepared to contribute information.

The management process will need to be developed and adapted in order to establish the best working methods. Changes required will be identified as the work continues.

Attaining Sub-goal 1 e) more easily

One prerequisite for national cooperation within the CBRNE field is that actors at every level have access to joint information regarding developments in Swedish activities within this field. To achieve this, simple processes and tools are required that can be used by actors to disseminate and gain access to information – one example being the CBRNE database, which offers the opportunity to follow relevant projects in the planning, implementation or completion phases.

Achieving Sub-goal 1 f) more easily

If all parties take responsibility for following two simple rules, it will be possible to obtain a solid overview of existing forums, avoid duplication and limit the number of forums;

- Before new forums for cooperation intending to work on any type of CBRNE issue are formed, the actors must ensure:
 - that no forum for cooperation undertaking work on the issue already exists.
 - that no forum for cooperation that could start working on the issue already exists.
- If a new forum for cooperation is formed, information concerning the new forum's mandate, goals, purpose, working arrangements etc. must be distributed to other actors concerned.

Tools that should be developed

Achieving Sub-goals 1 e) and 1 f) more easily

A website that contains information relating to CBRNE and enables all actors to find already-compiled information is required. All parties must contribute and disseminate information and news via this website. Responsibility for ensuring that the content is up to date, as well as its design and level of ambition, needs to be further investigated and naturally the website will be developed and administered by MSB.

The website containing CBRNE information or the CBRNE database will also contain a compilation of the most important forums for cooperation together with their mandates and commissions.

Goal 2 – Threats and Risks

The purpose of goals is to establish – by way of similar processes – a common understanding of the threats and risks contained within the CBRNE field. Efforts to identify threats and risks within the field of civil protection and defence are undertaken in many different ways and with differing levels of details. For example, at local and regional level there are risk and cooperation analyses (RCA), while at national level there is the National Risk and Capability Assessment. Sharing information between and by central actors, including the intelligence and security services, is also significant.

Goal 2: As a complement to the comprehensive threat and risk assessments, there must be processes in place to develop threat and risk assessments specifically focussed on CBRNE.

Sub-goals:

- 2 a) Each county should have a process in place that can be used to make an assessment of the threats and risks contained in the CBRNE field in that county.
- 2 b) Authorities in relevant forums for cooperation will produce assessments of the threats and risks linked to the CBRNE field within their areas of responsibility.
- 2 c) There must be a joint overview of the threats and risks present within the CBRNE field at national level. A clear process is required in order to establish and revise this awareness.

How local and regional actors can attain the goals

Local and regional actors who work on CBRNE issues in a county should base their efforts on a joint overview of the threats and risks present in the county, as well as on areas requiring protection in society. This joint overview could then be used as a basis for cooperation, planning of capability-creating operations, response planning within the field etc.

Tools that can be used to attain the goal

To attain Sub-goal 2 a), actors in a county could, for example, jointly review risk and vulnerability analyses in order to assess what they reveal from a CBRNE perspective, as well as identifying gaps in knowledge in terms of threats and risks that need to be remedied. They could use the strategies and tools described in the documents A functioning society in a changing world, the national strategy for protecting socially vital operations, action plan for protecting socially vital operations and Guide to socially vital operations: identifying socially vital operations and critical dependencies, as well as evaluating the acceptable period of interruption of services. Further guiding information concerning the threat and risk profile could be provided by studies concerning the CBRNE-related risks, national risk and capability assessments and action programs produced in accordance with Act (2003:778) on Protection against Accidents, safety reports linked to Seveso plants, etc.

How central authorities can attain the goals

Tools that can be used to attain the goal

Planning for crisis preparedness and increased preparedness should, in accordance with the Ordinance on emergency preparedness and measures by authorities with a surveillance

mandate in connection with states of alert (2015:1052), be conducted within the area of cooperation. This also applies to CBRNE issues that affect areas of crisis preparedness and states of alert. A prerequisite for adopting a holistic approach as part of the planning process is that the relevant authorities consider their own operations to be part of that whole.

These authorities will regularly produce documents related to assessments of threats and risks as part of their cooperation with other forums for cooperation in the field in order to establish a collective overview of the situation. Other forums involved in civil protection and preparedness, for example forums that work on protection against accidents, can also contribute such inputs.

The frequency and manner in which authorities in a forum for cooperation choose to produce joint threat and risk assessments for the CBRNE field may vary, but they should be able to gain advantage from each other's work.

Tools that should be developed

Processes are required to ensure that documents are useful to the cooperative areas and to ensure that they can be used as a basis to develop a collective overview of threats and risks.

How actors can collaborate to attain the goals

In order to enable strategic and long-term CBRNE activities, a collective overview of threats and risks within the field is required in addition to the fulfilment of Sub-goals 2 a) and 2 b). A specific threat and risk assessment concerning the CBRNE field could represent an important guiding document for comprehensive threat and risk activities, for example MSB's national risk and capability assessment.

