Virginia Long-Term Care Clinician Network Monthly Forum

May 15, 2024

Welcome!

As you join, please turn on cameras and mic or unmute your phone and say hello to your Virginia colleagues. We all have a common bond: the choice to serve in a unique area of health care. During the presentation we can mute ourselves until it is time for more interaction.

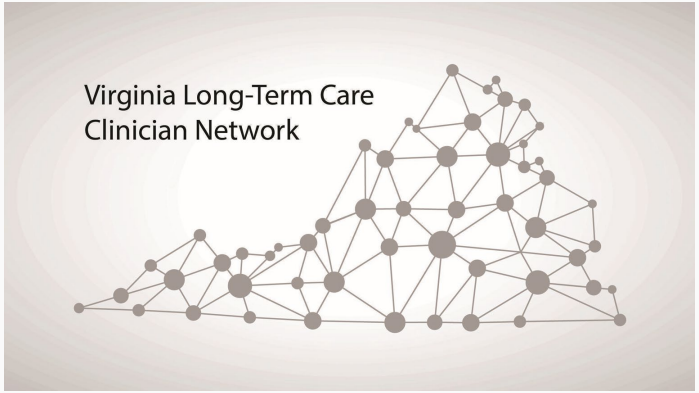
Please use the chat box:

- **Your name and region/city/town**
- **Do your facilities use Point Click Care or 'other'**

Welcome, New Members!

Temeika Ross, RN - Eastern, Central, SW
Susan Elium, PMHNP - NW, Central
Elizabeth Saum, FNP - Southwest
Caroline Chisholm, MD - Central
Meagan Radford, FNP-BC - Southwest
Ayni Sharif, PA - Central
Victoria Cornelius, AGPCNP - Eastern

256 Members Strong!



For great resources: look for previous slide sets and newsletters under Forums & Events and Resources on our website.

Survey is complete!

We thank you for participating in a survey of our clinician members – physicians, nurse practitioners and physician assistants – on well-being and satisfaction with areas of work-life.

We will let the winner of the $100 gift card know soon and have preliminary findings in the next newsletter.

Chat Waterfall

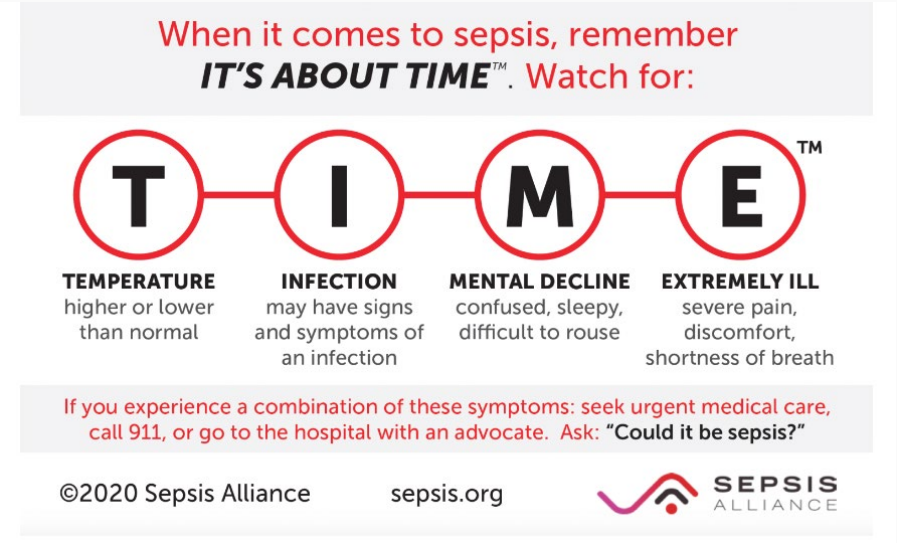
Many facilities haven’t had a state survey visit in the last year or so as they catch up from COVID-19.

