

3.2 Accidental Exposure/Spills

The information provided in the following sections is intended to guide safe practice in the POGO Satellite Clinics. It is not intended to replace your institutional policies and procedures. Please ensure all staff are aware of their own institutional policies and procedures and refer to them as their primary source.

The following actions should be taken for overt contamination of clothing, skin or eyes with hazardous drugs, waste and body fluids that may contain hazardous drugs.

All Accidental Contacts

Everyone

1. Initiate first aid and decontamination as described below for the specific contact type. Managing personal contamination takes precedence over cleanup of the spill. Specific procedures for managing accidental exposures and spills are found in the sections below.
2. Staff requiring emergency treatment related to accidental exposure must proceed to the Emergency Department. After hours, report to the hospital’s Emergency Department.
3. Report incident to immediate Supervisor.
4. There are mandatory reporting requirements under the [Occupational Health and Safety Act](#) and reporting requirements to [Workplace and Safety Insurance Board \(WSIB\)](#). Contact the Occupational Health Department for assessment and follow-up.
5. Document appropriately.

Supervisor

1. Initiate an investigation to determine the cause of the incident and what corrective action can be taken to minimize the possibility of recurrence.
2. Document appropriately.

EXPOSURE	MANAGEMENT
ALL TYPES OF EXPOSURE	<ul style="list-style-type: none"> • Remove contaminated items • Disposable items: treat as cytotoxic waste • Contaminated clothing/linen: <ul style="list-style-type: none"> ○ Treat as cytotoxic waste if saturated ○ Place personal clothing in double bags to be taken home and washed separately (2 wash cycles) in hot water using laundry soap ○ Double-bag hospital linens (blue bags) and treat in usual manner
SKIN	<ul style="list-style-type: none"> • Clean the affected skin with soap and water (shower if possible) and rinse for 15 minutes. Avoid vigorous scrubbing • Shower if indicated
EYES	<ul style="list-style-type: none"> • Remove contact lens(es) • Gently irrigate the eye(s) with water for a minimum of 15 minutes



EXPOSURE	MANAGEMENT
	<ul style="list-style-type: none"> If eyewash station is unavailable, sterile 0.9% sodium chloride connected to an IV tubing can be used for irrigation
NEEDLESTICK	<ul style="list-style-type: none"> Wash under running water, gently with soap Let wound bleed freely, gently massaging away from the body If needle contaminated with both chemotherapy/hazardous drugs AND prior patient contact, report immediately to joint health and safety department Ensure policy for needlestick or sharps injury are followed
INGESTION	<ul style="list-style-type: none"> Seek immediate medical attention Do NOT induce vomiting for ingestion
INHALATION	<ul style="list-style-type: none"> Move away from the area quickly Seek immediate medical attention

Spill Procedure

When a spill cannot be contained or easily managed, it is strongly recommended to call a CODE BROWN or equivalent. Notify medical team of the spill and follow your institutional policies and procedures. Document all patient-related exposures and treatments.

Examples of chemotherapy spills include (but are not limited to) the following:

- Leaking intravenous (IV) bags and tubing containing chemotherapy medication
- Incontinence or excreta, primarily urine or diarrhea, from patients who have received chemotherapy in the last 48 hours
- Uncontained vomitus following any chemotherapy dose in the previous 48 hours (please see [Sub-Section 3.1 Safe Handling, Administration and Disposal of Chemotherapy Agents](#))

Important: A Spill Kit should be readily available in all areas where chemotherapy drugs are stored, prepared, transported and administered, and locations where patients are cared for following chemotherapy administration.

All personnel handling hazardous drugs should be trained to handle a spill. They must know the location of the nearest spill kit in their area of work, know what it contains and how to use it.

Nursing staff are to do the initial clean-up of the spill, followed by cleaning with detergent by housekeeping.

Materials

It should be noted that each institution may use different brands of the supplies listed below. It is important that supplies used be approved by their institutional Risk/Employee Health and [Infection Prevention and Control \(IPAC\)](#).