It is important for the relevant actors to be able to access relevant information in order to identify, assess and evaluate threats and risks. Consequently, it is vital that central actors, including the intelligence and security services, are aware of any informational needs and that these actors are clear about what support and information other actors are able to take advantage of.

Tools that can be used to attain the goal

A compilation of threats and risks within the CBRNE field could be developed based largely on the work undertaken at local, regional and national levels.

Tools that should be developed

In order to achieve Sub-goal 2 c), a process that produces a compilation of threats and risks contained within the CBRNE field at national level is necessary. This initiative must be based on the work already undertaken or planned at different levels, but also by integrating the of antagonistic threats perspective. This could be produced and communicated by the intelligence and security services.

In order to enable access to relevant documents relating to antagonistic threats, an efficient communication system between actors and the intelligence and security services is required.

Goal 3 – Creating capability

The purpose of Goal 3 is to create structures to enable actors to jointly identify needs and implement joint measures within the CBRNE field.

The capability required for prevention and management of unwanted incidents involving CBRNE substances is often not specific to the subject area but consists of more general solutions for areas such as management and cooperation, emergency rescue operations, crime-fighting or border control. As a complement to this, however, capability-creating CBRNE activities are also necessary at certain times.

Goal 3: There must be structures in place that enable actors to identify common needs to develop capabilities within CBRNE and to implement and follow up joint measures.

Sub-goals:

- 3 a) A process must be in place concerning how actors within a county can identify common capability-developing needs within the CBRNE field and for how joint efforts can be managed and followed up.
- 3 b) Capability-developing measures within a county should be undertaken by taking overall aims for the CBRNE field into account, as well as the measures taken by actors at central level and in other counties.
- 3 c) In the forums for cooperation affected by CBRNE, authorities will install a process for identifying the joint capability lacking within the field and a planning process for how joint efforts and the follow up of these efforts are to be conducted. This work should be undertaken taking local and regional actors into account and cooperating with them.
- 3 d) There must be a process in place for identifying areas within CBRNE where it is of strategic importance that national capability be increased or maintained and also a process for working with, following up and evaluating this capacity.

How local and regional actors can attain the goals

A prerequisite for local and regional actors' ability to achieve Sub-goal 3 a) is for there to be an efficient cooperative structure in the county that enables actors to assess the deficiencies in terms of capabilities and the measures that must be taken based on threats and risks, reviews, experience from exercises and incidents etc. Examples of measures include joint response planning and agreements concerning direction and coordination as described in the Joint grounds for cooperation and management during societal disruptions (MSB, 2014, in Swedish). Other measures could include ensuring common, secure and robust communication methods, exercises and training along with cooperation with private actors.

County-based efforts within the CBRNE field must be conducted based on the preconditions and needs of that location, as well as on actors' local expertise. At the same time, it is important for these inputs to correspond to developments in other counties and national-level activities, and that they are in line with the overall aims in the field. Actors at regional level therefore need to actively follow developments within the CBRNE field to achieve Sub-goal 3b). Information from joint CBRNE meetings, the regional coordination seminar, relevant information from activities conducted in areas of cooperation etc. must be distributed to all the relevant actors. The county administrative board in each county has a specific responsibility for this, as well as for disseminating information to other counties.

Tools that can be used to attain the goal

The CBRNE database offers local and regional actors the opportunity to follow planned, ongoing or completed projects within the CBRNE field.

Tools that should be developed

A prerequisite for developing cooperation between local and regional actors at county level is that the actors attempt to pinpoint procedures that help to establish joint capabilities.

The managing party's annual report concerning the previous year's work and the website that MSB is to create will provide local and regional actors with an overview of developments within the CBRNE field.

How central authorities can attain the goals

Tools that can be used to attain the goal

Sub-goal 3 c) attainment is largely linked to the joint efforts already under way within various cooperation forums. These efforts require authorities to use analyses of deficiencies and needs as a basis, to then plan activities to achieve the desired capability. Authorities can therefore work on joint CBRNE planning in several different forums simultaneously. It is extremely important, however, that work undertaken in these various forums – as in the case of work involving actors at local and regional level – is coordinated. The CBRNE database provides yet another opportunity to monitor projects underway or planned within the CBRNE field.

Tools that should be developed

The managing party's annual report concerning the previous year's work and the website that MSB is to create will provide central authorities with an overview of developments within the CBRNE field.

How actors can collaborate to attain the goals

A holistic overview of current capability and ongoing or planned development activities within the CBRNE field is required to ensure that different actors are able to take advantage of each other's capabilities and to enable gaps in the collective Swedish CBRNE capability to be identified.

Sub-goal 3 d) was established to help ensure that efforts made in the CBRNE field were of greatest benefit to the nation's capability, and in 2014-2015 processes were established to identify priority areas.

The priority areas identified during this process are outlined in Annex 1.