Do surveyors ask you questions about resident complaints or their health status during the survey process? (Yes, No, Never been present for a survey)

Poll

Sepsis is often the #1 diagnosis that sends your residents to hospital. Do you think it is:

1. *Underidentified*
2. *Identified accurately*
3. *Over diagnosed*



https://www.sepsis.org/about/its-about-time/

Sepsis in Long Term Care Facilities

Aabha Jain, MD

May 15, 2024

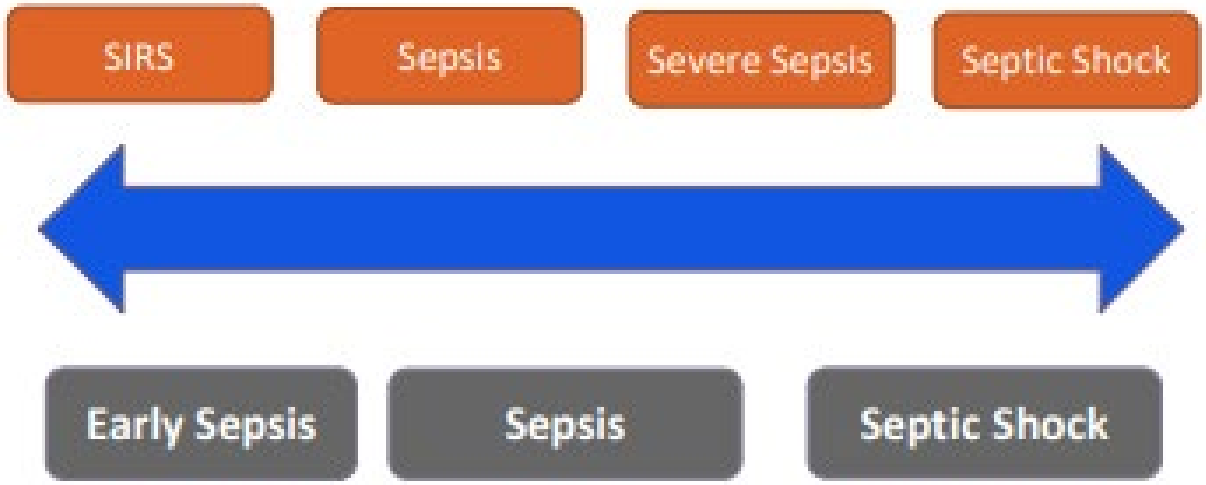
Sepsis

- Body’s extreme reaction to an infection
- Chain reaction in the body is triggered by an infection
- Without immediate treatment, sepsis can lead to organ failure, tissue damage, and even death

Sepsis

- In a typical year – data via CDC:
  - At least **1.7 million** adults in America develop sepsis.
  - At least **350,000** adults who develop sepsis die during their hospitalization or are discharged to hospice.
  - **1 in 3** people who dies in a hospital had sepsis during that hospitalization

Sepsis Continuum



* Adapted from slide provided by David Nace, MD

Sepsis

Infections that most often lead to sepsis are those that start in the:

- Gastrointestinal tract
- Lungs
- Skin
- Urinary tract

While most cases start as bacterial infections, sepsis can be caused by almost any type of common infection, including influenza or COVID-19.

Risk Factors for Sepsis

- Age (being 65 years or older or less than 1 year old)
- Admission to the intensive care unit (ICU)
- Chronic kidney or liver disease
- Compromised immune system
- Diabetes
- Invasive devices, such as catheters and breathing tubes
- Long hospital stays
- Previous antibiotic or corticosteroid use

Sepsis in Older Adults

- Over 1.5 million people get sepsis each year
  - Majority of adults are >65
  - Nursing home residents have 7 fold increase
- Nursing home residents may have several of these risk factors working against them
- One of the biggest contributors is the number of people who come and go, including visitors and staff.
  - Each person who enters a nursing home is coming from a different place, bringing with them whatever germs they've been exposed to elsewhere

