### Let's Talk Informatics

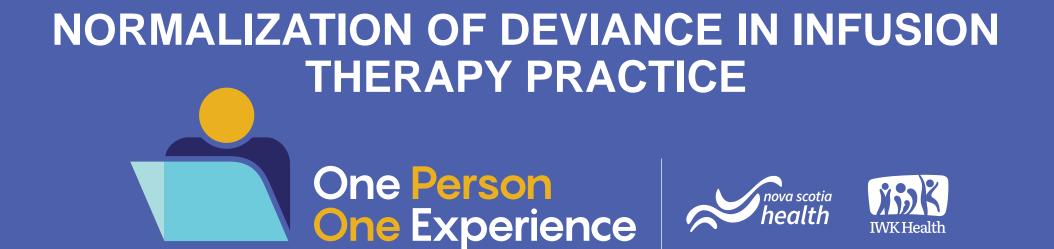
## Normalization Of Deviance In Infusion Therapy Practice

Nancy Connor MN, RN, ENC Susan Johnson PhD, BSc, RN January 27, 2022

One Person One Experience







Nancy Connor RN MN ENC Susan Johnson RN PhD



### Acknowledgement

We acknowledge we are gathered today in Mi'kma'ki (\*Mig-*maw*-gee), the traditional ancestral unceded territory of the Mi'kmaq (\*Mig-**maw**) people.



# **Informatics** utilizes health information and health care technology to enable patients to receive best treatment and best outcome possible.

## Let's Talk Informatics Objectives

This series is designed to enable participants to:

- Identify knowledge and skills healthcare providers need in order to use information now, and in the future.
- Prepare healthcare providers through an introduction to concepts and experiences in Informatics.
- Acquire knowledge to remain current by becoming familiar with new trends, terminology, studies, data and news.
- Collaborate with a network of colleagues to establishing connections with leaders who can provide advice on business issues, bestpractice and knowledge sharing.

## **Session Specific Objectives**

At the conclusion of this activity, you will be able to:

- Describe the concept of normalized deviance and the antecedents of its development in infusion therapy practices
- Identify the consequences of deviant infusion therapy practices
- Recognize strategies to strengthen adherence to infusion therapy guidelines and clinical standards



## **Smart Pump Project**

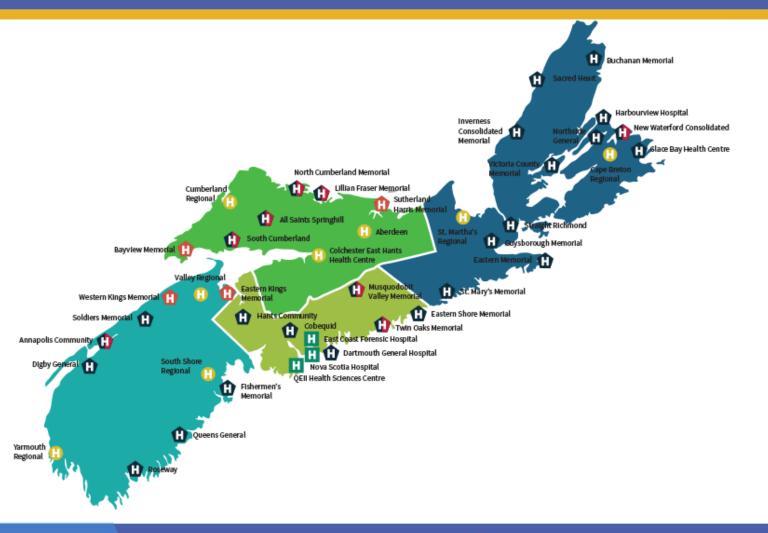
- A patient safety initiative to reduce drug dosing errors
- Replace the aging fleet of infusion pumps
- ~6,200 volumetric and syringe pumps were implemented in 284 care areas across 44 facilities province-wide
- ~ 4,837 staff were formally trained





## Background

- Nova Scotia Health is one of 2 Health Authorities in Nova Scotia.
- It provides healthcare to 1,000,000 Nova Scotians, and is a mix of urban and rural healthcare facilities, providing various levels of care.





## **Our Anticipated Challenge**

- The current pump had been in use for over 10yrs.
- Policies guiding infusion practice were conflicting and outdated.
- Isolated pockets of best practice while many others were outdated.
- Adjust the training to meet the needs of a wide audience.