Tools that can be used to attain the goal

These priority areas are established by way of two different processes; Identifying potential priority areas (Table 1) and Prioritising areas (Table 2). Priority areas are defined as: A demarcated area where a need has been identified in order to increase or maintain national capability, and where this need is not considered to be met by existing inputs or through regular CBRNE activities.

The first step in the process involves the managing party appointing a joint working group, which is tasked with producing new priority areas, and the joint reference group that is to support these operations.

Work to identify potential priority areas starts with the joint working group reviewing previous documents to obtain information and the results from the previous occasion on which priority areas were established.

The joint working group and reference group then update the list of literature and checklist where necessary. The list of literature contains the reports and documents that must be read in order to identify potential priority areas, that is, problems in the CBRNE field that need to be rectified. This could include, for example, risk and vulnerability analyses, reports from incidents that occurred and evaluation reports, governing documents and other documents linked to the field. The checklist drawn up as part of the project in 2015 contains the following points for the reader to consider when reading documents: general deficiencies that affect CBRNE incidents, CBRNE-specific deficiencies, highlighted political activities/limitations, an authority's potential that can be copied/taken advantage of by others, deficiencies that can be inferred and potentially overlapping operations.

		
TABLE 1 PROCESS FOR IDENTIFYING POTENTIAL PRIORITY AREAS		
STARTING TOOLS	<ul style="list-style-type: none"> • Checklist from previous implementation. • List of literature from previous implementation. • Documentation of potential priority areas from previous implementation. 	<ul style="list-style-type: none"> • Report concerning currently-applicable priority areas. • Area documentation template from previous implementation.
STEPS	<ol style="list-style-type: none"> 1. The managing party appoints the bodies who will be responsible for producing new priority areas (joint working group and reference group). 2. The working group and reference group update the list of literature and checklist where necessary to identify potential priority areas. 3. The managing party ensures that the checklist and list of literature have gained acceptance. 	<ol style="list-style-type: none"> 4. The working group reads the material on the list of literature based on the checklist and notes deficiencies. 5. The working group compiles the deficiencies and establishes potential priority areas that are documented in an approved template. 6. The managing party conducts a confidentiality assessment of the material. 7. The working group sends the documentation to the reference group appointed by the managing party.
RESULT	<ul style="list-style-type: none"> • Updated checklist. • Up-to-date list of literature. 	<ul style="list-style-type: none"> • Documentation concerning potential prioritised areas. • Mailings to reference groups.
RECIPIENT	<ul style="list-style-type: none"> • The working group appointed by the managing party. 	<ul style="list-style-type: none"> • The Prioritising CBRNE areas process.

The working group reads through all of the literature and compiles a list of deficiencies, which then becomes the basis for potential priority areas. These are documented in Part 1 of the Approved template for potential priority areas (Annex 3).

The managing party then carries out a confidentiality assessment of the material before the working group sends the documentation to the joint reference group. Once the work linked to this process has been completed, a number of potential priority areas have been identified based on the literature.

The potential priority areas resulting from the *Identifying potential priority areas* process are then prioritised according to the *Prioritising CBRNE areas process*.

The process begins with the reference group – which acts as the managing party – approving the documentation on potential priority areas.

This step could lead to potential areas being combined or weeded out.

The joint working group and reference group then update (where necessary) the methodology to be used in order to prioritise the areas established during the previous process. This prioritisation methodology is then approved by the managing party.

The joint reference group also complement the documentation surrounding the potential priority areas with ongoing activities and relevant actors, before incorporating this into Part 2 of the Approved template (Annex 3). The actual prioritisation work can then begin, with the joint working group and reference group reviewing all the areas and measuring them against the definition of a prioritised area. Any areas that are not suitable are then weeded out.

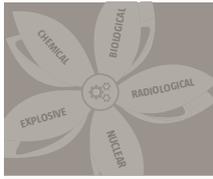


TABLE 2
PROCESS FOR PRIORITISING CBRNE AREAS

STARTING TOOLS	<ul style="list-style-type: none"> Documentation of potential priority areas. 	<ul style="list-style-type: none"> Prioritisation methodology from previous implementation.
STEPS	<ol style="list-style-type: none"> The reference group appointed by the managing party approves documentation concerning potential priority areas. The working group and reference group update the prioritisation methodology where necessary. The prioritisation methodology is approved by the managing party. The reference group supplements the documentation of potential areas detailing ongoing work and relevant actors. The working group and reference group makes priorities based on the definition of priority CBRNE areas and weeds out any areas that do not fit into the definition. The working group and reference group prioritise remaining potential areas from Step 5 using established prioritisation methodology. 	<ol style="list-style-type: none"> Results from Steps 5 and 6 are compiled. The managing party conducts a confidentiality assessment of the material. The working group compiles a report on results. All potential priority areas to be included in the report. The report is sent out for consultation to actors determined by the managing party. The working group analyses and compiles consultation responses and updates the report. Final report is sent to the managing party and the joint working group to support management efforts.
RESULTS	<ul style="list-style-type: none"> Compilation of prioritisation methodology. Report concerning priority areas, including information regarding important areas that need to be managed separately. 	<ul style="list-style-type: none"> Decision on future action.
RECIPIENT	<ul style="list-style-type: none"> The managing party. 	<ul style="list-style-type: none"> Actors affected by CBRNE incidents.

