

## Directive SE5

## SPILL RESPONSE

REFERENCES

- A. CFB Esquimalt Emergency Response Plan
- B. Canadian Environmental Protection Act (CEPA), 1999, Environmental Emergency (E2) Regulations (SOR/2003-307)
- C. A-GG-040-004/AG-001, General Safety Program – Hazardous Materials Safety and Management Manual
- D. MARCORD 66-5 – Hazardous Material Management
- E. ED 4003-9, Hazardous Materials Management Plan
- F. Transportation of Dangerous Goods (TDG) Act, Clear Language Regulations – Part 8
- G. Environmental Management Act (S.B.C. 2003, c. 53), Spill Reporting Regulation (B.C. Reg. 263/90)
- H. Environmental Directive (ED) 4003-1/2003, Spill Reporting
- I. DAOD 4003-1 – Hazardous Materials Management
- J. MARCORD 4-12 – Environmental Program
- K. FSEMS Directive SE1, Safety and Environmental Emergency Incident Reporting
- L. FSEMS Directive E8, Storage Tanks

PURPOSE

1. This Directive details MARPAC spill response requirements discussed in references A through L. Units that have quantities of HazMat in excess of specified amounts in [Directive SE1](#) (Annex DSE1B, Table 1) and/or 50 litres of POL shall have spill response plans. Base emergency response procedures are detailed in the CFB Esquimalt Emergency Response Plan (reference A).

SCOPE

2. This Directive applies to all MARPAC integral and lodger units identified in [Part 2, Annex 1A](#).

## DEFINITIONS

3. Hazardous Material (HAZMAT). As defined by reference I, HAZMAT is any material that if handled improperly can endanger human health and well-being or the environment or equipment. Some examples of HAZMAT are poisons, corrosive agents, flammable substances, ammunition and explosives.

4. Spill. As defined by reference M, the intentional or unintentional abandonment, deposit, discharge, dump, emission, empty, exhaust, throw, inject, leak, pour, place, release, seep, or spray of material into the environment. A minor spill is defined as a spill that the Unit can contain and clean-up in its entirety without assistance. A major spill is defined as a spill that the Unit cannot contain and/or clean-up without assistance.

5. Environmental Emergency Plan. As defined by reference B, means a plan respecting the prevention of, preparedness for, response to and recovery from an environmental emergency in respect of a substance.

RESPONSIBILITIES

6. A Unit Commanding Officer (CO) or Base Branch Head (BH) of a unit that has quantities of HazMat in excess of specified amounts in [Directive SE1](#) (Annex DSE1B, Table 1) and/or 50 litres of POL

shall ensure that their organization has an established and exercised spill response plan; the plan and exercise records shall be reviewed during scheduled FSE program verifications. A CO shall ensure that FSE is informed of all spills.