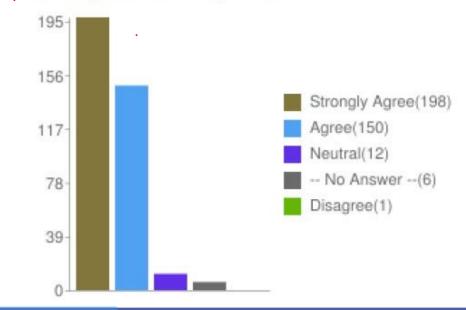




## **Training Evaluations**

#### Please rate the following ... - Overall, the training was effective

Average value: Agree Results based on 367 responses to this question.





## **Our Actual Challenge**

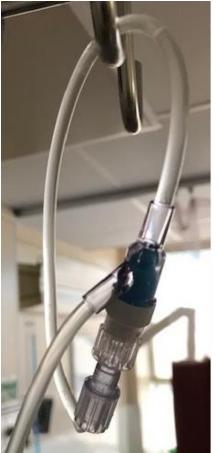
- Failure to follow standard infusion practices
- Resistance to using the drug library
- Sustaining existing practice
- Unwillingness to using the pumps at all!





## **Our Actual Challenge**









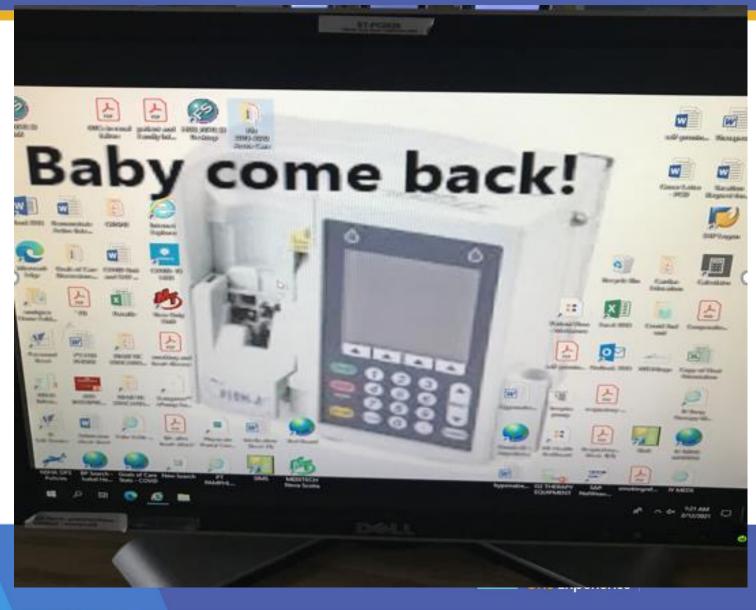
Suboptimal infusion practices jeopardizing patient safety



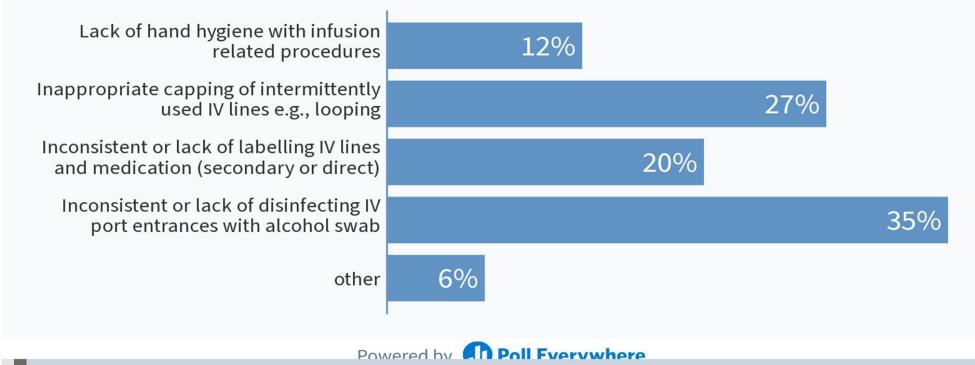


## How did we get here?

Staff created work arounds to preserve 'how they have always done it'



## What are the most common deviations in infusion therapy in your practice area?

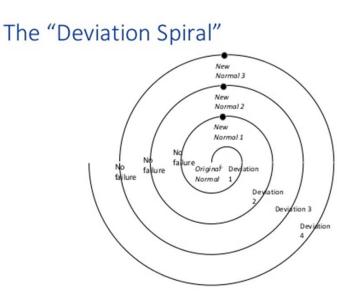


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## **Normalization of Deviance**

## **Normalization of Deviance**



• "The gradual process through which unacceptable practice or standards become acceptable. As the deviant behavior is repeated without catastrophic results, it becomes the social norm for the organization."