Following this stage, a small number of areas that fit into the definition will remain. The joint working group and reference group carry out a final prioritisation of remaining areas using established methodology. Goal 3 of the Approved template can be used to help with this (Annex 3). The prioritisation methodology used in 2015 was based on areas requiring protection and how seriously they would be affected if they were not subjected to measures. More information about these prioritisation efforts can be found in the project's final report, the Final Report – Joint CBRNE Strategy – Processes and priority areas.

Finally, the joint working group draws up a report containing the results from all the prioritisation-related efforts, including all potential priority areas, which refers to all areas/deficiencies approved by the reference group in the first stage of the *Prioritising CBRNE areas* process.

After a round of consultations, the final report is sent to the managing party and the joint management working group, who then decide on the future activities that need to be undertaken in the priority areas in accordance with the process contained in Annex 1.

Goal 4 – Governing instruments

The purpose of Goal 4 is to ensure that governing instruments are used in line with a jointly identified need to create capability within the CBRNE field.

Many governing instruments can be used to support the development of capabilities within the CBRNE field. These could include legislation and regulations, financial instruments or knowledge management such as training or exercises. Such efforts should begin by identifying threats and risks within the CBRNE field, after which an analysis should be conducted of the capability that must be acquired, as well as responsibility for ensuring this is done. At this point, governing instruments can help achieve this capability.

The chapter is divided according to the various sub-goals and specifies how some of the most common governing instruments within the field should be used. It should be noted that there are more governing instruments that could be used to achieve the desired capability within the field than those specified here.

Goal 4: Governing instruments will be used in order to transform jointly-identified needs within the CBRNE field into joint measures.

Focus on appropriation 2:4 Crisis preparedness

Sub-goals:

- 4 a) The focus of appropriation 2:4 Crisis preparedness should, in terms of CBRNE, be based on a joint analysis of needs within the field.

Appropriation 2:4 Crisis preparedness aims to enhance society's collective crisis preparedness. It represents an important strategic, financial instrument and complements authorities' own investments within the CBRNE field. In order to function as an effective instrument, the appropriation needs to be targeted at the areas that offer the most benefit and are based on strategic aims within the CBRNE field. It is also important for results from implemented projects to be disseminated to relevant actors at every level.

Tools that can be used to attain the goal

- The priority areas established as part of the CBRNE Strategy and joint needs as identified within the areas of cooperation, for example, can be used to target the appropriation.
- The CBRNE database is one way of disseminating results from completed projects.

Focus on project work

Sub-goals:

- 4 b) Actors at all levels will have access to an overview of completed or ongoing projects within the CBRNE field.

Tools that can be used to attain the goal

To ensure cooperation is effective and duplication avoided, all actors must be able to gain an overview of the projects that are underway or have already been implemented within this field. There are a large number of ongoing projects within the CBRNE field so actors need to use the CBRNE database to gain an overview. Actors are expected to update the existing CBRNE database with ongoing and completed CBRNE projects. This applies to actors at every level.

Focus on training and exercises

Sub-goals:

- 4 c) Planning training and exercises within the CBRNE field to be integrated with other forms of planning.
- 4 d) Local and regional actors in a county should, within the framework of their joint planning efforts, examine whether the threats, risks and capability-development needs within a county give rise to any specific training or exercise inputs.
- 4 e) National needs for ongoing training within the CBRNE field should be evaluated regularly.
- 4 f) Actors who may need to act in cooperation with each other during a CBRNE incident must have undergone similar training whenever possible.
- 4 g) As part of their strategic planning, actors must jointly identify the long-term need for exercises within the CBRNE field. Supporting documentation to be used in MSB and other authorities' national exercise planning for civil protection and preparedness.
- 4 h) Actors who may need to act in cooperation with each other during a CBRNE incident will have undertaken joint exercises as far as possible.

Exercises and training are two extremely important governing instruments in terms of enhancing society's CBRNE capability. Exercises and training are undertaken at every level of the system and take many different forms. They may be recurrent or form part of a specific initiative. Regardless of the form they take, it is vital to treat training and exercises as a part of overall planning. The guide below applies to all levels unless otherwise specified.

Tools that can be used to attain the goal

The national exercise calendar available on the MSB website offers all actors an overview of the exercises planned by Swedish authorities. This can be used as a basis for long-term planning as well as a tool for achieving Sub-goal 4 g). It is important for all actors to add their exercise plans to the calendar; for more information, refer to the document National exer-

cise plan – a strategy for cross-sector exercises within the field of civil protection and emergency preparedness.