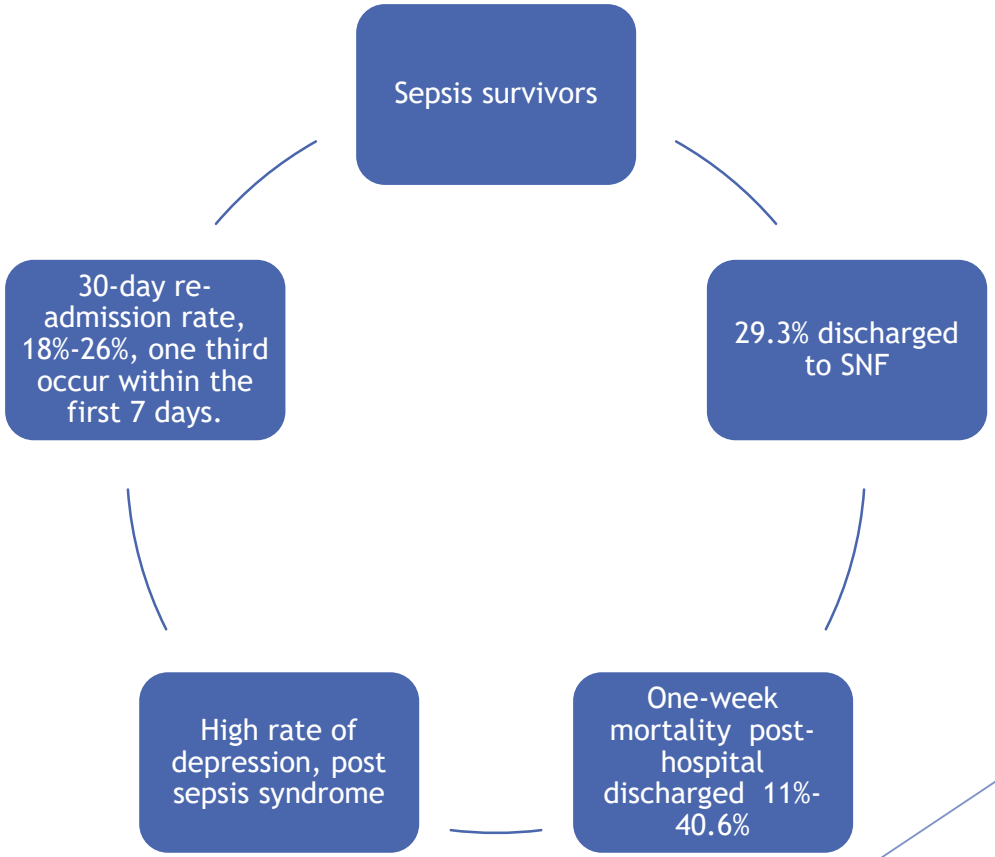
Sepsis in Older Adults

- In nursing homes is a life-threatening condition
- Nursing home residents also at risk of sepsis if they have catheters, ventilator tubes, and/or Ivs
  - - nidus of infections
- Nursing home residents are also at increased risk for bedsores

Sepsis in Older Adults

Common warning signs of sepsis in nursing homes include:

- Change in mental status
- Cool hands and feet
- Extreme pain or discomfort
- Fever
- High heart rate
- Lethargy, anxiety, confusion, or agitation
- Loss of interest in food
- Nausea and vomiting
- Sensitivity to light



Goodwin AJ, and Ford DW. Readmissions among sepsis survivors: Risk factors and prevention. Clin Pulm Med 2018.
• Lee JT, et al. Trends post-acute care use after admissions for sepsis. Ann Am Thorac Soc 2020.
https://hsag.com/contentassets/d95e7dbd3c9a44d886c1af64adf1156c/qio_sepsis_snfs_508.pdf

Sepsis Algorithms

Sepsis algorithms

- Ways to help health care teams to have more information when concern for sepsis
- Early recognition and treatment
- No simple diagnostic tests