Vaughan, 1996

https://www.dbei.org/news/applying-lessons-from-columbia-and-challenger

## **Deviation or Deviance?**

**Deviation** is the isolated or single incident of drifting from an established standard.

**Deviance** involves repeated (chronic) systemic deviations that is a

broader departure from usual behavior or accepted standards.

- Destructive deviance
- Constructive deviance

### **Normalization of Deviance Characteristics**



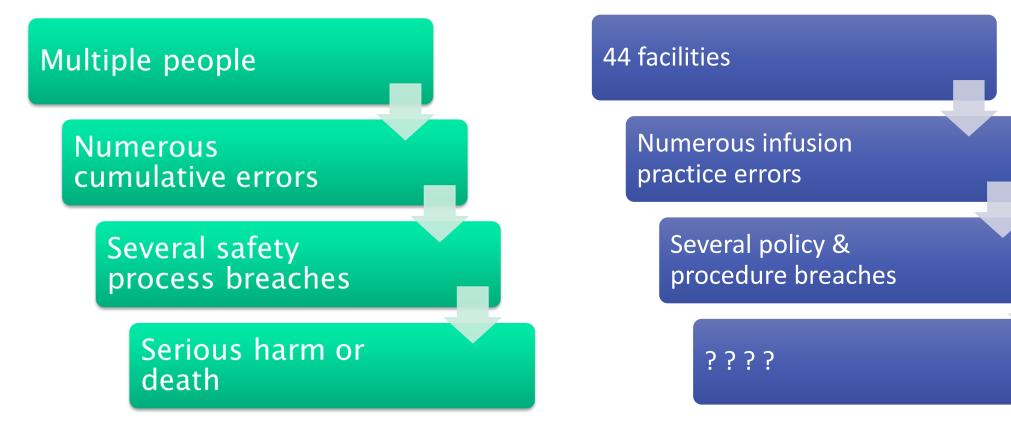
CCPS, 2018

### **Normalization of Deviance Origins**



- NASA Challenger explosion
- NASA Columbia explosion
- Chernobyl nuclear disaster
- Three Mile Island nuclear disaster
- Bhopal India toxic gas release

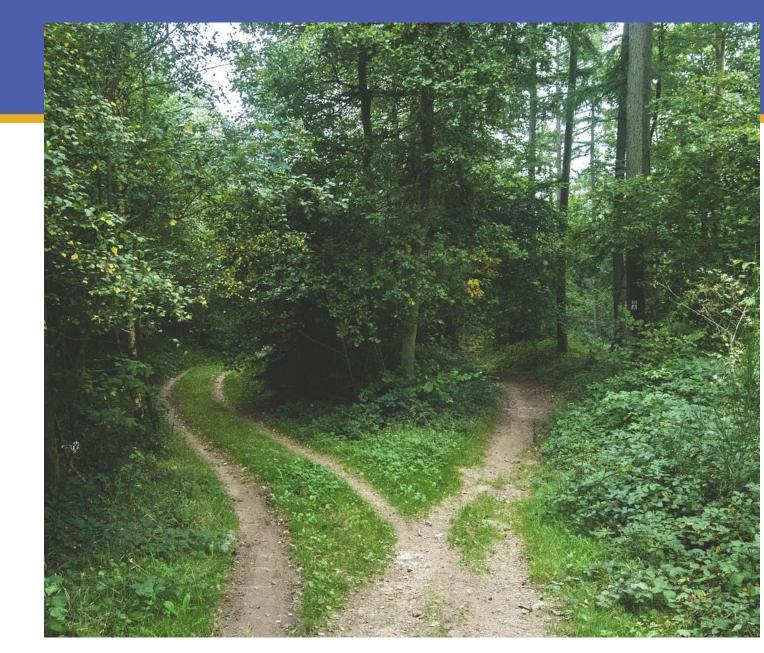
### **Common Themes in Major Incidents**



CCPS, 2018

# Why do we Deviate?

- Many contributing system and human factors.
- Healthcare providers DO deviate if they feel it is in the best interest of the patient e.g., alleviate pain.
- Healthcare providers **DO NOT** deviate with malice or unlawful intent.