The formal basic training courses available for different occupations, for example firefighters, police officers and healthcare personnel, are important tools in terms of ensuring capability and exert a major potential influence on capability at every level in the long term.

Tools that should be developed

As part of their joint planning, local and regional actors need to identify the training and exercise activities required in their county. These inputs should be based on an assessment of pertinent threats and risks and the capability that needs to be created or maintained.

Due to its broad nature, the CBRNE field imposes extensive demands on a wide range of training courses. It is therefore important for cooperating actors to identify gaps in the range available nationally and to work to rectify such gaps as far as possible by way of joint training activities.

Actors from local to national level should work together to ensure that those who need to cooperate in the event of an incident have undergone joint training and exercises. This could be achieved by producing modules that could be used in several types of training, by ensuring that changes made to CBRNE activities are implemented in all relevant training courses instead of just one, and by ensuring that all the relevant actors have carried out exercises.

It is vital that relevant parties have a basic understanding of the exercises that need to be undertaken within the CBRNE field and that this assessment is made by the actors who have expertise within the field in question. An overview of needs must be drawn up as a supporting document for authorities' exercise plans, for national exercise planning and for work undertaken at the National Forum for Direction and Coordination of Exercises (NAFS).

The website containing the CBRNE-related information proposed in Section 2.1.3, or the CBRNE database, should include a comprehensive compilation of the training courses offered within the CBRNE field. This involves actors contributing brief information relating to relevant training courses and information about where more facts can be obtained. Such a compilation would bring two advantages: actors operating within the CBRNE field would gain an overview of the training courses that are available and it would be easier to identify gaps in the collective range of training courses.

Sub-goals:

- 4 i) Research should be more closely linked to the overall CBRNE process in which a needs inventory and participation have more key significance.
- 4 j) Authorities that manage, order or in some other way direct research within the CBRNE field should conduct inventories of needs within their respective fields. This should be undertaken in cooperation with other central authorities and end-users at regional and local level.
- 4 k) When implementing research within the CBRNE field, it should be self-evident that end-users participate in the process.
- 4 l) A system to be in place to distribute results from research within the CBRNE field to relevant actors and to connect it to other knowledge and capability-enhancing activities such as development, training and exercises.
- 4 m) In the long term, a clearer structure to be established to help convert results from research within the CBRNE field into development activities. The goal should be an integrated R&D process for the CBRNE field.

Focus on research and development

Research and development within the CBRNE field to be used to help increase national capability. Efforts to direct research and development within the CBRNE field should therefore be based on a joint inventory of needs.

It is important for actors to work together to distribute results from research and development and for those results to be put into practice, thus enabling research and development undertaken within the CBRNE field to be managed and to have an effect on capability. Consequently, it is also important for research to have clear links to other knowledge and capability-enhancing activities, such as development, training and exercises.

Tools that can be used to attain the goal

The process of identifying needs could be based on risk and vulnerability analyses or experience and evaluations provided by training courses, exercises and incidents, after which the need identified must be formulated clearly. By participating in national surveys, inventories of needs and capability assessments, local and regional actors can highlight needs linked to research and development that have been identified and formulated. The joint CBRNE meetings and areas of cooperation could also serve as forums for conveying local and regional problems that need to be linked to research and development to national level.

It is important for the relevant actors at all levels, from local to national, to attempt to identify needs linked to research and development within the CBRNE field. Several forums currently produce inventories, and it is important for this work to be coordinated.

To help improve cooperation concerning the need for long-term research, MSB has, together with the Swedish Armed Forces and the Swedish Defence Research Agency, produced a proposal for a more general process governing inventories, coordination and targeting of society's research and development needs within this field. This process is described in the document *Developing a process for cooperation around research and development (R&D) within the CBRNE field* (in Swedish), as well as how it could facilitate efforts and result in a situation where all actors, from contractors to providers, are able to cooperate in terms of identifying gaps in knowledge. These gaps could then form the basis of a long-term focus for research and development within CBRNE.

The knowledge gaps and research and development needs generated are then reported back to relevant actors.

Central authorities involved in different forums for cooperation should, together with local and regional representatives, work to ensure that the focus of research is agreed jointly. Furthermore, all actors should aim to involve local and regional actors in research and development projects, as their experience and contributions are often vital in terms of ensuring a good final product.

It is also very important that national research and development efforts are not isolated from cooperative forums in which Sweden participates within the EU, internationally or bilaterally.

Tools that should be developed

Actors that produce documents, direct, order or undertake research must cooperate to take advantage of the identified needs and work together to make the comprehensive research undertaken within the field transparent. It is also important for results from research to show a clear link to knowledge and capability-enhancing activities such as development, training and exercises. Achieving this is facilitated by involving local and regional actors from the research stage.

A structure must be developed for how local and regional actors can jointly establish needs relating to research and development within the CBRNE field. An assessment of how and when local and regional actors can pass on and convey identified research needs within this field is also required. Central authorities must, in turn, establish structures for receiving research needs formulated at local and regional level and offering clear opportunities for actors at these levels to communicate them.

