



Navigating through VRE Outbreaks... *Lessons Learned*



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Objectives

1. History of VRE cases and outbreaks at Woodstock Hospital

2. Review standard VRE outbreak measures

3. Discuss outbreak prevention initiatives and changes

4. Key lessons learned

Preventing infections can be exhausting...

Battling an outbreak is much worse



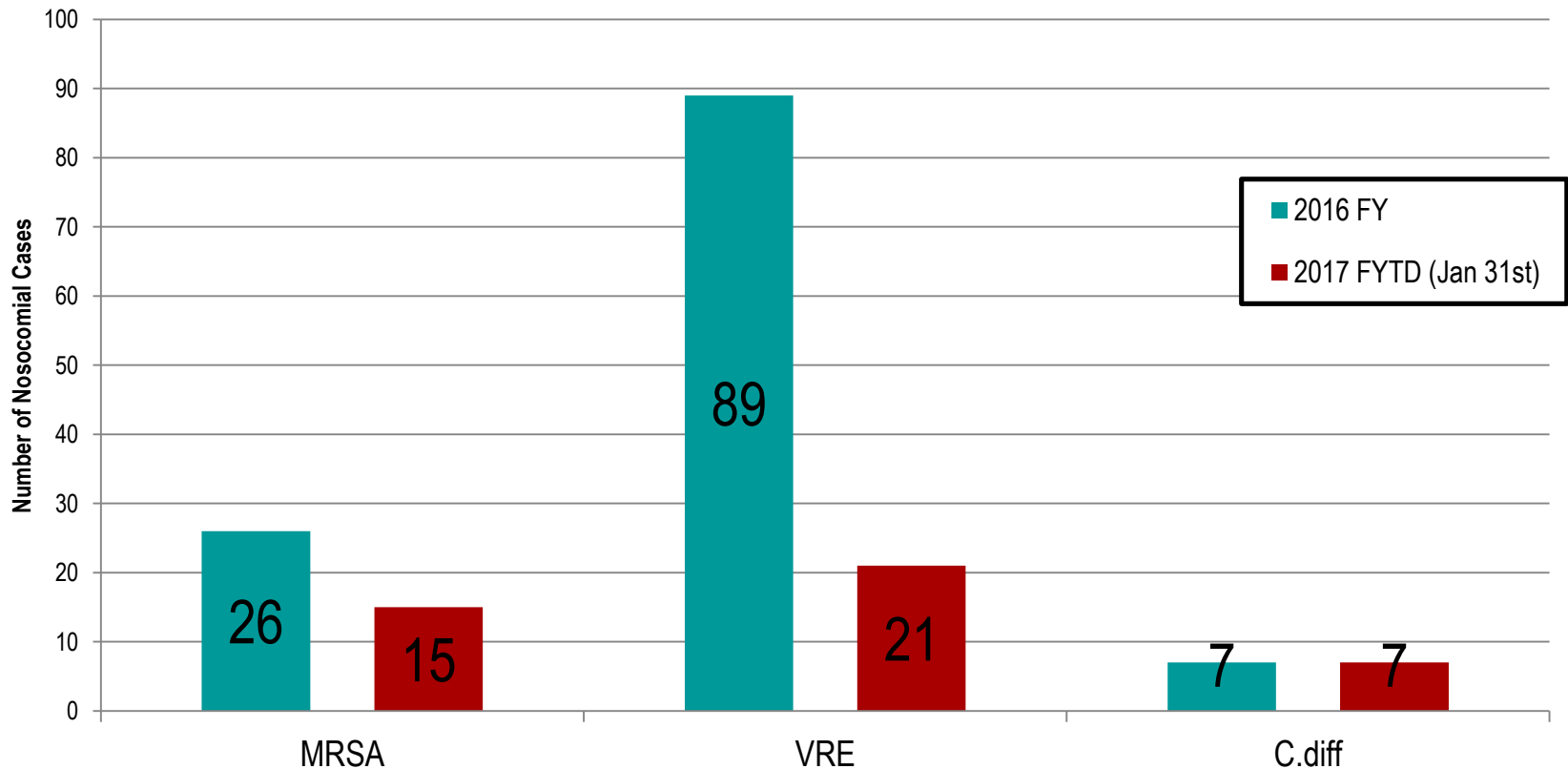
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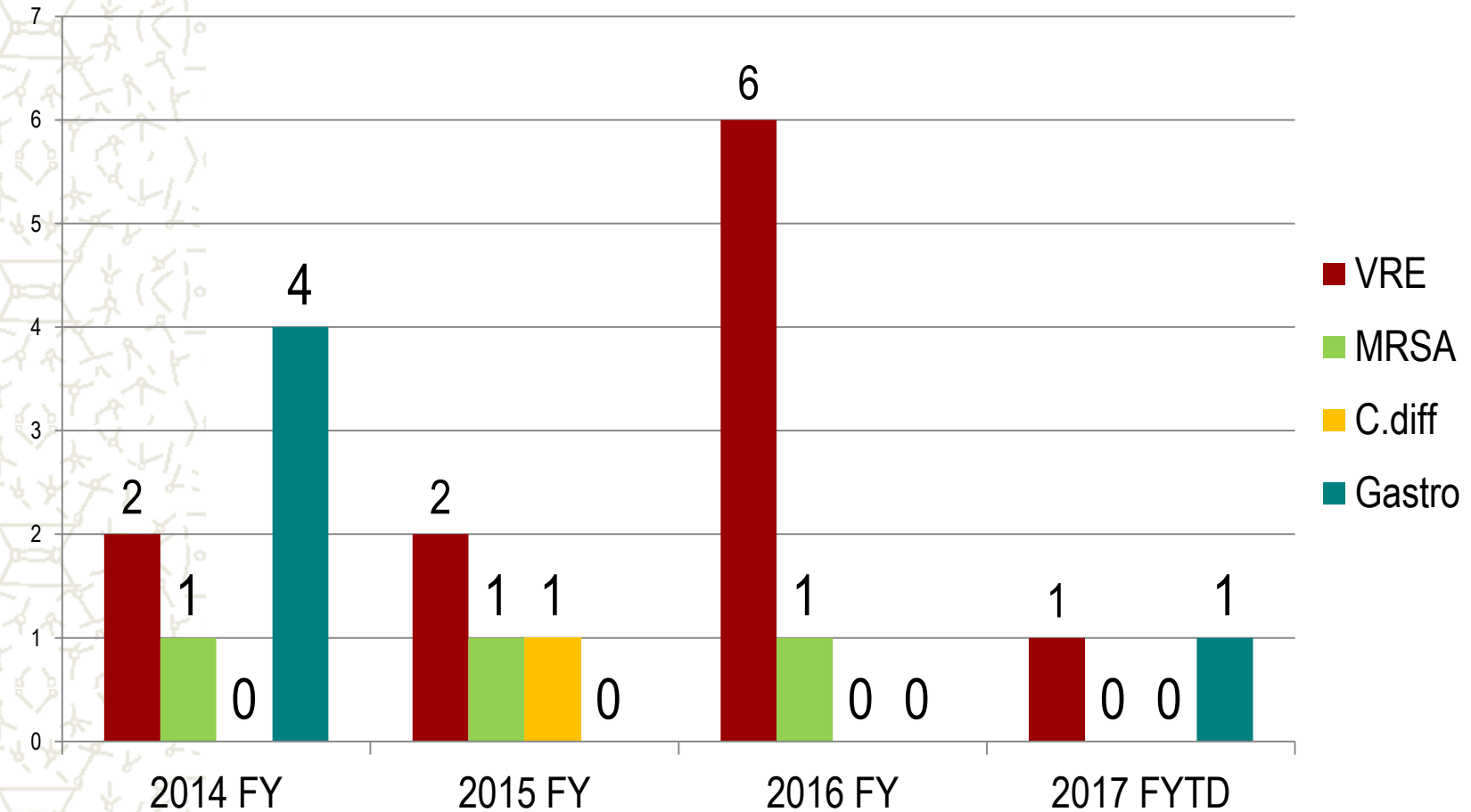
History: Nosocomial Cases