Sepsis – Early Identification

Tools - SIRS Criteria
Systemic Inflammatory Response System

Criteria (Score ≥ 2 = Positive)
T ≤ 36° C or > 38° C (96.8° F or 100.4° F)
Pulse ≥ 90
RR ≥ 20
PaCO2 ≤ 32
WBC ≤ 4 K or > 12K Diff ≥ 10% bands

- Sensitivity = Good; Specificity = Very Poor
- 90% of ICU patients and 50% of general ward patients met criteria
- Too many false positives

Dhuiyale MM, et al. Am J Resp Crit Care Med 2001;[illegible]
www.sgsis.org

Sepsis – Early Identification

Tools qSOFA
Quick Sequential Organ Failure Assessment

Criteria
Altered Mental Status – Glascow Coma Score < 15[a]
Systolic Blood Pressure < 90 mm Hg
Respiratory Rate ≥ 22 breaths per minute

[a] Some studies use cutoff of 13

- Meant for ED and general wards – NOT LTC settings
- Derived using data from ICU database
- Sensitivity = Poor; Specificity = Good;
- Part of the 2016 guidelines

http://www.sosfa.org
Chaugek MM, et al. Am J Resp Crit Care Med 2017;195:906-911.
Dorsett M, et al. Prehospital Emergency Care 2017:21(1):89-97.

seeing sepsis

Skilled nursing facility sepsis algorithm for adults

Suspected infection *and* 2 or more SIRS criteria

Suspected infection	SIRS criteria
Fever/chills	Temp ≥100.0 or ≤96.8
Currently on antibiotics	Pulse ≥100
Cough/SOBS	BP <100 or >40 mmHg from baseline
Cellulitis/wound drainage	Resp. rate >20/SpO2 <90%
Weakness	Altered mental status

SIRS = Systemic Inflammatory Response Syndrome

Early detection tool 100-100-100

NO → **Negative screen for sepsis**

YES → **Positive screen for sepsis**

Prior to calling provider

- **Educate resident/family about status**
- **Review Advance Directives and options**

Notify provider

Transfer

- Prepare transfer sheet
- Call ambulance
- Call report to hospital
- *Report positive sepsis screen*

Stay in facility

If Advance Directives and/or resident's wishes are in agreement, consider some or all of following order options:

- Labs: CBC w/Diff, lactate level (if possible), UA/UC, blood cultures if able; from 2 sites, not from lines. *Send all labs ASAP.*

Establish IV access for the following:

- IV normal saline 0.9% @ 30ml/kg if BP <100
- Administer IV, IM or PO antibiotics
- Comfort care

Monitor for progression into *Multisystem Organ Dysfunction Syndrome*

Examples:

- Progression of symptoms despite treatment
- Urine output <400ml in 24 hours
- SBP <90 despite IV fluids
- Altered mental status

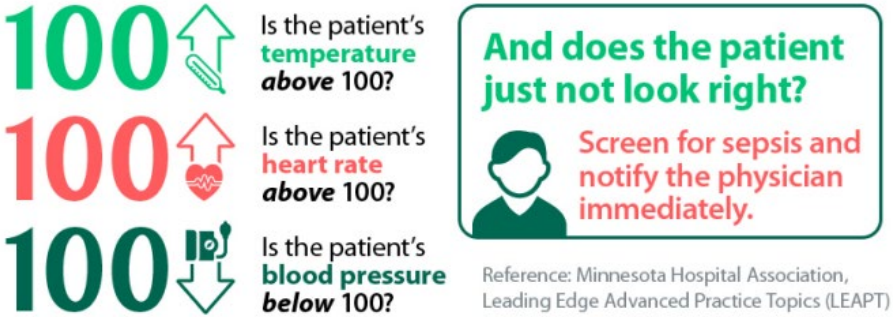
Consider transferring to another level of care - hospital, palliative, or hospice

