



## Healthcare Setting Infection Control

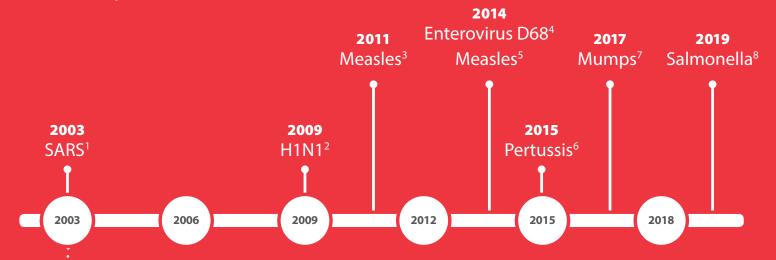




#### Why is Infection Control important?

Globalization has provided increased opportunities for emergence and re-emergence of infectious diseases in Canada in recent years.

#### **Some major Canada Outbreaks:**





During the **SARS** outbreak in Canada, it was estimated that **10 healthcare workers** were **infected** for **every day** that a symptomatic, **infected individual** was **not placed in isolation**.<sup>9</sup>



More than **200,000 patients** get **infections** every year **while receiving healthcare** in Canada; **more** than **8,000** of these patients **die** as a result.<sup>10</sup>

Healthcare-Associated Infections (HAIs) can occur in all types of care setting including hospitals, physician clinics, outpatient care clinics and long term care homes, etc.<sup>11</sup>

The best approach is to **plan** and **be prepared** to respond. As physicians and nurses, you are the frontline to **protect patients, staff and yourself**.

# Influenza and pneumonia are ranked among the top 10 leading causes of death in Canada. Each year in Canada, Flu causes approximately 12,200 deaths. Approximately deaths.



The Ontario Ministry of Health expects to have a difficult flu season this year based on trends in Australia, and has ordered 300,000 more high-dose flu vaccines 13,14

Outbreaks not only impact patients and health provider's health, it may also result in the closure of the facility and significant cost to healthcare providers.<sup>15</sup>

The mean cost of a flu-like illness is \$968 +/- \$1806.16

#### **How to Prevent Infection**

Most infections are preventable if infection prevention and control strategies are followed.

Cardinal Health Canada offers full line of infection control products to reduce transmission of infectious agents in **six key ways**:



**Hand Hygiene** 



**Personal Protective Equipment** 



**Surface Disinfection** 



**Single-Patient Use** 



**Immunization** 



**Waste Management** 



### **Hand Hygiene**

#### **Hand Soap**

		Item No.	Description	Packaging
0		DEB713	Antibacterial Hand Soap, 1 L Cartridge	12 ea/ca
0		DEB718	Antibacterial Instafoam Hand Soap, 1 L Cartridge	8 ea/ca
	0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	DEBAM1LDS	Dispenser for 1 L Hand Soap Cartridge (e.g. DEB713 and DEB718)	15 ea/ca
<b>*</b>		ALMA1L	Antibacterial Hand Soap, 1 L Cartridge	8 ea/ca

		Item No.	Description	Packaging
3		ALMM1L	Lotion Hand Soap, 1 L Cartridge	8 ea/ca
	-	ALMR940C	Dispenser for 800 mL/1 L Hand Soap Cartridge (e.g. ALMA1L and ALMN1L)	1 each



It is best to use **soap and water** when hands are visibly dirty and after using the restroom. **Alcohol-based handrub** should be used as the first choice for hand hygiene for non-soiled hands.<sup>17</sup>

Description

Item No.

**Packaging** 

#### **Alcohol-Based Hand Sanitizer**

	Item No.	Description	Packaging
	DEB815	Microsan Optidose 72% Alcohol, 1 L Cartridge	8 ea/ca
The state of the s	DEB807	Microsan Encore, 72% Alcohol, 1 L Cartridge	8 ea/ca
3000	DEBFS1LDS	1 L Dispenser for DEB815 and DEB807	15 ea/ca
	DEBENC1TF	Microsan Encore 1 L Touch Free Cartridge	3 ea/ca
Ũ	DEBTF2BLK	Touch Free Dispenser for 1 L Touch Free Cartridge, Black	1 each
	DEBTF2WHI	Touch Free Dispenser for 1 L Touch Free Cartridge, White	1 each
	DEB92752	Dispenser Stand	1 each
<b>₩</b>	DEB804	Microsan Encore 400 mL Pump Bottle	12 ea/ca
•	DEB805	Microsan Encore 50 mL Pump Bottle	36 ea/ca

	DEB400WH	Point of Care Dispenser for 400 mL Bottle	1 each
	DEB400ML-TMW	Table Top Mount for 400 mL Dispenser	1 each
	ALM024	Aloe Med™ Foam Hand Sanitizer, 72% Alcohol, 50 mL Pump	24 ea/ca
Marie Land	ALM034	Aloe Med™ Foam Hand Sanitizer, 72% Alcohol, 950 mL Pump	8 ea/ca
	ALM044	Aloe Med™ Foam Hand Sanitizer, 1 L Cartridge	6 ea/ca
3	ALMDISAG	Automatic dispenser for 1 L Cartridge	1 each
	ALMDISMG	Manual dispenser for 1 L Cartridge	1 each
1	ALMSTAND	Floor Stand	1 each
-			