Nosocomial Cases at Woodstock Hospital
2016-2017 vs 2017-2018





Types of Outbreaks per Year





Standard Outbreak Measures



More on these
later...

- ✓ Identify cases and contacts
- ✓ Establish Communication and assemble MDT
- ✓ Increase surveillance
- ✓ Increase audits
- ✓ Enhanced Environmental Cleaning
- ✓ Enhanced patient care procedures
- ✓ Limit Bed Move

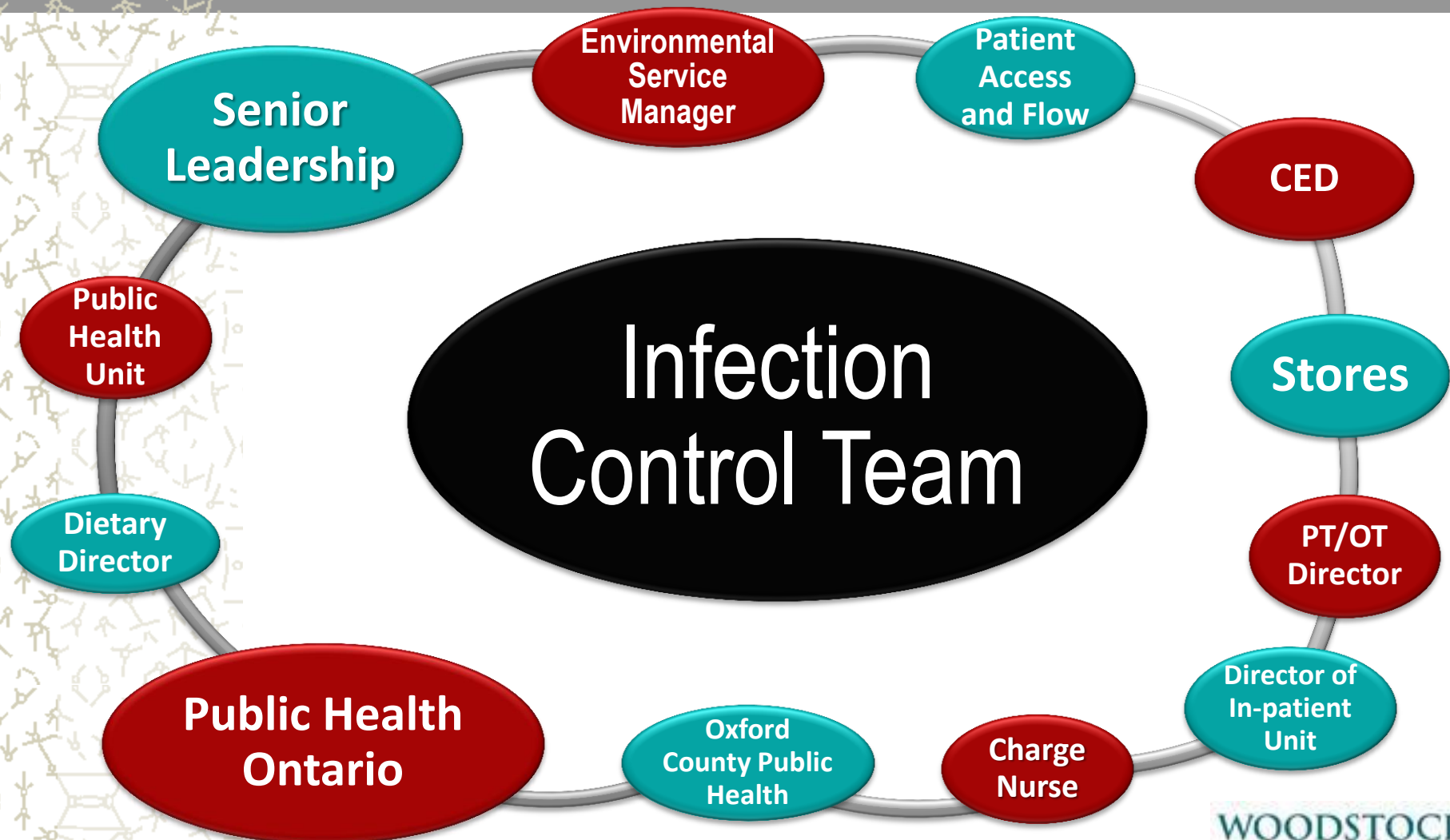


**The single biggest problem in
communication is the illusion that
it has taken place.**

George Bernard Shaw



Key Stakeholders include the following...