A compilation of research providers and authorities who finance research within the CBRNE field is necessary to facilitate inputs and, in the long term, to create better conditions for greater coordination between research and development processes.

ANNEXES

Annex 1 – Priority areas established in 2015

The work undertaken in 2012 and 2013 identified the need to establish areas in which specific efforts are required and around which actors can join forces. After the Joint CBRNE Strategy was reported to the Government in 2013, the Joint CBRNE Strategy – Processes and Priority Areas Project was launched, which was tasked with establishing processes to create priority areas and to implement such efforts.

This resulted in nine priority areas that are deemed particularly ready for development over the next few years. The reason these areas are prioritised is that the need for measures is not sufficiently catered for within the framework of current CBRNE operations.

Actors within the CBRNE field must therefore implement further measures and increase resources within the areas specified in this Strategy. Work undertaken to establish these areas in 2014 and 2015 is described in Chapter 2.3.3 and in more detail in the project's final report. The literature reviewed for the project in order to pinpoint these areas in 2015 is reported in Annex 1.

Priority areas (not listed in order of precedence)

- Disaster relief medicine
- Assessment of protection level
- Collaboration
- Requirements for operative CBRNE capabilities
- The unknown unknown
- Important public announcements (IPA) and outdoor warnings
- Analysis of microorganisms
- Border checks of hazardous goods
- Experts and key functions

Disaster relief medicine

Trained healthcare personnel with access to the correct protective equipment are vital to how successfully the healthcare system will be able to care for patients in the event of a CBRNE incident. Skills within the field of disaster relief medicine need to be quality-assured. National instructor training courses that provide quality-assurance and enhance uniformity nationwide are currently lacking. Certain types of protective equipment are not in place while others will soon pass their use-by date.

Projekt Storstad (Big City Project, The National Board of Health and Welfare, 2006, 2007, 2008) showed that there is no list of experts and that county councils and regions lack indication equipment. Research needs were also identified within this field in line with the Kartläggning av det nationella forskningsläget inom området CBRNE (Mapping of national research within the CBRNE field). (European CBRNE Centre, 2014)

The assessment produced by the project group¹ in 2015 is that relatively major resources are required, since it is a question of both training and purchasing of equipment.

Assessment of protection levels

There is no common methodology to assess the protection level required in different situations. In the case of several different types of incidents and exercise scenarios, for example an outbreak of a disease, oil spill or chemical spill, it has emerged that different actors make different assessments, thus hindering the successful management of an incident; in some cases there is an even a lack of protective equipment.

The assessment of the project group in 2015 is that the field comprises two parts; joint assessment methodology and lack of equipment. All in all, this means that relatively major resources are required.

Collaboration

Collaboration may be lacking at every level, particularly in terms of rare incidents and incidents where actors who do not typically work together need to cooperate.

The complexity of an incident can lead to procedures that normally function well not being sufficient. Examples of deficiencies described in exercise evaluations, for example, include: a lack of communication between actors, differing equipment, working methods and procedures, unclear requirements concerning capability at every level, substandard cooperation between emergency services and functioning operational procedures that also cover forensic issues in order support the legal system.

Efforts are under way in this area, both within the framework of R/N action plans and work on common foundations for collaboration and management. It was assessed that ongoing activities will not entirely resolve the deficiencies and that extra inputs are needed.

The assessment of the project group in 2015 is that relatively major resources are required, since this is a complex area involving many actors.

Operative CBRNE capability requirements

The absence of a common approach to the basic requirements that are to apply to operative capability within the CBRNE field creates uncertainty among actors and could lead to insufficient capability and/or plans not being implemented in an optimal manner. Clarity regarding the capability each actor has, or should have, is lacking in terms of CBRNE incidents.

At the beginning of the 2000s, a project was implemented to achieve this very aim, which resulted in a report: *Gemensamma grunder NBC-Skydd for totalforsvaret - Slutrapport* (in Swedish only; Joint grounds for total defence for NCB protection - Final report). This has never been updated.

1. Joint CBRNE Strategy Project – Processes and Priority Areas. The project group consisted of the project management group and central reference group.

The unknown unknown

No preparations are made for unlikely CBRNE incidents, which increases the risk of being taken by surprise and of less successful management of such incidents. Consequently, society's functioning and people's lives and health are exposed to greater risks should such incidents occur.

Additionally, if the incident is antagonistic, there will be extra complexity and a greater burden on society, which will also mean that the tasks of multiple actors will be altered.

The assessment of the project group in 2015 is that relatively major resources are required, since this is a complex area involving many actors.

Important Public Announcements (IPA) and outdoor warnings

To ensure that important messages are understood, for example in the event of accidents involving hazardous substances or at Seveso plants, it is important for the public to be aware about the IPA system and outdoor warnings.