**Norovirus** is inactivated by alcohol concentrations ranging from **70% to 90%**. <sup>18</sup> WHO experts **recommend the use** of **alcohol-based handrubs** during outbreaks of **noroviral gastroenteritis**. <sup>19</sup>









## Moments for Hand Hygiene



Before Initial Patient/ Patient Environment Contact

## TITLE OF THE PARTY OF THE PARTY

Before Aseptic Procedure



After Body Fluid Exposure Risk



Clean your hands when entering:

- Before touching patient
- Before touching any object/furniture

#### WHY?

• To protect the patient/ patient environment from harmful germs carried on your hands

#### WHEN?

Clean your hands immediately before any aseptic procedure

#### WHY?

• To protect the patient against harmful germs, including the patient's own germs, entering his or her body

#### WHEN?

Clean your hands immediately after an exposure risk to body fluids (and after glove removal)

#### WHY?

• To protect yourself and the health care environment from harmful patient germs

## After Patient/ Patient Environment Contact

#### WHEN?

Clean your hands when leaving:

- After touching patient
- After touching any object/furniture

#### WHY

• To protect the yourself and the health care environment from harmful patient germs

4 Moments for Hand Hygiene, adapted by Public Health Ontario from Just Clean Your Handswww.publichealthontario.ca/-/media/documents/bp-clinical-office-practice.pdf, page 79.



Approximately **70%** of **health care workers do not** routinely **practice hand hygiene**, with health workers reporting misunderstandings about the relevance and importance of hand hygiene in everyday clinical practice.<sup>21</sup>



#### **Personal Protective Equipment**

#### **Vinyl Exam Gloves**

For basic barrier protection.



Item No.	Description	Packaging
MDS192074	Vinyl Powder-Free, Latex-Free, Small	100 ea/bx, 10 bx/ca
MDS192075	Vinyl Powder-Free, Latex-Free, Medium	100 ea/bx, 10 bx/ca
MDS192076	Vinyl Powder-Free, Latex-Free, Large	100 ea/bx, 10 bx/ca
MDS192077	Vinyl Powder-Free, Latex-Free, X-Large	100 ea/bx, 10 bx/ca

#### **Sterile Gloves**

For aseptic procedures, anatomical fit and natural movement.



Item No.	Description	Packaging
2D72PT65X	Protexis® PI, Polyisoprene, Interlocking Beaded Cuff, Powder-Free, Latex-Free, Sterile, Size 6.5	50 pr/bx, 4 bx/ca
2D72PT70X	Protexis® PI, Polyisoprene, Interlocking Beaded Cuff, Powder-Free, Latex-Free, Sterile, Size 7	50 pr/bx, 4 bx/ca
2D72PT75X	Protexis® PI, Polyisoprene, Interlocking Beaded Cuff, Powder-Free, Latex-Free, Sterile, Size 7.5	50 pr/bx, 4 bx/ca
2D72PT80X	Protexis® PI, Polyisoprene, Interlocking Beaded Cuff, Powder-Free, Latex-Free, Sterile, Size 8	50 pr/bx, 4 bx/ca
2D72PT85X	Protexis® PI, Polyisoprene, Interlocking Beaded Cuff, Powder-Free, Latex-Free, Sterile, Size 8.5	50 pr/bx, 4 bx/ca
2D72PT90X	Protexis® PI, Polyisoprene, Interlocking Beaded Cuff, Powder-Free, Latex-Free, Sterile, Size 9	50 pr/bx, 4 bx/ca



**Protexis® PI Surgical Gloves** offers tactile response with **barrier protection**. Proprietary hand mold with an independent thumb design allows for an anatomical fit and natural movement in the fingers, thumb and palm. Featuring an interlocking, beaded cuff design that helps to reduce roll-down.<sup>22</sup>

#### **Synthetic Nitrile Gloves**

For increased protection, exposure to various chemicals and protection against bodily fluids.



Item No.	Description	Packaging
88ES01XS	Esteem™ Comfort, Nitrile, Powder-Free, Latex-Free, X-Small	200 ea/bx, 10 bx/ca
88ES02S	Esteem™ Comfort, Nitrile, Powder-Free, Latex-Free, Small	200 ea/bx, 10 bx/ca
88ES03M	Esteem™ Comfort, Nitrile, Powder-Free, Latex-Free, Medium	200 ea/bx, 10 bx/ca
88ES04L	Esteem™ Comfort, Nitrile, Powder-Free, Latex-Free, Large	200 ea/bx, 10 bx/ca
88ES05XL	Esteem™ Comfort, Nitrile, Powder-Free, Latex-Free, X-Large	180 ea/bx, 10 bx/ca

#### Choose the type of gloves that best suits your care activities<sup>23</sup>:

- Use **non-sterile examination gloves** of good quality and adequate size for routine use.
- Use **synthetic gloves** for procedures that require tactile sensation.
- Use **sterile procedure gloves** for aseptic procedures.

The use of latex gloves is not recommended. Allergic reactions have been reported with the use of latex gloves.

Cardinal Health offers a wide variety of gloves from basic to chemo, please visit **shop.cardinalhealth.ca** for more options.

# ESTEEM<sup>TM</sup> Comfort Gentle and Strong • Minimum elongation of 650% • Low dermatitis potential



## PPE **prevents contact** with infectious agents, or body fluids that may contain infectious agents, by **creating a barrier** between the worker and the **infectious material**.