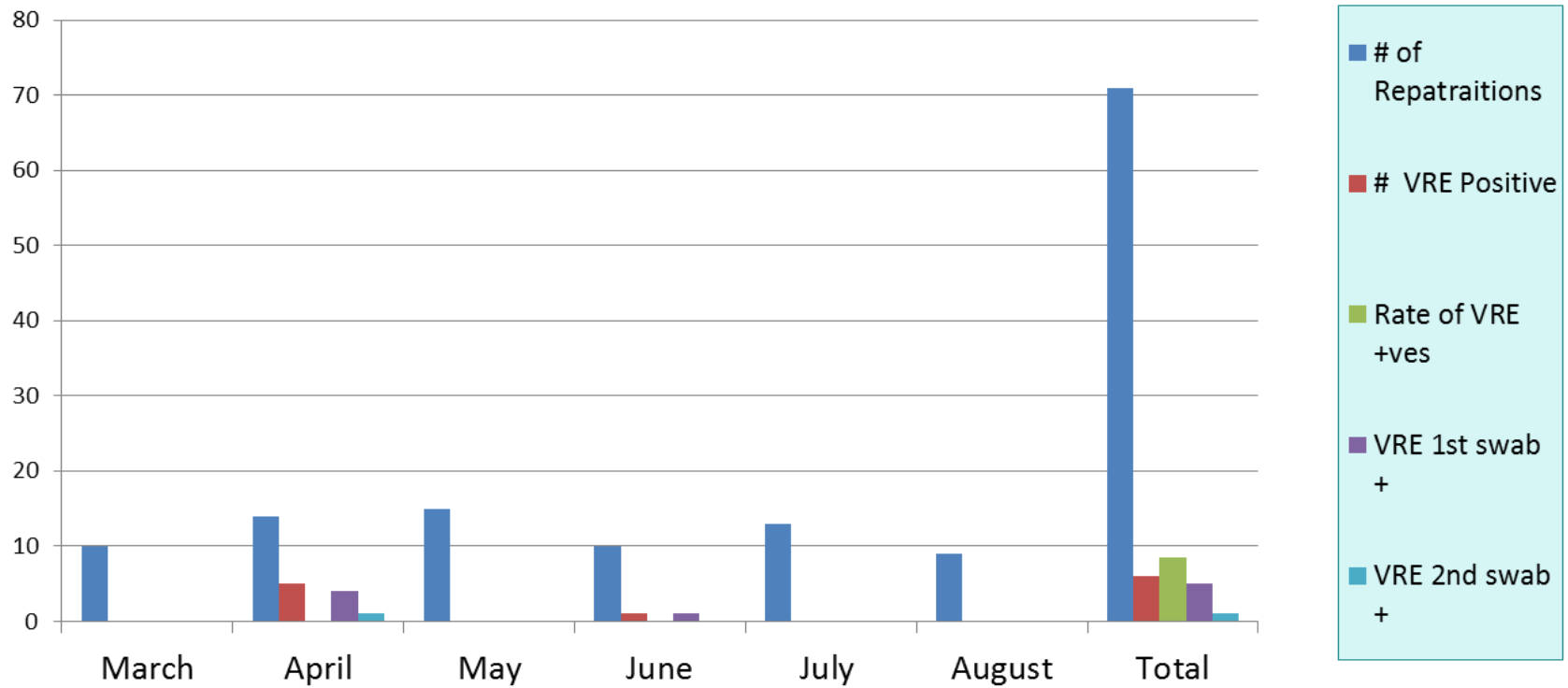
New Outbreak Initiatives: Public Health Support

May 2016 –PHO Suggestions:

1. Terminal clean - all medical units
2. Limit patient supplies in room
3. Clean isolation carts
4. Commode cleaning process
5. Mattress assessment process
6. Curtain changing schedule
7. Dedicated VRE cleaning cart
- 8. Review of current cleaning products**
9. Education of standard wiping protocol
10. Extend repatriation isolations (48 hr → 7 days)



Repatriation Results... 2016-2017





COMMODES DAILY AND TERMINAL CLEANING PROCESS

- Commode is cleaned with hospital grade disinfectant
- Ensure to clean both the inside and outside of the commode lid and the underside of the seat and legs

- Commode is stored in the patient room after the daily and terminal clean is completed



Commode Cleaning Process

TERMINALLY CLEAN COMMODE WITH CART WASHER:

1. Enteric & VRE outbreaks
2. Clostridium difficile (c. diff)
3. If the commode remains visibly soiled after first cleaning

- Commode is wiped down with Sporicidal disinfectant (Clorox™)
- Commode is covered with a yellow gown
- Commode is placed into dirty utility room
- Housekeeping call 8000 and leave a message for portering to pick up Commode chair
 - ⇒ Indicate unit
 - ⇒ Soiled utility room number
 - ⇒ Instructions to send to CED dirty side for commode washing

- Portering identifies dirty commode by yellow gown
- Takes commode to dirty side of CED through door L738 and places in designated "dirty" area
- Washes hands upon leaving
- Enter the commode in sign in book in CED

- CED will put commode through cart washer
- Once commode is dry CED will place outside of CED on "clean" side
- CED will contact portering at 8000 to return cart to unit

Please Note:

- After 4pm, commodes that require cart washing remain in Soiled Utility Room until next morning. Housekeeping will then notify Portering (ext 8000) to take the commode chairs down to CED (as per the above process).
- On weekends and holidays, commodes that require cart washing remain in the Soiled Utility Room until Monday morning. On Monday morning, CED will call portering to take the commode down to CED.