A. Personal Protective Equipment Supplies (minimum amount)

Spill Kit Contents	Purpose/Rationale
Chemotherapy Gloves (4 pairs)	<ul style="list-style-type: none"> • Skin protection
Chemotherapy Gowns (2)	<ul style="list-style-type: none"> • Skin and clothing protection
Shoe Covers (2 pairs)	<ul style="list-style-type: none"> • Footwear and clothing protection • Prevents tracking contamination from the shoes to other areas
Eye Protection (goggles x 2)	<ul style="list-style-type: none"> • Protect against vapors irritating eyes or drugs or cleaning solutions splashing into the eye
P100 Respirator fitted with vapour/gas filter cartridges (1 size small, medium, large) <ul style="list-style-type: none"> • Store respirators with filter cartridges attached Respirator cleaning wipes	<ul style="list-style-type: none"> • Respiratory protection • A chemical cartridge-type respirator is recommended because it provides the greatest protection in all situations • Disposable P100 cartridges should be replaced after they have been used to clean up a spill • Respirator cleaning wipes to clean used respirator

B. Supplies (minimum required)

Spill Kit Contents	Purpose/Rationale
Chemosorb™ pads (6) <ul style="list-style-type: none"> • 12 x 12 pads 	<ul style="list-style-type: none"> • To absorb spill • Each pad can absorb up to 500ml liquid • Instantly solidifies liquid into a semi-gel
Disposable toweling/cleaning cloths (20)	<ul style="list-style-type: none"> • To clean, rinse and dry spill surface
Cytotoxic waste bags (2)	<ul style="list-style-type: none"> • For collecting and disposing of contaminated supplies and equipment
Disposable scoop & broom (1)	<ul style="list-style-type: none"> • For sweeping up glass particles and other solids
Large resealable plastic bags (4)	<ul style="list-style-type: none"> • Worn inside-out over gloved hand to pick up wipes or absorbent pads that are saturated • May be used to collect contaminated wipes prior to depositing them in the larger red cytotoxic waste bag • Used to store used respirator(s) until it can be cleaned
Puncture-resistant container (1)	<ul style="list-style-type: none"> • For disposal of glass fragments from broken vials
Warning signs (2)	<ul style="list-style-type: none"> • To mark off area of spill and limit traffic in the area
Decontaminating/Deactivating Agent (solution or pre-saturated wipes) Examples: <ul style="list-style-type: none"> • Clorox HC™ wipes (monitor expiratory date) 	<ul style="list-style-type: none"> • For decontaminating surfaces affected by the spill • For deactivating chemotherapy/hazardous drugs • Note: No single agent can deactivate all chemotherapy/hazardous drugs; therefore, a combination of products is used

Spill Kit Contents	Purpose/Rationale
<ul style="list-style-type: none"> Hydrogen Peroxide with Peracetic acid solution (ex. Peridox™) 	
Bottles of water – 4 x 500ml	<ul style="list-style-type: none"> For wetting absorbent pads placed over powder spills to dissolve powder For rinsing the decontaminating/deactivating agents off the spill surface
Zip ties (2)	<ul style="list-style-type: none"> For sealing waste bags Minimizes risk of generating aerosols or contamination compared to tying the waste bag
Copy of Procedures for Cleaning (if available per institution)	<ul style="list-style-type: none"> Readily available instructions for managing the spill
Patient information sheet (6) (if available per institution)	<ul style="list-style-type: none"> To provide information and instructions for patient to follow at home

This guidance document was developed by Ms. Jennifer Vincelli, The Hospital for Sick Children, Toronto and Ms. Heather Perkins, CHEO, Ottawa. Reviewed in consultation with Ms. Kirsty Morelli, Scarborough Health Network, Centenary Hospital, Ms. Kathy Skelly, Trillium Health Partners, Credit Valley Hospital and Ms. Christina McCauley, POGO/The Hospital for Sick Children, based on the sources below.

References

1. Chemo Clinic Unit Manual, Policy CC-m-03. Toronto: Rouge Valley Health Systems, June 2010. PDF.
2. Practice Standards Manual, Policy SHN-PRSTAND-040. Toronto: Scarborough Health Network, March 2020. PDF. Revised 2021/03.
3. Practice Standards Manual, Policy SHN-PRSTAND-039. Toronto: Scarborough Health Network, February 2020. PDF. Revised 2021/03.

Disclaimer: Source Accuracy

You are welcome to download and save a local copy of this document in the Word and/or PDF formats provided. As the POGO Satellite Manual is subject to ongoing revisions and updates by POGO, we recommend you regularly check the online version posted at <https://www.pogo.ca/satellite-manual/> to ensure you have the most up-to-date content. In the event of any inconsistency between the content of a local copy and the online version of the POGO Satellite Manual, the content of the online version shall be considered correct. Please see also the [POGO Satellite Manual Disclaimer](#).

Record of Updates

Version Number	Date of Effect	Summary of Revisions
1	7/13/2021	<ul style="list-style-type: none"> Original version posted.