#### Masks

	Item No.	Description	Packaging
	AM018238	Isolation Face Mask, Earloop	50 ea/bx, 40 bx/ca
	AT7511	ASTM Level 1 Procedure Mask, Blue, Poly Inner Layer	50 ea/bx, 6 bx/ca
	AT71021	ASTM Level 1 Procedure Mask, Blue, Tissue Inner Layer	50 ea/bx, 10 bx/ca
	DYN2202	Face Mask with Shield	50 ea/bx, 10 bx/ca
0	N95A-S	Molded Surgical N95 Respirator, Small	120 ea/ca
<b>*</b>	N95A-ML	Molded Surgical N95 Respirator, Medium/Large	120 ea/ca
	3M1870PLUS	Aura™ Health Care N95 Particulate Respirator and Surgical Mask	20 ea/bx, 6 bx/ca

Isolation	Gowns

Item No.	Description	Packaging
NON24258	Isolation Gown, Universal, Yellow	50 ea/ca
A1407-1	Isolation Gown, X-Large, Yellow	100 ea/ca
A4522-1	Isolation Gown, Universal, Yellow	100 ea/ca
SMD130001	Shoe Cover, Universal Size, Blue	100 ea/bx, 8 bx/ca

#### **Organizers**

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Item No.	Description	Packaging
TPDIDC111Y	Door Caddy, Yellow 16 in. W x 34 in. H x 4 in. D	1 each
ED-097	Infection Prevention System	1 each



An N95 respirator is used to prevent inhalation of small particles that may contain airborne infectious agents (e.g. Mycobacterium tuberculosis (TB))<sup>24</sup>

We offer comprehensive portfolio of masks (e.g. 3M). For other alternatives of masks, please visit **shop.cardinalhealth.ca** 







Does your patient have symptoms of acute infection, e.g., diarrhea, vomiting, new cough or fever?

Minimize the potential spread of infectious disease by moving patients out of the waiting room, **providing alcohol-based** hand rub and provide mask or tissues if they are coughing.<sup>25</sup>



The sequence for **removal of PPE** is very important to **prevent contamination** of one's self during removal.<sup>26</sup>

Improper use of PPE can lead to infection. According to several studies, healthcare personnel who did not use/remove PPE consistently and correctly were found at higher risk of infection (e.g. MERS, SARS and Ebola).<sup>27</sup>



#### **Personal Protective Equipment**

#### **Putting On PPE**





#### STEP 3

#### Put on Mask/ N95 Respirator

- Place mask over nose and under chin
- Secure ties, loops or straps
- For respirators, perform a seal-check



#### STEP 4

#### Put on Protective Eyewear

- Put on eye protection and adjust to fit
- Face shield should fit over brow



#### STEP 5

#### **Put on Gloves**

- Put on gloves, taking care not to tear or puncture glove
- If a gown is worn, the glove fits over the gown's cuff



#### **Taking Off PPE**

#### STEP 1

#### **Remove Gloves**

- Remove gloves using a glove-toglove/skin-to-skin technique
- Grasp outside edge near the wrist and peel away, rolling the glove inside-out
- Reach under the second glove and peel away
- Discard immediately into waste receptacle



#### STEP 2

#### **Remove Gown**

- Remove gown in a manner that prevents contamination of clothing or skin
- Starting at the neck ties, the outer, 'contaminated', side of the gown is pulled forward and turned inward, rolled off the arms into a bundle, then discarded immediately in a manner that minimizes air disturbance



#### STEP 3

#### Perform Hand Hygiene



#### STEP 4

#### **Remove Eye Protection**

- Arms of goggles and headband of face shields are considered to be 'clean' and may be touched with the hands
- The front of goggles/face shield is considered to be contaminated
- Remove eye protection by handling ear loops, sides or back only
- Discard into waste receptacle or into appropriate container to be sent for reprocessing
- Personally-owned eyewear may be cleaned by the individual after each use

#### STEP 5

#### Remove Mask/N95 Respirator

- Ties/ear loops/straps are considered 'clean' and may be touched with hands
- The front of the mask/respirator is considered to be contaminated
- Untile bottom tie then top tie, or grasp straps or ear loops
- Pull forward off the head, bending forward to allow mask/respirator to fall away from the face
- Discard immediately into waste receptacle



#### STEP 6

Perform Hand Hygiene



Putting On and Taking Off Personal Protective Equipment (PPE), adapted from PIDAC's Routine Practices and Additional Precautions for All Health Care Settings. www.publichealthontario.ca/en/eRepository/RPAP\_All\_HealthCare\_Settings\_Eng2012.pdf, page 70-71.

#### **Surface Disinfection**



Clinical office cleaning regimens include daily cleaning and disinfecting surfaces and objects with an approved surface cleaner and a hospital-grade, low-level disinfectant, which include Alcohols (70-95% ethyl or isopropyl alcohol), 1:50 dilution of household bleach, Quaternary Ammonium Compounds (QUATs) and Hydrogen Peroxide Enhanced Action Formulation (AHP).<sup>28</sup>



Table 1: Spaulding's Classification of Medical Equipment/Devices and Required Level of Processing/Reprocessing<sup>29</sup>