Testing on Microfibre Cloths



- Vendor for the Every day disinfectant (ED) contacted to determine if PPM level of disinfectant was being reduced by Quat-binding
- The test showed Quat-binding was occurring and suggestions were made to mitigate this challenge



Hydrogen Peroxide-Based Disinfectant



- **Oxivir Plus** for daily disinfecting effective on Non-Enveloped viruses like Norwalk, MRSA and VRE
- Not as harsh on surfaces
- Contact time is 5 minutes versus 10 minutes
- This product is Eco-certified



Environmental Service Changes

Cleaning Refresher

Product Change

Double clean VRE rooms. once in the morning and again in the afternoon

Mattress Check Protocols

Commode Cleaning Process

Terminal Cleaning Process

Curtain Changing Process

Regular Auditing



Infection Control Prevention



- Additional Surveillance
- Additional Audits
 - PPE
 - Hand Hygiene
 - Environmental
- Daily huddles highlighting outbreak measures to all staff
- Daily e-mail memos highlighting outbreak measures and list of affected patients
- Reinforce outbreak measures with frontline staff
- Reinforce uniform policy in regards to artificial nails, chipped nail polish & jewelry

Outbreak measures:

WOODSTOCK HOSPITAL

Outbreak Memo

Unit _____
 Organism _____
 Status Alert
 Start Date _____
 # Outbreak Pts _____

Overview of Suspected Outbreak

This is notification that [UNIT] is currently under a Clostridium difficile outbreak. Additional measures will be put into effect today in order to avoid a confirmed outbreak.

In the last two days, [UNIT] has identified [] suspected C. difficile. Currently [UNIT] has [] cases and 2 previously confirmed symptomatic cases. The total unit population is [18] patients.

Outbreak Alert Measurement

Patient Care
 Infection Prevention

Infection Control Dept.

Date outbreak declared _____

Date outbreak resolved _____

Outbreak Type

MRSA

Respiratory

Gastro

VRE

Organism _____

Organism _____

Date of suspected outbreak _____

patients affected _____

Total positive cases _____

Outbreak Summary

Outbreak Unit _____

1 of 1

Additional Measures

above what is outlined in the outbreak binder

Declined measures

not implemented from the outbreak binder

For questions or

Contact Infection Control
 extension 2449
 Friday from 08:00
 Afterhours call
 switchboard.