Banja, 2010

## **System Factors**

- Common system antecedents contributing to normalized deviance:
  - Initiative overload
  - New technology
  - Organizational pathology e.g., vulnerable systems syndrome
  - Production pressures

## Findings

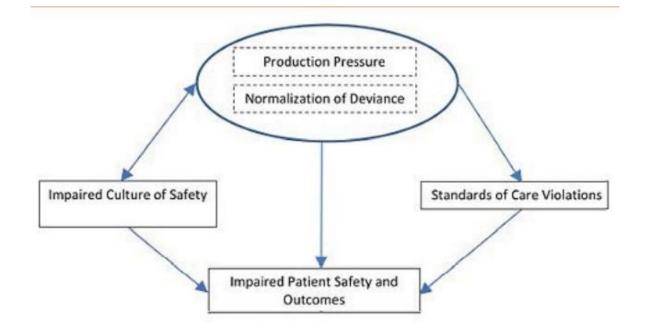
#### Exploring Normalization of Deviance among Perioperative Registered Nurses in the Operating Room

M. Imelda Wright<sup>100</sup>, Barbara Polivka<sup>2</sup>, and Paul Clark<sup>1</sup>

- Productivity pressures
- Generalized complacency
- Complacency related to length of experience
- Social pressures
- Negative acculturation

#### Exploring Production Pressure and Normalization of Deviance and Their Relationship to Poor Patient Outcomes

Marjorie Geisz Everson, PhD, CRNA, FNAP Bryan A. Wilbanks, PhD, DNP, CRNA Rebecca R. Boust, MSNA, CRNA



## What are some human factors that contribute to infusion

#### therapy errors?



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## **Normalized Deviance Predispositions**

- Unknowing the hazard of the deviant act
- Unbelieving the probability of occurrence
- Underestimating the severity of the outcome

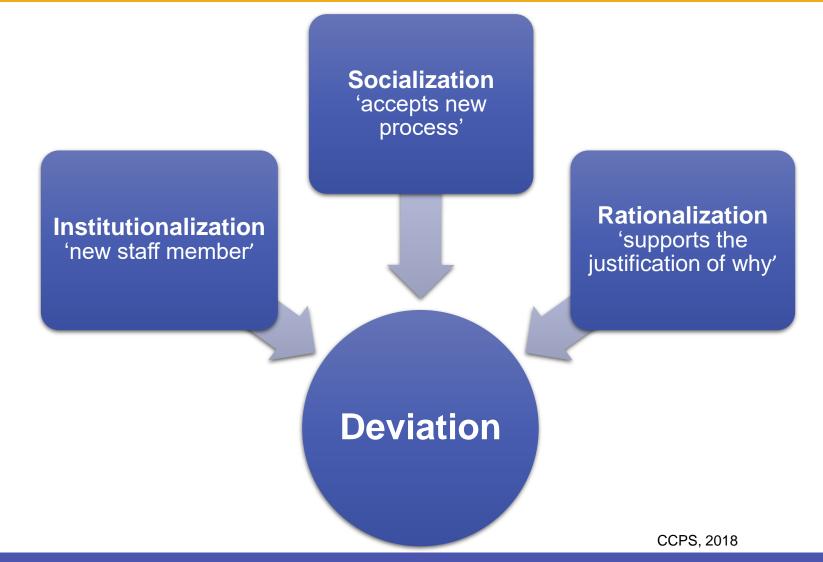


CCPS, 2018

## **Human Factors**

Three common factors:

- Institutionalization
- Socialization
- Rationalization



## Have you ever heard...

## 'The rules are stupid and inefficient!'

- Rules are viewed as not being in sync with reality.
- Hinder the ability to complete work in a timely manner.
- Likely to result in workarounds and shortcuts
  - Preparing infusion lines in the outpatient clinic 24 hours prior to administration