Classification	Definition	Level of Processing/Reprocessing	Examples
Noncritical Equipment/Device	Equipment/device that touches only intact skin and not mucous membranes, or does not directly touch the client/patient/resident	Cleaning followed by Low-Level Disinfection (in some cases, cleaning alone is acceptable)	ECG machines     Oximeters     Bedpans, urinals, commodes
Semicritical Equipment/Device	Equipment/device that comes in contact with non-intact skin or mucous membranes but does not penetrate them	Cleaning followed by High-Level Disinfection (as a minimum) Sterilization is preferred	Respiratory therapy equipment     Anaesthesia equipment     Tonometer
Critical Equipment/ Device	Equipment/device that enters sterile tissues, including the vascular system	Cleaning followed by Sterilization	<ul> <li>Surgical instruments</li> <li>Implants</li> <li>Biopsy instruments</li> <li>Foot care equipment</li> <li>Eye and dental equipment</li> </ul>

Table 2: Frequency of cleaning items in the clinical practice setting<sup>30</sup>

Clean between patients		Clean at visibly so	end of the day and when piled		Clean according to a fixed schedule and when visibly soiled	
	Armrests on Chairs	Ļ	• Bathrooms	<u> </u>	Appliances (Refrigerators, Microwaves, Coffee Makers)	
X	• Beds (e.g. Examination Table)		• Carpets (Vacuumed)			
	• Blood Pressure Cuff		• Chairs, Couches		Carpets (Steam Cleaning)	
	• Electronic Monitoring Devices, if shared (e.g. Glucometer)		• Doorknobs		<ul><li>Ceilings and Air Vents</li><li>Exterior Surfaces of Machines</li></ul>	
7~1	• Imaging Equipment		• Floors		and Equipment	
	(e.g. Ultrasound Transducers, Mammography Paddles,		• Light Switches	-	• I.V. Poles	
	Film Cassettes)		• Mirrors		Privacy Curtains	
	• Ophthalmoscope	T	• Overbed Lamps and Lights		• Radiator	
	<ul> <li>Orthopaedic Equipment (e.g. Crutches)</li> </ul>		Scales (Standing)		• Sterilizers	
	• Otoscope	77	• Tables		• Televisions	
<del>-</del> 0	• Reflex Hammer		• Telephones		• Windows, Window Coverings	
	Scales (Infant)		• Wall-Mounted Items (e.g. Soap and ABHR Dispensers,			
Yi	• Stethoscope		Paper Towel Holders, Glove Box Holders)			
<u></u>	• Toys					
	• Transport Equipment (e.g. Wheelchairs)					



#### **Surface Disinfection**

#### Low-level Disinfectant for Non-Critical Equipment<sup>31</sup>

	Accelerated Hydrogen Pe	roxide (AHP®)	Quant & Low Alcohol		Bleach
Product Description,	Accel Prevention	Accel Intervention	CaviWipes	CaviWipes1	CaviBleach (1:10 bleach dilution)
Item codes	100906721 6 x 7 in. Wipes (160 wipes/cn, 12 can/ca)	100906585 (160 wipes/cn, 12 cn/ca)	MET11-1100 (160 wipes/cn, 12 cn/ca)	MET11-5100 (160 wipes/cn, 12 cn/ca)	MET11-1200 (90 wipes/cn, 12 cn/ca)
	•	-3-	CaviWipesXL	CaviWipes1 XL	
	100906722 10 x 10 in. Wipes (12 ea/ca)	100906583 (12 ea/ca)	MET11-1150 (65 wipes/cn, 12 cn/ca)	MET11-5150 (65 wipes/cn, 12 cn/ca)	
	100906589 (12 ea/ca)		MET11-1155 Individually	CaviCide1	
			wrapped (50 ea/bx, 6 bx/ca)	MET11-5024 (12 ea/ca)	
			CaviCide	100	
			MET11-1024 (12 ea/ca)	MET11-5001 (4 ea/ca)	
			MET11-1000 (4 ea/ca)		
Spectrum of Microorganism	Bactericidal (MRSA, TB, VRE etc), Virucidal (Norovirus), Tuberculocidal, Fungicidal	Bactericidal (MRSA, TB, VRE etc), Virucidal (Norovirus, Influenza), Tuberculocidal, Fungicidal	Bactericidal (MRSA, TB, VRE etc), Virucidal (e.g. Influenza), Tuberculocidal	Bactericidal (MRSA, TB, VRE etc), Virucidal (Norovirus, Influenza), Tuberculocidal, Fungicidal	Bactericidal, Virucidal, Tuberculocidal, Fungicidal, Sporicidal (including C. Diff)
Contact Time	3 minutes	1 minute	3 minutes	1 minutes	3 minutes
Odor	No VOCs, Fragrance free, pleasant odor	No VOCs, Fragrance free	Fragrance Free	Fragrance Free	Low Odor
Material compatibility**	Compatible with most hard, non-porous surfaces	Compatible with most hard, non-porous surfaces	Compatible with most hard, non-porous surfaces.	Compatible with most hard, non-porous surfaces.	Compatible with most medical device equipment
Ease of Use	1 step disinfectant cleaner	1 step disinfectant cleaner	1 step disinfectant cleaner	1 step disinfectant cleaner, multi-purpose cleaner for every day use	1 step disinfectant cleaner

<sup>\*\*</sup>Please see medical equipment manual for compatibility information.