Work is under way, including in terms of technology aimed at reaching as many people as possible, but the project group's assessment was that this will not be sufficient unless more is done to remedy these deficiencies.

The assessment of the project group in 2015 is that this requires training activities and informational campaigns, which do not have to be resource-intensive.

Analysis of microorganisms

There are deficiencies in terms of ability to analyse microorganisms. Laboratory resources are not sufficient, standard contracted laboratories lack methods for certain organisms and the need for rapid analyses in emergency situations is often not included in signed agreements. Currently, this problem is partially solved by sending samples abroad.

When handling the *Cryptosporidium* outbreak in 2010 and 2011, it became apparent that staff and laboratory resources were underdeveloped.

The assessment of the project group in 2015 is that optimisation and development of existing resources – both private and state-owned, nationally and internationally – are required, which does not have to be resource-intensive.

Border checks of hazardous substances

The capability to check hazardous substances at Sweden's borders needs to be improved in order to reduce the risk of intentional or unintentional importation. This applies in particular to radioactive substances and explosives. Several documents, including proposals, reports, Government commissions and risk and vulnerability analyses highlight the need for border-control improvements.

The assessment of the project group in 2015 is that the field comprises two parts; regulatory change and lack of equipment. All in all, this means that major resources are required.

Experts and key functions

Access to experts and key figures within several areas is deemed to be inadequate in terms of handling a societal disruption linked to CBRNE substances. This applies in particular to societal disruptions that could last for a longer period. This lack of experts and key figures also exerts an impact on preventive efforts, for example in terms of collaboration and planning.

Examples of areas demonstrating a lack of experts and key figures have been identified: management during an incident, long-term disruptions to water supply, disease outbreaks and the field of R/N. Efforts are underway to improve competencies in these areas, particularly in nuclear power counties. However, such efforts are not deemed to solve the lack of experts within radiation physics, radioecology etc.

The assessment of the project group in 2015 is that major resources are required to recruit and train experts and then conserve such competencies.

Work on priority areas

In the Guide to the Swedish Joint CBRNE Strategy (MSB, 2014), actors acknowledged that efforts within the priority areas would be undertaken in the form of programs of several, mutually-coordinated measures that jointly led to improvements. These could be preventive, preparatory, management or learning measures and such activities should permit the participation of actors at all levels: municipalities, county administrative boards, government authorities, the Government, county councils and regions, voluntary organizations, stakeholders organizations and private actors. These collective efforts were intended to be pursued over a number of years with clear coordination between the measures during the course of the work.

The Joint CBRNE Strategy – Processes and Priority Areas Project used the approach outlined above as a basis and produced a proposal for a process (see below) to manage the priority areas.

Together with the joint management working group, the managing party (MSB) is tasked with organizing work surrounding the priority areas. Where necessary, the order in which the different areas are to be tackled is prioritised, and an assessment of the areas requiring a preliminary study is conducted. A project owner is appointed for each area to be responsible for implementation carried out with other relevant actors. One example of a working method that could be useful during preliminary studies is the needs-analysis process that was established within the Förbättrad samordning för en långsiktig nationell inriktning inom B-området projekt (Improved coordination for a long-term national focus on the B field Project).

The programs/projects submit written annual reports to the managing party. These reports were presented to the joint CBRNE meetings. Once the work within a prioritised area is complete, the project manager produces a final report that the managing party assesses before proposing to how to proceed in order to gain benefit. Other actors affected by CBRNE incidents assess the final report.

All actors have a responsibility to ensure that activities are undertaken within the various priority areas.



TABLE 1
PROCESS GOVERNING PRIORITY CBRNE AREA ACTIVITIES

STARTING TOOLS	<ul style="list-style-type: none"> • Prioritised areas. 	
STEPS	<ol style="list-style-type: none"> 1. Where necessary, the managing party prioritises the order in which the priority areas are to be managed. 2. The managing party determines which priority areas require a preliminary study. 3. The managing party recommends a program manager/project manager for each prioritised area. 4. Where necessary, a preliminary study is carried out together with relevant actors. 5. The managing party takes a decision to launch a program/project. If a preliminary study is carried out, this forms the basis of the decision. 	<ol style="list-style-type: none"> 6. The project owner produces project directives. 7. The project manager produces project plans. 8. The program/project is launched. 9. The project manager produces annual written reports that are submitted to the managing party and reported at the joint CBRNE meetings. 10. The project manager produces a final report at the end of the project. 11. The managing party assesses the final report before proposing to how to proceed in order to benefit from these activities.
RESULTS	<ul style="list-style-type: none"> • Potential list of the order in which work within the various prioritised areas should begin. • Preliminary study reports. • Project directives. • Project plans. 	<ul style="list-style-type: none"> • Written reports from each prioritised area. • Final reports. • Recommendations for the future for each prioritised area.
RECIPIENTS	<ul style="list-style-type: none"> • Actors affected by CBRNE incidents. • The managing party. 	<ul style="list-style-type: none"> • Joint working group to support management efforts.