7. The Formation Safety and Environment Officer (FSEO) reports to the Base Commander (BComd) and provides safety and environmental advice and support to the Formation.
8. The Joint Operations Centre (JOC) is responsible for having a spill call-out procedure to ensure that appropriate organizations are contacted in the event of a spill incident. Contact information for FSE is available on the [FSE website](#) and in Annex DSE1A ([RDIMS 195921](#)).
9. The Queen's Harbour Master (QHM) is the CO of the Port Operations and Emergency Services Branch (POESB) and is the port authority for both Esquimalt and Nanoose Harbours. POESB controls the Base Emergency Response Plan (reference A) and provides spill response for all 911 calls to the POESB Fire Hall that is beyond the capability of first level response; further, the QHM is responsible for second and third level marine spill response for DND spills in Esquimalt and Nanoose Harbours and their approaches. Queen's Harbour Master also has the capability to deploy outside Esquimalt Harbour to assist with DND generated spills and may in some circumstances be the preferred responder depending on the location of the spill and the availability of Coast Guard and commercial assets in the vicinity.
10. The Base Construction Engineering Officer (BCEO) is responsible for providing second level HazMat emergency response for land-borne spills through the BCE HazMat Emergency Response Team (BCE HERT). The BCE HERT may also provide assistance to HMC Ships in Esquimalt Harbour.
11. Formation Environment Management Committee (FEMC). The FEMC provides a forum to discuss spill response, reporting, incidents and investigations.
12. A Unit General Safety Officer (UGSO), Environment Officer (UEnvO) or Unit Safety and Environment Officer (USEO) acts on the behalf of the CO/BH and is responsible for the Unit's spill response plan.
13. Contractors. Department of National Defence personnel (military and civilian) who are responsible for contractors working on MARPAC properties shall ensure that the requirements of this Directive, which may apply to the contract, are written into the contract and followed throughout its duration.
14. All Canadian Forces and DND civilian personnel are responsible to respond to spill incidents in order to ensure the safety of others and the protection of the environment.
15. Environmental Emergencies (E2) Regulations. In the event MARPAC integral or lodger units require storage of substances listed in [Reference B](#), Schedule 1, column 1, and quantities are equal to or exceed those set out in column 3 (or if the substance is stored in a container that has a maximum capacity equal to or greater than the quantity set out in column 3), Units shall comply with E2 regulations using the following process (Refer to [RDIMS 204999](#) for the E2 regulations process map):
  - a. submit a written notice to FSE within 30 days that contains the information set out in Schedule 2 of reference B and a completed certification form (Schedule 3 of reference B);
  - b. resubmit the above notice and certification to FSE within 20 days after the occurrence of any of the following changes:
    - (1) any changes to the information reported IAW para 15a; or

- (2) any increase of 10% or more in the maximum expected quantity of a substance reported IAW para 15a;
- c. notify FSE and submit the certification form set out in Schedule 3 of reference B within 30 days if for 12 consecutive months the quantity of the substance in storage has been less than the quantity set out in column 3 of Schedule 1 of reference B;
- d. if circumstances under subsection 4(1) of reference B apply, submit to FSE within 3 months an environmental emergency plan and fill in the certification form set out in Schedule 3. The plan shall meet subsections 4(2) and (3) of reference B and shall contain the information requested in Schedule 4;
- e. implement and test the environmental emergency plan and submit a notice to FSE with the information requested in Schedule 5 of reference B within one year from the time the plan was written;
- f. update and test the environmental emergency plan at least once a year to ensure that the plan continues to meet the requirements of subsections 4(2) and (3) of reference B;
- g. keep copies of the plan readily available for the individuals responsible to implement it in the event of an emergency; and
- h. keep with the plan, a record of the results from the annual updates and tests for a period of not less than five years.

#### DIRECTION

16. Spill Response Plan. All MARPAC Integral and Lodger Units that store quantities of HazMat in excess of specified amounts in [Directive SE1](#) (Annex DSE1B, Table 1) and/or 50 litres of POL shall have established and exercised spill response plans. The General Safety Program, Hazardous Materials Safety and Management Manual (reference C) provides guidance for the creation of a spill response plan and should be consulted. MARPAC Units that are required to have a spill response plan shall exercise them once a year (reference D). Considerations for a response plan may include (Refer to [RDIMS 205000](#) for the spill response plan process map):

- a. determining high-risk locations where spills are probable;
- b. identifying all tanks (defined in Directive E8) that the Unit has operational control of. Once determined these tanks shall be included in the Unit's Spill Response Plan. Note that Directive E8, Annex DE8A details mandatory information that shall be included in a Storage Tank Emergency Response Plan to respond to emergency situations, which includes but is not limited to spills;
- c. posting the spill response plan or providing direction to it in high traffic areas (e.g., Safety and Environment Information Board);
- d. reviewing records of previous spill reports;
- e. identifying the most appropriate options and methods to improve performance and reduce risk (e.g., reducing the volume and range of HazMat, having secondary containment, etc.);

- f. exercising the spill response plan at least annually and revising as necessary based on lessons learned; and
- g. monitoring the number and volume of spills and comparing information at the annual SEMS Management Review highlighting both achievements and shortcomings, and identifying priorities for the next year by setting measurable and achievable targets.