Tables manufactured by Midmark specifies the use of bleach and water solution to disinfect the upholstery.<sup>32</sup>

#### **Surface Disinfection**



#### High-level disinfectant for semi-critical medical devices.

	Item No.	Description	Packaging
hetricide	MET11-1401	MetriCide™, 2.6% Glutaraldehyde, Recommended for Lensed Instruments (e.g. Scopes)	1 each, 4 ea/ca
Particular Services	MET11-2801	MetriCide™ 28, 2.5% Glutaraldehyde, Recommended for Immersible and Heat-Sensitive Equipment	1 each, 4 ea/ca
	MET11-3200	MetriCide Plus 30™, 3.4% Glutaraldehyde, Recommended for Immersible and Heat-Sensitive Equipment	1 each, 4 ea/ca

#### **Toilet Bowls, Sinks and Basins**

	Item No.	Description	Packaging
Confragat Bleach	MET11-1200	CaviWipes™ Bleach, Low Odor, No PPE Required, Bleach, 3 Minute Contact Time for 41 Microorganisms including C. Diff.	90 wipes/cn, 12 cn/ca
Ä	CL01416	Clorox Healthcare® Germicidal Disinfecting Cleaner, Sporicidal – kills C. Diff. in 3 Minutes • 59 Kill Claim including TB, Mold, Mildew, Fungi, Measles, MERS and SARS	6 ea/ca
N. P.	100906724	Accel® Rescue™ Ready to Use Liquid, AHP®, Sporicidal (C. Diff), 10 minutes contact time.	1 each, 12 ea/ca
	100906725	Accel® Rescue™ 8 x 9 in. Wipes, AHP®, Sporicidal (C. Diff), 10 minutes contact time.	12 ea/ca



C. difficile is one of the most difficult bacterium to kill and it's frequent cause of infectious diarrhea. They are usually found in feces.<sup>33</sup>

## only 50% of surfaces in the healthcare setting are properly cleaned

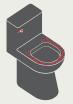
Healthcare items have been shown to **harbour pathogenic microorganisms**. Some **high** touch surfaces include<sup>34</sup>:





**Nursing Station** 

Patient Room







Toilet Co

Computer on Wheels

**ECG Cart** 







Light Switch

Call Bell

Door Handle

**Sterilization** is the necessary level of reprocessing for **critical equipment** and preferred method for **semi-critical equipment**.<sup>35</sup>



Refer to our Sterilization brochure to learn more about products required for sterilization process.



### Single-Patient Use



The single use and discarding of disposable items eliminates the risk of patient-to-patient contamination and the spread of infection among the professional team and patients.

#### **Exam Room Paper**

Designed for reliable infection barrier protection.



Item No.	Description	Packaging
62080-525	Crepe 18 in. x 125 ft., White	12 ea/ca
62080-545	Crepe 21 in. x 125 ft., White	12 ea/ca
62085-520	Smooth 18 in. x 225 ft., White	12 ea/ca
62085-540	Smooth 21 in. x 225 ft., White	12 ea/ca



- **Crepe exam table paper** is textured for added strength, more absorbency, softness and quietness.
- **Smooth exam table paper** is made of high-quality pulp, ensuring its inherent strength and a whiter, brighter appearance.

#### Thermometer and Single-Use Probe Covers

<b>—</b>	Item No.	Description	Packaging
G P	Z303013	Genius 3 Tympanic Thermometer	1 each
	Z303030	Probes Covers for Genius Thermometer	96 ea/bx, 22 bx/ca
	Z504000	Filac Oral Thermometer	1 each
	Z502000	Probe Covers for Filac Oral Thermometer	500 ea/bx, 4 bx/ca
•	EX140001	Exergen™, TAT-2000, Temporal Artery	1 ea/ca
So	EX134203	Exergen™, Thermometer Cap, Disposable	1000/bx

#### FlexiPort® EcoCuff™ Blood Pressure Cuffs



Item No.	Description	Packaging
WA-ECOCUFF-10	Small Adult, 20 - 28 cm	50 ea/bx, 2 bx/ca
WA-ECOCUFF-11	Adult, 27 - 28 cm	50 ea/bx, 2 bx/ca
WA-ECOCUFF-12	Large Adult, 33 - 45 cm	50 ea/bx, 2 bx/ca

#### **Disposable Stethoscope**

-	Item No.	Description	Packaging
	SES01AYL	Plastic, Single-Patient Use, Adult, Yellow	10 ea/bx, 10 bx/ca
	SMS11AYL	Aluminum Chest Piece, Single-Patient Use, Adult, Yellow	10 ea/bx, 10 bx/ca
8	SES02ABU	Chrome Binaural, Adult, Blue	10 ea/bx, 10 bx/ca

#### **Other Single-Use Supplies**

Item No.	Description	Packaging
10322-100	Absorbent 2-Ply Facial Tissues, 6 in. x 8 in.	90 ea/bx, 72 bx/ca
MDS202065	Tongue Depressor	5000/ca
SM2008	Medicine Cup, 1 oz	100 ea/pk 50 pk/ca
19-321	Ear Curette, Ring Tip, Non Sterile	50 ea/bx



Provide patients who are coughing and sneezing with masks or tissue to minimize spread of droplets when coughing and sneezing.<sup>36</sup>





#### **Immunization**



The Advisory Committee on Immunization Practices (ACIP) of the CDC recommends that all health care personnel (HCP) receive and stay current with vaccinations against preventable diseases such as Hepatitis B, Measles, Mumps, Rubella, Meningoccal, Tetanus, Diphtheria, pertussis (tdap) and Meningococcal.<sup>37</sup>



#### Magellan™ Hypodermic Safety **Needles and Syringes**



Easy to use and the robust safety shield ensures clinicians, patients, and downstream workers receive unparalleled protection from a sharps injury.