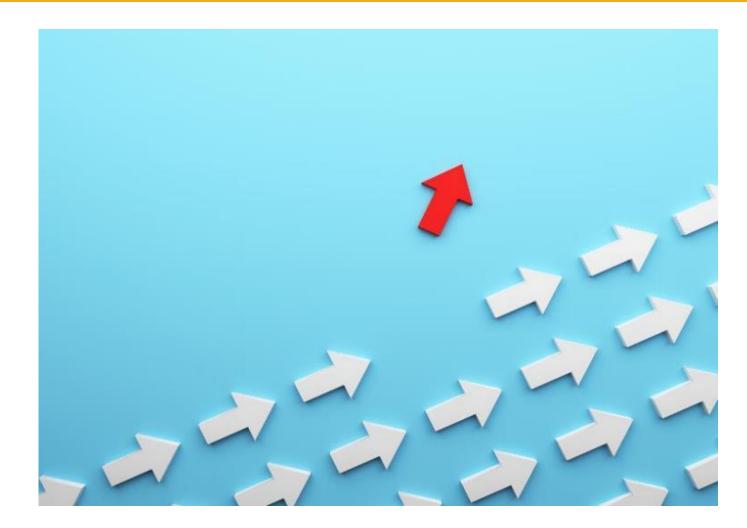
## Have you ever heard...

## 'I am breaking the rule for the good of my patient'

Following the rule diminishes quality of care provided.

Deviating is okay if the 'rule' is blocking the bigger goal:

- Time saved to do more work
- Minimizing pain for patient
  - IV insertion and blood draw simultaneously



## Have you ever heard...

# 'You can trust me; I know what I am doing'

Staff have feelings of high moral values and superiority.

Deviant behavior is okay because they would never do any harm:

 Leaving bedside with unlabelled blood tubes



## Have you ever heard...

# 'I have not heard of that policy before'

Lack of awareness of 'new rule' because they were taught the deviated 'rule'.

Confusion over what process to follow when numerous variations exist.

Banja, 2010, CCPS, 2018



## Have you ever heard...

# 'I can't say anything; I can't speak to that person'

Staff may not have the skill or comfort level to challenge witnessed deviant practices.

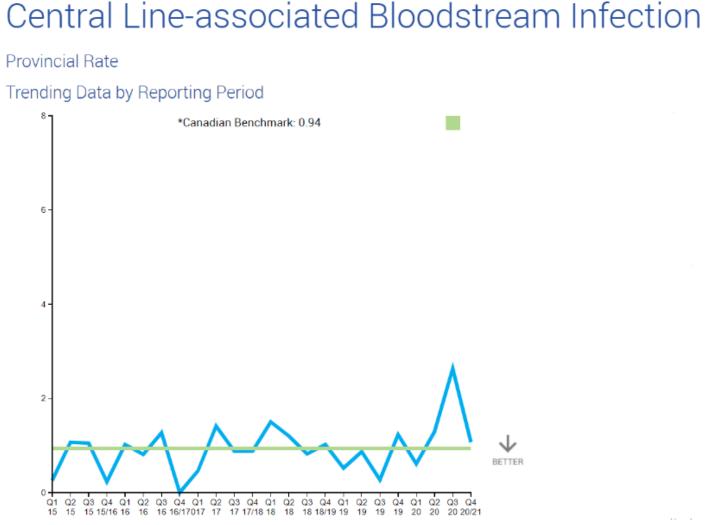
- Fear of retaliation
- 'Not my job' mentality
- Compromise work relationships



## **Risks of Normalization of Deviance**

Complications are expensive and life threatening!

Breaches in insertion and maintenance of central lines, increase the risk of CLABSI.



Meyer, 2014; Nickel, 2019

https://novascotia.ca/dhw/hsq/public-reporting/clabsi-data-trending.asp

## Findings

#### Examination of nursing drug administration practices via central venous catheter: An observational study

Gülşah Gürol Arslan<sup>1</sup>, Dilek Özden<sup>1</sup>, Nurten Alan<sup>1</sup>, İlkin Yilmaz<sup>2</sup>, Cahide Ayik<sup>2</sup>, Gizem Göktuna<sup>2</sup>

- 100% compliance rate with med prep and administration.
- Most common tasks performed incorrectly:
  - Hand hygiene (82.2-87.8%)
  - Disinfection (55.6-81.1%)
  - Flushing (75.6-84.4%)
- Recommendations implementation of evidence-based care of CVC lines.