17. Spill Response Kits. Store kits in close proximity to locations where HazMat is stored. Every spill response kit shall have an inventory of required contents located at the top of the kit. PPE shall be located at the top of the spill kit to ensure easy access for the spill responder. Spill kits should be closed with a safety seal affixed to indicate if the kit has been used or tampered with. It is recommended that MARPAC units obtain spill kits through the POESB environmental protection office.

### RESPONDING TO SPILLS AND REQUESTING ASSISTANCE

18. Initial Response. The unit responsible for a spill shall respond immediately without jeopardizing the health or safety of personnel in accordance with the procedures detailed in its spill response plan. Following the immediate first level response action, spill containment and clean up shall escalate as quickly as possible to the level of response required.

19. Levels of Response. MARPAC has defined three levels of spill response. A call out procedure flow chart for spills is available at [Directive SE1](#), Annex DSE1A. First level response is the unit that caused the spill (responsible unit), second level response involves assistance from either POESB (Fire Services or EPO) or BCE HERT, and third level involves assistance from an organization external to DND. The unit that is responsible for the spill is also responsible for the disposal of the spilled product and the clean-up materials. The levels of response and the unit/agency associated with that level are defined below:

- a. First level response is the responsibility of the unit that causes or discovers the spill. First level responder duties shall include securing the area, assessing the situation and responding to the spill to the best of their ability and, if required, request second level responders. In the event the first level responders are unable to contain and clean up the spill they shall turn the scene over to the second level responders who shall assume I/C responsibilities. The first level responder retains responsibility for reporting the spill and the storage and disposal of all HazWaste generated by the incident;
- b. Second level response:
  - (1) contact POESB QHM/EPO for marine spills in Esquimalt and Nanoose Harbours and their approaches;
  - (2) contact the JOC for marine spills outside of Esquimalt and Nanoose Harbours and their approaches. The JOC shall contact Coast Guard and potentially POESB QHM/EPO depending on the location of the spill and the availability of Coast Guard and commercial assets in the vicinity;
  - (3) contact the JOC for spills on non-DND land. The JOC shall contact the appropriate response organization;
  - (4) land-borne spills are divided into the following phases:
    - (a) Fire Services responds to 911 calls and shall secure and render the site safe. In specific instances Fire Services may commence site clean up if

- the I/C deems that such action is both within the capability and time constraints of Fire Services. The unit that caused the spill is responsible for the storage and disposal of all waste generated by the incident;
- (b) in the event BCE HERT support is required, they shall commence the site clean up including the proper disposal of the contaminated material. The responsibility for paying for the disposal of material contaminated by the spill remains the responsibility of the unit that caused the spill;
  - (c) the I/C has the authority to use all available resources at the Base level through the responsible BH;
- c. third level response consists of the appropriate second level response agency with assistance from an OGD, an outside mutual aid agency and/or a contracted resource. The BComd must provide authorization to request external resources to aid in third level response.
20. Abandoning Spills. Consider the following before abandoning a spill (Refer to [RDIMS 205138](#) for the abandoning spills process map):
- a. under no circumstance shall a land-borne spill be abandoned;
  - b. unless overridden by immediate operational concerns (determined by the CO/BH), self-generated marine spills of non-miscible (e.g., POL) substances shall not be abandoned unless all of the following criteria have been met:
    - (1) the slick poses no threat to any shoreline or Marine Protected Area (MPA);
    - (2) it is not possible to clean up the spill with the equipment available; and
    - (3) response assistance would arrive after the spill had broken up or dispersed.

## TRAINING

21. Ensuring Competence. To ensure spill response team members competence, annual refresher drills, maintaining physical fitness and the ability to wear PPE are recommended (Annex A of reference E).

## PROGRAM CHECKLIST

22. The program checklist is a tool used to perform self verifications to ensure compliance with environmental regulations. The checklists are posted on the [FSE website](#) or can found in [RDIMS 213214](#).

## RECORDS

23. The Unit shall keep the following records:
- a. E2 spill response plans and exercises of these plans;
  - b. Unit level spill response plan exercises;
  - c. Spill responder training records; and
  - d. Spill reports (under [Directive SE1](#)).