- One-handed operation minimizes risk of needlestick injuries
- Bevel orientation saves valuable nursing time; if the safety device is up, the needle bevel is up.
- Self-leveling needle cap allows clinician to use the OSHA-recommended technique for passive recapping of the safety needle
- Audible and tactile click confirms safety device has been activated
- Ultra sharp, tri-beveled, anti-coring needle minimizes trauma to muscle tissue for smooth delivery of medications
- · Latex-free

Description	Packaging
22 G x 1-1/2 in.	50 ea/bx, 10 bx/ca
23 G x 5/8 in.	50 ea/bx, 10 bx/ca
23 G x 1 in.	50 ea/bx, 10 bx/ca
25 G x 5/8 in.	50 ea/bx, 10 bx/ca
25 G x 1 in.	50 ea/bx, 10 bx/ca
ge Combinations	
1 mL 23 G x 1 in.	50 ea/bx, 4 bx/ca
1 mL 25 G x 5/8 in.	50 ea/bx, 4 bx/ca
1 mL 25 G x 1 in.	50 ea/bx, 4 bx/ca
3 mL 22 G x 1 in.	50 ea/bx, 8 bx/ca
3 mL 23 G x 1 in.	50 ea/bx, 8 bx/ca
3 mL 25 G x 5/8 in.	50 ea/bx, 10 bx/ca
3 mL 25 G x 1 in.	50 ea/bx, 10 bx/ca
	22 G x 1-1/2 in. 23 G x 5/8 in. 23 G x 5/8 in. 25 G x 5/8 in. 25 G x 1 in. 26 Combinations 1 mL 23 G x 1 in. 1 mL 25 G x 5/8 in. 1 mL 25 G x 1 in. 3 mL 22 G x 1 in. 3 mL 23 G x 1 in.

We offer comprehensive portfolio of needles/syringes from various manufacturers (e.g. BD). For other alternative options, please visit shop.cardinalhealth.ca

#### Monoject™ Hypodermic Safety Needle

A hinged safety device designed to protect healthcare workers from exposure to needle-stick injuries.

- ISO color-coded safety shield Variable safety shield size
- One-handed activation
- Bevel orientation
- Integrated safety sheath
- · Double-lock, hinged arm technology

Item No.	Description	Packaging
Needles		
Z1182558	25 G x 5/8 in.	100 ea/bx, 8 bx/ca
Z1182510	25 G x 1 in.	100 ea/bx, 8 bx/ca
Z1182515	25 G x 1 in.	100 ea/bx, 8 bx/ca
Z1182310	23 G x 1 in.	100 ea/bx, 8 bx/ca
Z1182315	23 G x 1-1/2 in.	100 ea/bx, 8 bx/ca
Z1182210	22 G x 1 in.	100 ea/bx, 8 bx/ca
Z1182215	22 G x 1-1/2 in.	100 ea/bx, 8 bx/ca
Needle and Syrin	ge Combinations	
Z11832210	3 mL 22 G x 1 in.	100 ea/bx, 12 bx/ca
Z11832215	3 mL 22 G x 1-1/2 in.	100 ea/bx, 12 bx/ca
Z11832310	3 mL 23 G x 1 in.	100 ea/bx, 12 bx/ca
Z11832315	3 mL 23 G x 1-1/2 in.	100 ea/bx, 12 bx/ca
Z11832558	3 mL 25 G x 5/8 in.	100 ea/bx, 12 bx/ca
Z11832510	3 mL 25 G x 1 in.	100 ea/bx, 12 bx/ca
Z11812705	1 mL 27 G x 1/2 in.	100 ea/bx, 12 bx/ca
Z11813005	1 mL 30 G x 1/2 in.	100 ea/bx, 12 bx/ca
Z11812558	1 mL 25 G x 5/8 in.	100 ea/bx, 12 bx/ca



Item No.

The pre-attached combinations save valuable nursing time and improve clinical efficiencies.

Description

#### Don't forget...

	Item No.	Description	Packaging
Pol.	Z63001	Webcol™ Alcohol Prep Pad, Medium, 2-Ply	200 ea/bx, 20 bx/ca
ion .	LP103-03	Alcohol Prep Pad, 3 cm x 6.5 cm	200 ea/bx, 20 bx/ca
One Service of the Control of the Co	Z44112	Curity™ Plastic Bandage, 3/4 in. x 3 in.	50 ea/bx, 24 bx/ca
	Z44120	Curity™ Sheer Bandage, Adhesive, 7/8 in. Spot	100 ea/bx, 36 bx/ca

	item No.	Description	1 ackaging
	019-050	Cotton Balls, Medium	2000 ea/bg, 2 bg/ca
	SANSR-L6111W	Under Counter Laboratory Refrigerator, 5.7 cu. ft. Temperature Range: 1°C to 14°C	1 each
23.0	THS1226M01	Lab Fridge Thermometer, Digital Display	1 each
•	PR-L2466W-PA	Panasonic Benchtop Refrigerator, 1.62 cu. ft, Temperature Range: 2°C to 8°C	1 each



Packaging



#### **Waste Management**



Management of contaminated infectious waste shall follow provincial regulations and local bylaws and address issues such as the collection, storage, transport, handling and disposal of contaminated waste, including sharps and biomedical waste.<sup>39</sup>