Comfort care

- Pain control
- Analgesic for fever
- Reposition every 2-3 hrs
- Oral care every 2 hrs
- Offer fluids every 2 hrs
- Keep family informed
- Adjust care plan as needed

https://betsylehmancenterma.gov/assets/uploads/SepsisLTSS-SeeingSepsisAlgorithm.pdf

Minnesota Hospital Association



- Screen patients if 2 or more 100s

Quality Improvement Organizations
Sharing Knowledge. Improving Health Care.
CENTERS FOR MEDICARE & MEDICAID SERVICES

IPRO QIN-QIO

Healthcentric Advisors
Qlarant

Skilled Nursing Facility Care Pathway - Symptoms of Sepsis and Septic Shock

Sepsis = Infection + life-threatening organ dysfunction
Septic Shock = Sepsis + persistent hypotension despite fluid resuscitation and need for vasopressors to keep MAP >65mmhg.

Anyone with an infection is at high risk for sepsis.
Potential causes of infection that can lead to sepsis include the following:
• Pneumonia • Pressure Ulcers • *C.Difficile* Infection • Urinary Tract Infection
• Prolonged Use of Catheters • Chronic Conditions

Early Signs & Symptoms of Infection
- Confusion/altered mental state
- Poor motor skills or weakness
- Decrease in drinking fluids
- Decrease in appetite
- Falling or dizziness
- Agitation
- Other behavioral changes
- New pain

Notify MD, and monitor for worsening condition, obtain orders as necessary.

Review resident's wishes for life-sustaining treatment

Symptoms or Signs of Sepsis
- Infection (confirmed or suspected)
- Fever or feeling very cold
- Rapid heart rate
- Rapid breathing
- Shortness of breath
- Confusion or difficulty to arouse
- Complaints of extreme pain

YES

Take Vital Signs and Draw WBC
- Temperature
- BP, pulse
- Respirations

Vital Sign Criteria (any met?)
- Infection (confirmed or suspected)
- Two or more of the following
  - Altered Mental Status (Glasgow Coma Scale<13)
  - Hypotension (systolic<100mmHg)
  - Tachypnea (RR>22)
  - Decreased urine output or darkened/concentrated urine

YES → **Notify MD/NP/PA**

NO

Consider Contacting MD/NP/PA for Orders (for further evaluation and management
- WBC
- Blood cultures X2 (prior to antibiotics)
- Lactate
- Coagulation tests (aPTT/INR)
- Serum Creatinine
- Platelet count
- Bilirubin
- Urinalysis
- Urine culture
- Blood glucose

Order Tests

Evaluate Results
- WBC >12,000 or <4,000 or >10% bands
- Lactate >2mm/L
- Platelets <100,000
- Serum Creatinine >2.0mg/dL
- aPTT >60secs or INR >1.5
- Bilirubin >2mg/dL
- Hyperglycemia (not diabetic)

NO

Manage in Facility
- Monitor vital signs, fluid intake/urine output
- Oral, IV or subcutaneous fluids if needed for hydration
- Update advance care plan and directives if appropriate