Sub-annex 1 – List of literature

See www.msb.se/cbrne

Annex 2 – Potential priority areas

When reviewing the literature in line with the process of identifying potential priority areas, around 100 deficiencies were identified. When establishing potential priority areas based on these deficiencies, it was assessed that some deficiencies are such that they do not need to be highlighted, for example infrastructural deficiencies or a general lack of staff, while similar deficiencies were merged.

Finally, 56 potential priority areas were identified that were prioritised according to the CBRNE prioritising process. For 27 of these areas, known as NO areas, it was assessed that efforts are being made to resolve these deficiencies and that they therefore do not fit into the definition of a priority area, that is “A demarcated area where a need has been identified in order to increase or maintain national capability and where this need is not considered to be met by existing inputs or through regular CBRNE activities.”

The 29 areas that were assessed as fitting the definition in its entirety were prioritised based on their assessed degree of seriousness. The nine most serious areas were highlighted as priority areas.

The compilation of all 56 potential priority areas, as in the case of the individual templates for each area, are subject to confidentiality in accordance with Chapter 15, Section 2 and Chapter 18, Section 13 of the Public Access to Information and Secrecy Act (2009:400).

Annex 3 – Template for prioritising areas

See www.msb.se/cbrne

Annex 4 – Management process

		
TABLE 2 MANAGEMENT PROCESS		
STARTING TOOLS	<ul style="list-style-type: none"> • Report concerning the implementation of the goals and sub-goals. • Report of identified improvement needs and proposals for how these needs can be remedied. • Other improvement proposals for the CBRNE Strategy, for example from individual actors, areas of cooperation, CBRNE forums etc. 	<ul style="list-style-type: none"> • Reports from relevant priority areas. • Minutes from joint CBRNE meetings. • The managing party’s annual report.
TASKS	<p>The managing party (MSB)</p> <ul style="list-style-type: none"> • Initiate a joint management working group. • Act as permanent secretary to the management working group. • Manage the CBRNE database. • Maintain and manage a website. • Take responsibility for managing documents. • Where necessary, report to the Government offices. • Plan and prepare for joint CBRNE meetings. • Gather and analyse supporting documentation. • Where necessary, produce proposals for changes within the area of the Strategy. • Provide feedback to the party that put forward the proposal. • Hold joint CBRNE meetings. • Present proposals for changes and information at joint CBRNE meetings. 	<ul style="list-style-type: none"> • Implement potential measures/ changes highlighted at joint CBRNE meetings. • Report to joint CBRNE meetings about measures that have been implemented. • Produce an annual report on both the activities carried out and activities that have been deselected. • Where necessary, revise the Strategy and its goals and sub-goals. • Where necessary, take the initiative to make changes to established processes. • Take the initiative to evaluate whether goals have been fulfilled. • Initiate work in, and monitoring of, priority areas. • Assess final reports and, where necessary, take decisions about potential future work on each prioritised area or close the prioritised area. • Take the initiative to establish new priority areas.
RESULTS	<ul style="list-style-type: none"> • Minutes from joint CBRNE meetings. • The managing party’s annual report • Updated work processes/goals/ strategy. • Evaluate whether goals have been fulfilled. 	<ul style="list-style-type: none"> • Decisions about potential future work on priority areas. • Website. • CBRNE database.
RECIPIENTS	<ul style="list-style-type: none"> • The managing party. 	<ul style="list-style-type: none"> • Actors affected by CBRNE incidents.

Annex 5 – References (available in Swedish only where English title is in brackets)

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- National Board of Health and Welfare (2008). Projekt storstad, En sammanställning av Malmö /Lunds län - Region Skånes katastrofmedicinska formåga. (Major City Project, A summary of Malmö /Lund County - Region Skånes disaster relief medical capability). Article number: 2008-124-2.

Annex 6 – Principles governing Swedish CBRNE activities

See www.msb.se/cbrne

Annex 7 – Actors who participated in activities

The Public Health Agency of Sweden, formerly Swedish Institute for Communicable Disease Control

Swedish Armed Forces

Swedish Board of Agriculture

Swedish Chemicals Agency

Municipalities: Motala, Örebro, City of Malmö and Södertörn Firefighter Association

Swedish Coast Guard

County councils: Stockholm County Council and Västernorrland County Council National Food Administration

County administrative boards: Stockholm County, Uppsala County and Norrbotten County

Swedish Civil Contingencies Agency

Swedish Police; before the new authority was formed, the Police Authority Headquarters and the National Forensic Center

Hazardous substances area of cooperation

Swedish Maritime Administration

National Board of Health and Welfare

National Veterinary Institute

Swedish Radiation Safety Authority

Swedish Association of Local Authorities and Regions

Swedish University of Agricultural Sciences

Swedish Defence Research Agency

Swedish Transport Administration

Swedish Transport Agency

Swedish Customs Service



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