#### **Sharps Waste**

- Needles, syringes, lancets, blades, clinical glass (e.g., ampoules)
- Used vaccine vials

	Item No.	Description	Packaging
100	Z8506Y	In-Room™ Sharps Container with SharpsStar™, 5 L (5 qt.), Yellow	20 ea/ca
<u>B</u>	Z8967Y	Multi-Purpose Sharps Container, 7.6 L (2 gal.), Yellow	20 ea/ca
	Z8970Y	Sharps Container, 7.6 L (2 gal.), Yellow	20 ea/ca

#### ChemoSafety™ Sharps Containers for Cytotoxic Waste



Z8982CRH	ChemoSafety™ Sharps Container,	20 ea/ca
Z0902CNF1	7.6 L (2 gal.), Recycled Red	20 Ea/Ca



Z8989CRH	ChemoSafety™ Sharps Container, 68 L (18 gal.), Recycled Red	5 ea/ca
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Chemotherapy sharps containers are for the disposal of trace chemotherapy waste.<sup>40</sup>

#### Phlebotomy



Z8906	Phlebotomy Sharps Container, 1 L (1 qt.), Yellow	100 ea/ca
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Sharps containers must be sealed and replaced when the contents reach the fill line marked on the container or when three-quarters full.<sup>41</sup>

#### Anatomic Waste<sup>42</sup>

• Tissues, body parts

Item No.	Description	Packaging
CAH882	19 x 24 in., Orange Biohazard Waste Bag, Autoclavable	200 ea/ca
CAHF414	40 x 46 in. Red Biohazard Waste Bag, 1.2 mil Thickness	250 ea/ca
WSPF3240100	24 x 24 in., Red Biohazard Waste Bag	500 ea/bx
	CAH882	CAHE414  19 x 24 in., Orange Biohazard Waste Bag, Autoclavable  40 x 46 in. Red Biohazard Waste Bag,

#### Medical Waste<sup>42</sup>

- Blood, blood products, bloody body fluids
- Drainage collection units (if possible, pour liquid into toilet)
- · Empty vaccine vials
- Diagnostic specimens (liquid may be poured into toilet, e.g., urine containers)

	Item No.	Description	Packaging
	6291-05	26 x 36 in., Yellow Garbage Bag, Labelled Biohazardous	125 ea/ca
Service of the servic	5062-F	20 × 22 in., Yellow Autoclave Bag	250 ea/ca

#### **Disposal of General Waste**





• Waste from washrooms, kitchens and public areas



Item No.	Description	Packaging
LDB2022U	20 x 22 in., Utility Strength, Black	500 ea/ca
LDB2224U	22 x 24 in., Utility Strength, Black	500 ea/ca
LDB2424U	24 x 24 in., Utility Strength, Black	500 ea/ca
LDC2022U	20 x 22 in., Utility Strength, Clear	500 ea/ca
LDC2224U	22 x 24 in., Utility Strength, Clear	500 ea/ca
LDC2424U	24 x 24 in., Utility Strength, Clear	500 ea/ca



In order to allow for **proper treatment and disposal of waste** and to optimize waste diversion, waste shall be segregated at the point of generation into the following **categories** and **should not be mixed**:<sup>43</sup>

- Biomedical
- Chemical
- General

- Pharmaceutical
- Radioactive
- Recyclable

#### Flu is unpredictable, your inventory shouldn't be.

By planning early, you will be better prepared to handle the unpredictability that flu season brings.

During flu season, staple products such as personal protective equipment (PPE) and sharp containers tend to increase in usage. Work with your sales representative and try our Flu Planning Calculator to ensure you have adequate supply through the flu season.

#### Estimate your Demand

**Estimate your** How much do you usually order and how will those amounts change during flu season?

**Tip:** Use the past 2 years usage to forecast for the 2019-2020 flu season. According to the CDC, flu season is historically October through March, with flu activity peaking December through February.

Source: www.cdc.gov/flu/about/season/flu-season.html

\*The percentage increase is what Cardinal Health Canada typically see in the past 2 years usage during flu season. You can either use this as a benchmark or use your usage data in the past 2 years.

Calculator	Input your typical monthly usage	Estimate the demand increase for flu season*	Historical Data	Your estimated monthly flu season demand
Products	Step 1:	Step 2:		Results
Masks	boxes	35%	Historically, we see a <b>35% increase</b> in demand for masks during flu season relative to non-flu months.	boxes
Isolation Gowns	cases	53%	Historically, we see a <b>53% increase</b> in demand for isolation gowns during flu season relative to non-flu months.	cases
Exam Gloves	boxes	9%	Exam gloves typically experience a <b>9% increase</b> . However, they are still an important part of infection control.	boxes
Safety Needles and Syringes	boxes	17%	Historically, we see demand double, a <b>17% increase</b> , for safety needles during flu season relative to non-flu months.	boxes
Sharps Containers	each	18%	Historically, we see a <b>18% increase</b> for sharps containers from September through November.	each
Disposable Stethoscopes	boxes	23%	Historically, we see a <b>23% increase</b> in demand for stethoscopes from October through March, with demand peaking in January.	boxes
Facial Tissues	boxes	24%	Historically, we see a <b>24% increase</b> in demand for tissues from November through February.	boxes
Hand Sanitizers	cases	8%	Historically, we see a <b>8% increase</b> in demand for hand sanitizers.	cases
Surface Disinfectants	each	19%	Historically, we see a <b>19% increase</b> in demand for disinfectants.	each
Thermometer Probe Covers	boxes	33%	Historically, we see a <b>33% increase</b> in demand for thermometer probe covers.	boxes