Woodstock Hospital
 Private and Confidential Patient Information

Patients on Floor _____

Inhouse Positive Patients _____

Total Noso positive patients _____

IPAC General Line x2449

IPAC Manager x2448

Unit Charge Nurse x _____

Patient Linelist

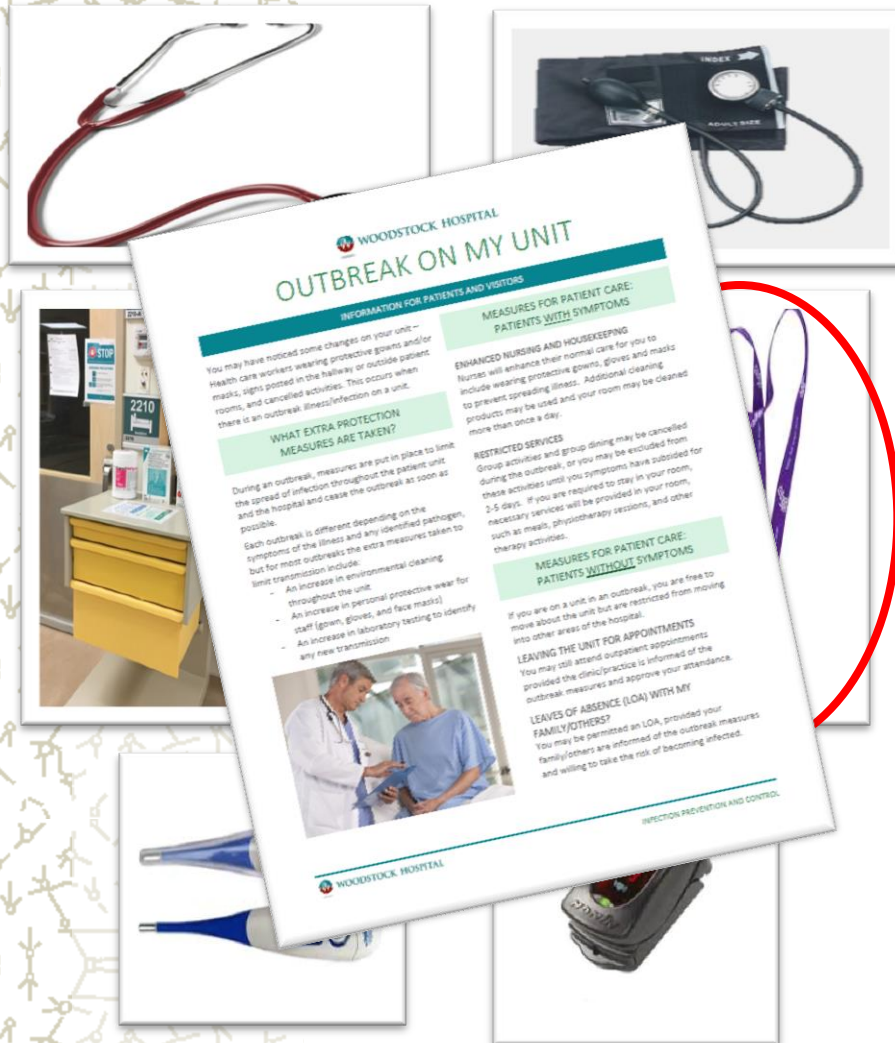
Sheet 1

Patient Name	Room #	Admit Date	WH #	MRSA	VRE	ESBL	C.diff	Noso	Last Neg.	Comment
Reviewing Cases: 0										
Watching Cases: 0										

Underlying illness(es)