## Findings

Procedural and documentation variations in intravenous infusion administration: a mixed methods study of policy and practice across 16 hospital trusts in England

Dominic Furniss<sup>1\*</sup>, Imogen Lyons<sup>1</sup>, Bryony Dean Franklin<sup>2,3</sup>, Astrid Mayer<sup>4</sup>, Gillian Chumbley<sup>5</sup>, Li Wei<sup>3</sup>, Anna L. Cox<sup>1</sup>, Jolien Vos<sup>1</sup>, Galal Galal-Edeen<sup>1,6</sup> and Ann Blandford<sup>1</sup>

- Deviations in procedure and/or documentation of IV infusions occurred 47.9%.
- Gap in infusion practices (work as done) and policy (work as imagined) across the country due to:
  - General lack of awareness
  - Vague policy & procedure
  - Policy not in alignment with clinical standards
- Recommendations standardizing policies with staff awareness and regular auditing of practice.

## **Identifying Normalized Deviation**

- Look for trigger words in organizational documents e.g., policy & procedures, standard operating procedures, internal memos or emails:
  - SHOULD
  - MAY
  - SHALL
  - MUST

Venipuncture must be performed

- Listen and watch for trigger phrases in the workplace:
  - That is good enough
  - I never do that step
  - We made it work

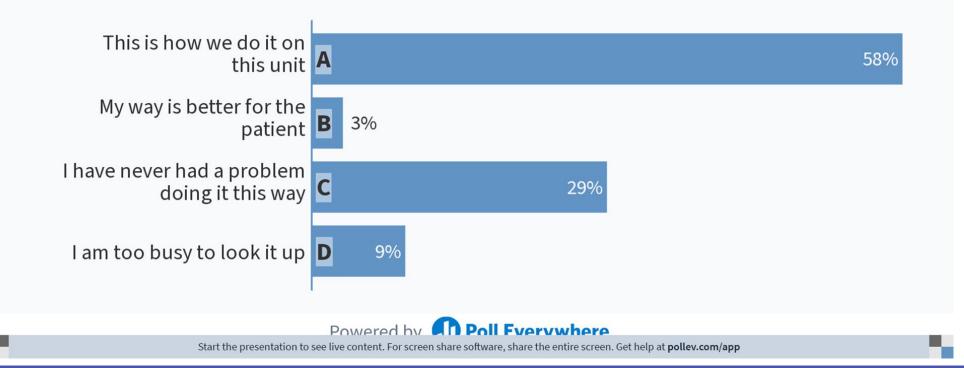
#### 'How come nobody asked us if we wanted these new pumps?'

- 'That is not how we do it here'
  - 'I am sure the policy says it's okay to do it this way'
- 'Nobody ever told me to do it this way'
- 'I am too busy to do it the right way'

• 'Everyone else is doing it this way'

• 'My way is faster'

# Which statement have you heard most frequently in your ' practice when you ask, "Why are you(we) doing it this way?"



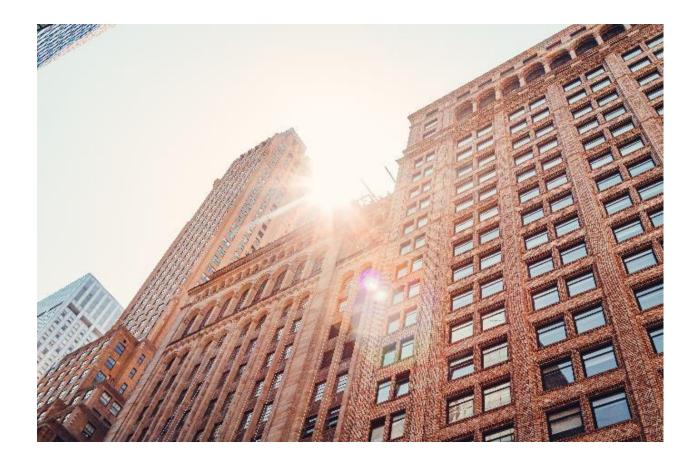


# **Solutions**

What can we do?

# Organization

- (Re)Commit to developing and fostering a Just culture.
- Ensure policies and procedures are current and reflective of national standards.
- Be aware of the work climate.
- Where does infusion therapy stand in organizational priorities?