#### References

- 1. www.who.int/csr/don/archive/country/can/en/
- 2. www.ipac-canada.org/pandemic-h1n1-resources.php
- 3. www.thinglink.com/scene/621397951096291329?buttonSource=viewLimits
- 4. www.ncbi.nlm.nih.gov/pmc/articles/PMC5331033/
- 5. www.thinalink.com/scene/621397951096291329?buttonSource=viewl.imit
- 6. www.cbc.ca/news/health/whooping-cough-pertussis-1.331743
- www.canada.ca/en/public-health/services/reports-publications/canada-communicable-disease-report-ccdr/ monthly-issue/2018-44/issue-12-december-6-2018/article-1-controlling-mumps-outbreak-young-adult-population.htm
- 8. www.globalnews.ca/news/5136201/salmonella-outbreak-canada-provinces/
- 9. ojin.nursingworld.org/MainMenuCategories/ANAMarketplace/ANAPeriodicals/OJIN/TableofContents/Vol-22-2017/
- 10. www.phac-aspc.gc.ca/cphorsphc-respcacsp/2013/assets/pdf/2013-eng.pdf, pg. 17
- www.healthypeople.gov/2020/topics-objectives/topic/healthcare-associated-infections
- 12. www.canada.ca/en/public-health/services/diseases/flu-influenza/health-professionals.htm
- 13. www.globalnews.ca/news/5435232/australia-flu-season-canada/
- 14. www.cbc.ca/news/canada/toronto/ontario-flu-season-1.5212510
- 15. www.ncbi.nlm.nih.gov/pmc/articles/PMC4196817/
- 16. www.publichealthontario.ca/-/media/documents/bp-ipac-hc-settings.pdf?la=en, pg. 12
- 17. www.who.int/apsc/tools/faas/system\_change/en/
- 18. www.publichealthontario.ca/-/media/documents/bp-clinical-office-practice.pdf?la=er
- 19. www.who.int/gpsc/tools/fags/system\_change/en/
- 20. www.alberta.ca/infection-prevention-and-control.aspx
- 21. www.who.int/infection-prevention/campaigns/clean-hands/5may\_advocacy-toolkit.pdf?ua=
- 22, www.cardinalhealth.com/en/product-solutions/medical/gloves/surgical-gloves/synthetic-surgical-gloves/protexis-pi-surgical-gloves html
- 23. www.publichealthontario.ca/-/media/documents/bp-clinical-office-practice.pdf?la=en, pg. 21
- 24. www.publichealthontario.ca/-/media/documents/bp-clinical-office-practice.pdf?la=en, pg. 23
- 25. www.publichealthontario.ca/-/media/documents/bp-clinical-office-practice.pdf?la=en, pg. 14
- 26. www.publichealthontario.ca/-/media/documents/bp-clinical-office-practice.pdf?la=en, pg. 2
- 27. ojin.nursingworld.org/MainMenuCategories/ANAMarketplace/ANAPeriodicals/OJIN/TableofContents/Vol-22-2017/
- 28. www.publichealthontario.ca/-/media/documents/bp-clinical-office-practice.pdf?la=en, pg. 41-42
- 29. www.publichealthontario.ca/-/media/documents/bp-cleaning-disinfection-sterilization-hcs.pdf?la=en, pg. 25
- 30. www.publichealthontario.ca/-/media/documents/bp-clinical-office-practice.pdf?la=en, pg. 43
- 31. 1source.diversey.com/see3/PSS90511\_AccellNTERVentionWipes-LTR-env6-LR.pdf
- 32 www.midmark.com/docs/librariesprovider2/pdfs/004-1083-00.pdf?sfvrsn=bf39d305\_8
- 33. www.health.harvard.edu/staying-healthy/clostridium-difficile-an-intestinal-infection-on-the-rise
- 34. www.publichealthontario.ca/-/media/documents/bp-environmental-cleaning.pdf, pg. 53-54
- 35. www.publichealthontario.ca/-/media/documents/bp-cleaning-disinfection-sterilization-hcs.pdf?la=en, pg. 25
- 36. www.publichealthontario.ca/-/media/documents/bp-clinical-office-practice.pdf?la=en. pg. 14 and pg. 27
- 37. www.healio.com/infectious-disease/vaccine-preventable-diseases/news/print/infectious-disease-news/ %7Bc7f8d2c9-0200-4b0e-b620-e07b08806d68%7D/immunizing-health-care-workers-recommendations-and-requirement-
- 38. www.publichealthontario.ca/en/eRepository/PIDAC-IPC\_Annex\_B\_Prevention\_Transmission\_ARI\_2013.pdf
- 39. www.publichealthontario.ca/-/media/documents/bp-clinical-office-practice.pdf?la=en, pg. 45
- 40. www.publichealthontario.ca/-/media/documents/bp-environmental-cleaning.pdf?la=en, pg. 74
- 42. www.publichealthontario.ca/-/media/documents/bp-clinical-office-practice.pdf?la=en, pg. 45
- 43 www.publichealthontario.ca/-/media/documents/bp-environmental-cleaning.pdf?la=en\_pg\_72