Nursing Prevention Strategies

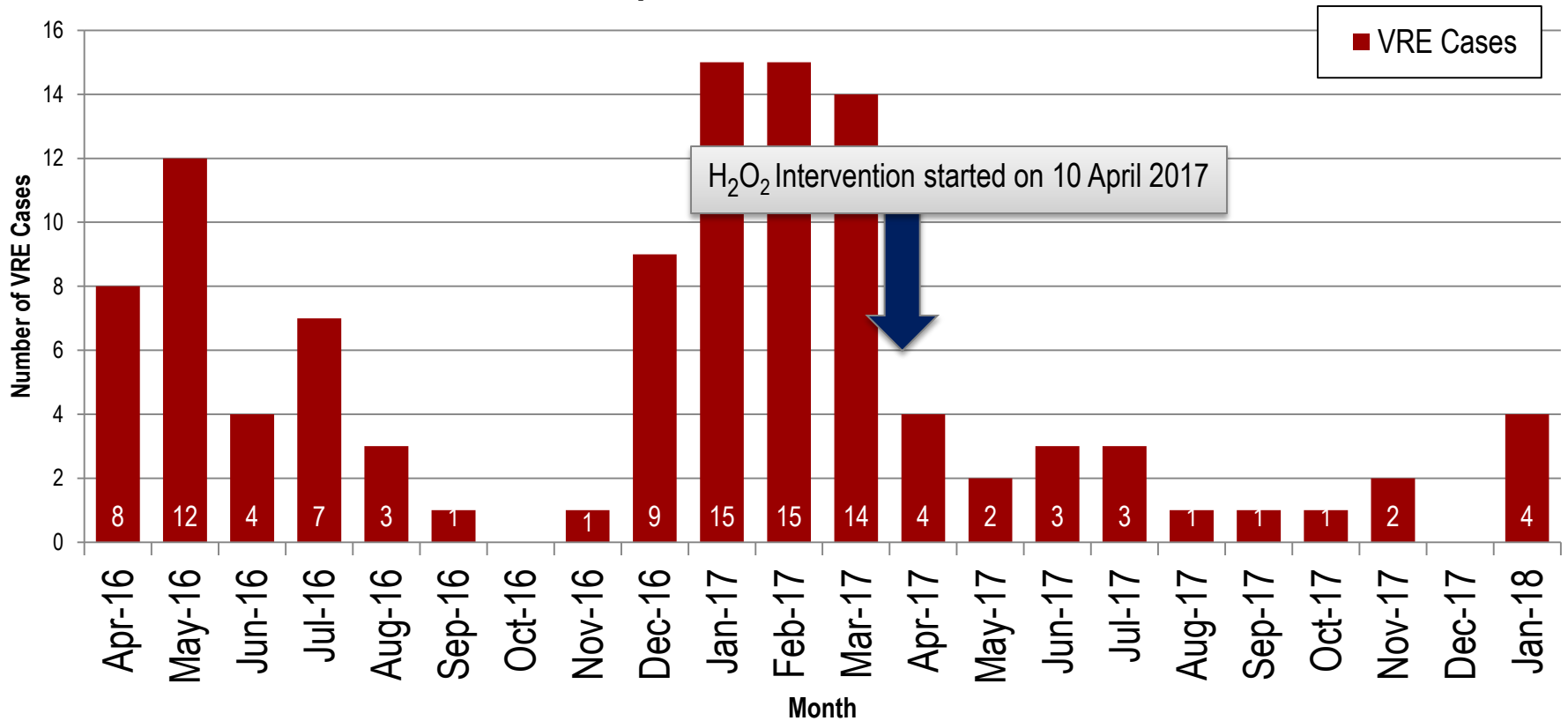


- Reinforce use of dedicated equipment
- Support staff and families throughout Outbreak
- Listen to front line staff concerns of any outbreak measures
- Ensure staff have necessary equipment and supplies
- Bring in Vendors to educate staff on new products
- Celebrate success of outbreak resolution with outbreak highlights and lessons learned



Nosocomial VRE Cases Pre/Post Accel Trial

Hospital Wide VRE Cases





New Outbreak Initiatives: Corporate Supported

1. Changed ABHR product
2. Trial of Accelerated Hydrogen Peroxide products
3. Isolation trial on repatriations
4. Patient bed realignment
5. Outbreak calculator

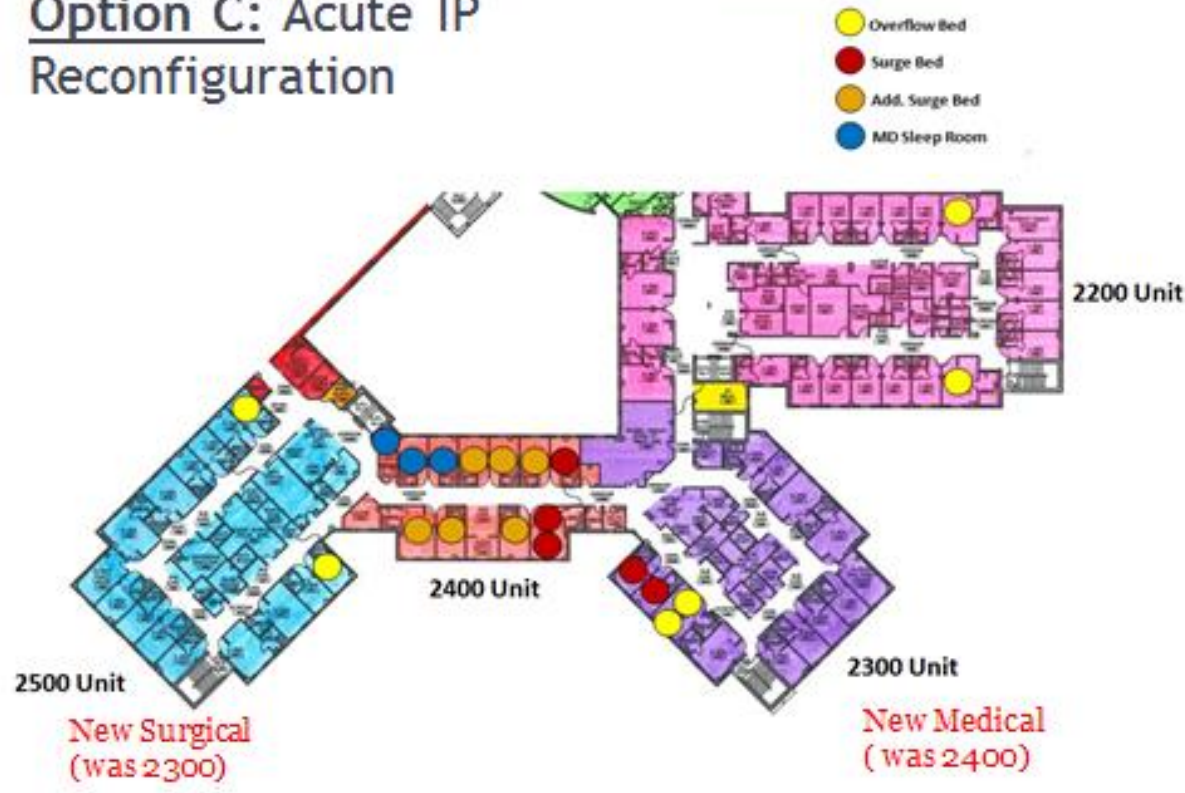
**A leader is one who knows
the way, goes the way, and
shows the way.**