### Management

- Keep your staff engaged.
- Ensure your staff are aware of current policy & procedures.
- Correct deviant behavior early.
- Share data for transparency and feedback e.g., CQI, incident reports.
- Offer training in having difficult conversations.
- Look for your positive 'deviants'.

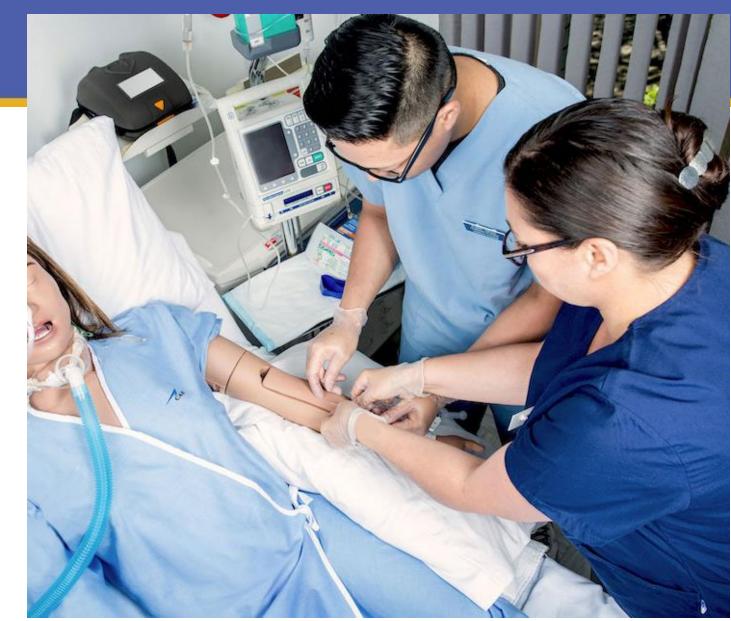
## **Educators**

Keep your staff engaged:

- Be creative
- Use multiple teaching methods
- Incorporate simulation into orientation and annual education days

Reinforce best practice and policies guiding infusion procedures.

Emphasize the danger of noncompliance.



https://www.healthysimulation.com/nursing-mannequin/

## Individuals

- Reflect on your own infusion practices:
  - Do I have any at risk practices?
  - Am I in alignment with the national standards and guidelines?
- Keep current on the latest evidence on infusion therapy.
- Model best practice.
- Identify deviated practices and constructively correct.



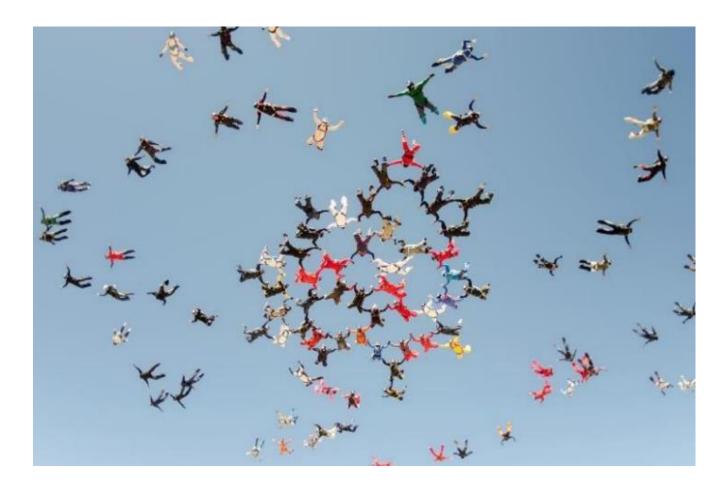
#### **Starting the Conversation...**

- I notice you did not allow the skin prep to dry before accessing the porta-cath. I have not seen it done this way before. Can you walk me through why you do it this way?"
- "Help me understand....."
- "My understanding of the policy/procedure/practice is this. How do you interpret it?"
- I notice we do this procedure differently. I do X this way because... How did you come to do it your way?"

# **Final Thoughts**

Stopping the cycle of normalized deviant practices in infusion therapy requires:

- Identification
- Team solutions
- Diligent monitoring
- Positivity



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## **Questions?**



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- **Digital Health Canada** participants can claim 1CE hour for each presentation attended.
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- Canadian College of Health Information Management approves 1 CPE credit per hour for this series for professional members of Canada's Health Information Management Association (CHIMA).





# Thank You

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