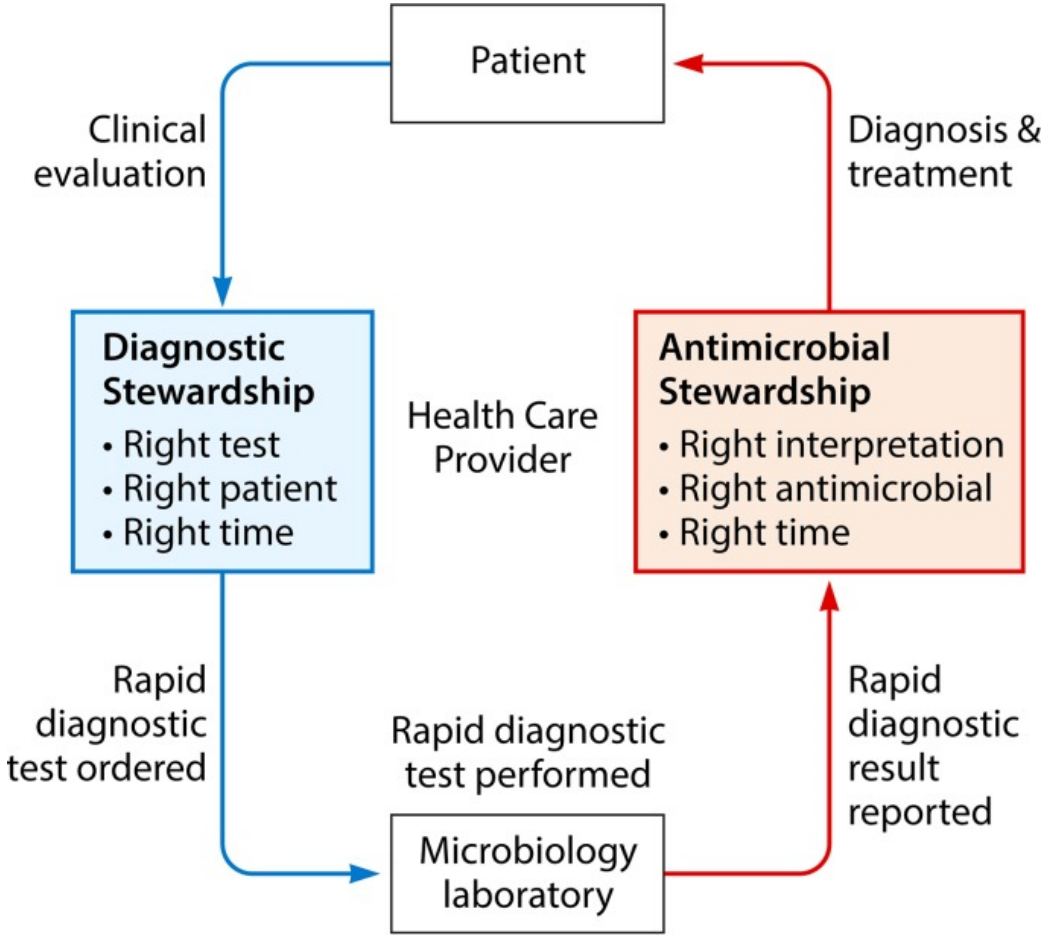
Monitor Response
- Sepsis criteria met
- Worsening condition

Adapted from: Third International Consensus Definitions for Sepsis and Septic Shock- Singer et al. JAMA 2016;315(8) 801-810. This resource is not all inclusive and may not apply to all patients/residents and/or situations. It is intended for educational purposes only and as guidance to support investigation for performance improvement—not as a substitute for treatment or advice from a physician or healthcare provider. This material was prepared by the IPRO QIN-QIO, a collaboration of Healthcentric Advisors, Qlarant and IPRO, serving as the Medicare Quality Innovation Network-Quality Improvement Organization for the New England states, NY, NJ, OH, DE, MD, and the District of Columbia, under contract with the Centers for Medicare & Medicaid Services (CMS), an agency of the U.S. Department of Health and Human Services. The contents do not necessarily reflect CMS policy. 12SOW-IPRO-QIN-TA-A4-21-347