John C. Maxwell



Acute Inpatient Changes

Option C: Acute IP Reconfiguration

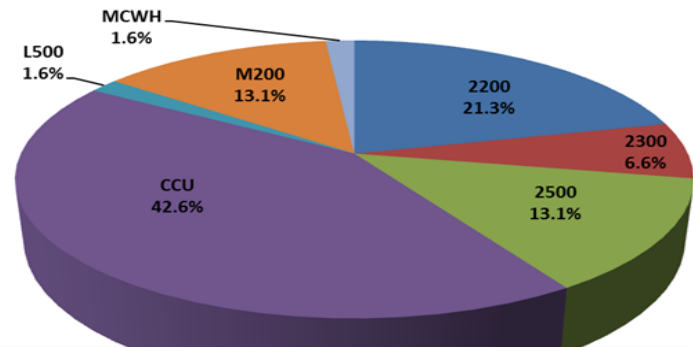




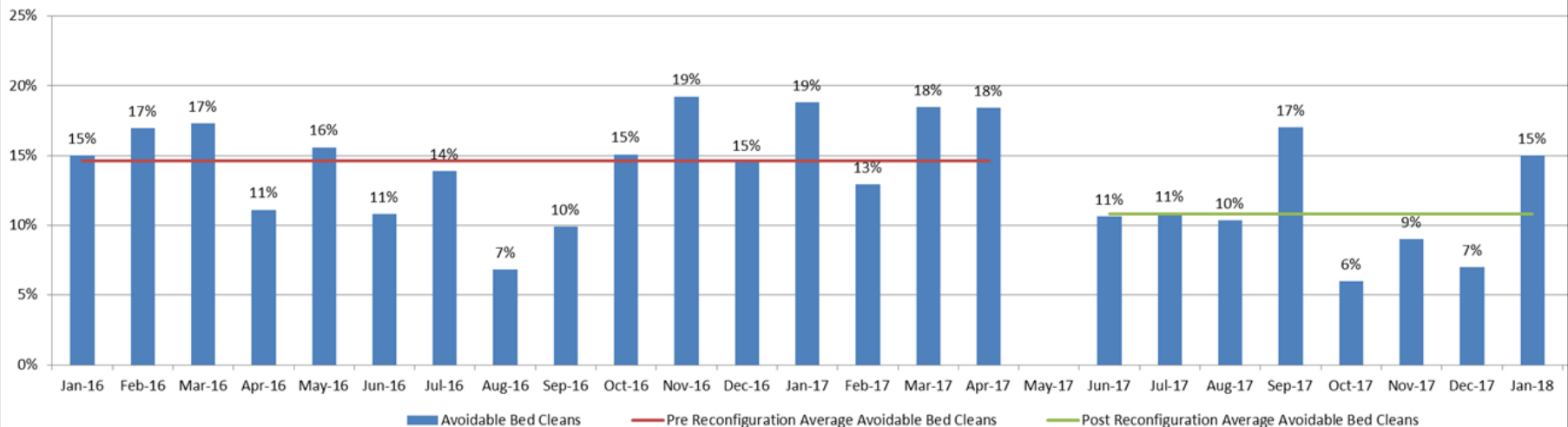
Pre and Post Acute Inpatient Reconfiguration

Pt Safety	Pre-reconfiguration	Post-reconfiguration
Outbreaks	4	0
Nosocomial	1-2/month	0

Delayed Bed Assignment and Bed Moves/Cleans TTIB Outliers by Unit (Post Reconfiguration)



Bed Clean Index: Avoidable Bed Cleaning
Ratio of Hospital Beds Cleaned to Reported Discharges, Transfers Out, and Deaths on Acute Inpatient Units





Challenges Present During the VRE Outbreaks



- Staff engagement since VRE screening protocol is not consistent in region
- Errors in prevalence collection thus delaying results
- Outbreak exhaustion
- Artificial nail/excessive jewelry management of policy
- Lack of additional staffing to properly manage outbreak measures.



Take Home Messages



- Network with local and Regional resources
- Engage Senior Leadership for Support
- Never assume staff have Infection control knowledge
- Listen for feedback and suggestions from Front Line
- Use a multidisciplinary approach
- Celebrate the lessons learned



Thank You!