Sepsis Management – What’s next

Management/Treatment

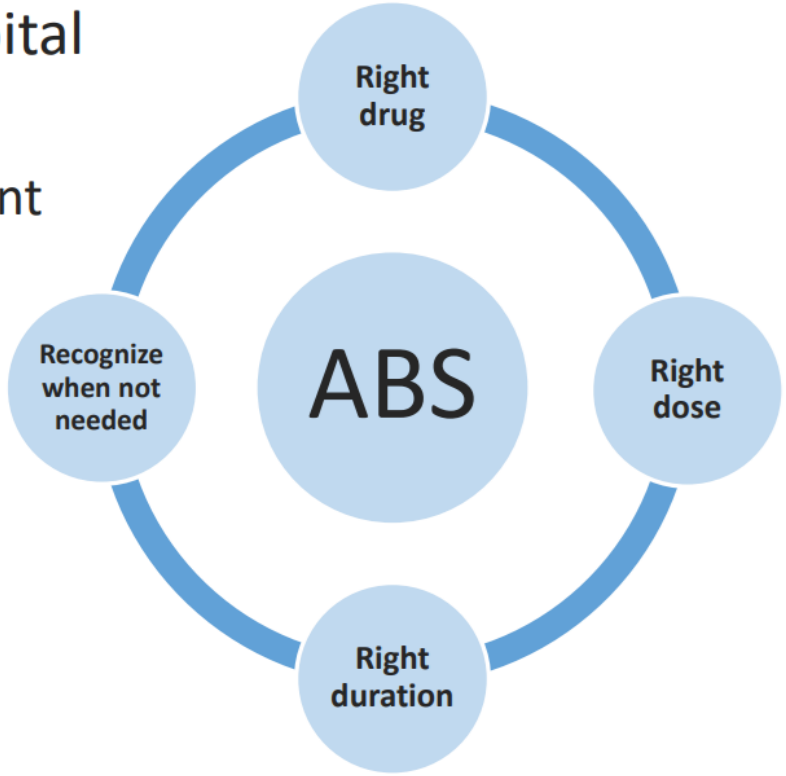
- Antibiotics
  - Choosing appropriately
  - Knowing history of infections/MDR
- Diagnostic stewardship
- Fluids, pain control, supportive care


Patient
Clinical evaluation
Diagnosis & treatment
Diagnostic Stewardship
• Right test
• Right patient
• Right time
Health Care Provider
Antimicrobial Stewardship
• Right interpretation
• Right antimicrobial
• Right time
Rapid diagnostic test ordered
Rapid diagnostic test performed
Rapid diagnostic result reported
Microbiology laboratory

Antimicrobial Stewardship:

Core elements of hospital ABS programs include:

1. Leadership commitment
2. Accountability
3. Drug expertise
4. Action
5. Tracking
6. Reporting
7. Education



- Centers for Disease Control and Prevention (CDC). https://www.cdc.gov/antibiotic-use/index.html
- CDC. Implementation of Antibiotic Stewardship Core Elements at Small and Critical Access Hospitals. https://www.cdc.gov/antibiotic-use/healthcare/pdfs/core-elements-small-critical.pdf

HSAG HEALTH SERVICES ADVISORY GROUP

Post Sepsis Syndrome

WHAT IS POST-SEPSIS SYNDROME?

Post-sepsis syndrome (PSS) consists of **physical and/or psychological long-term effects** that impact up to 50% of sepsis survivors. Symptoms may include:

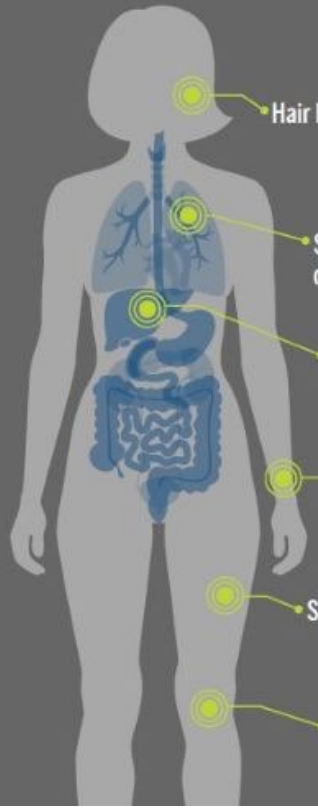
PHYSICAL SYMPTOMS

Difficulty sleeping or staying asleep

Fatigue, lethargy

Repeat infections

Poor appetite



Hair loss

Shortness of breath, difficulty breathing

Reduced organ function

Skin rash

Swelling of the limbs

Disabling muscle or joint pain

Post Sepsis Syndrome

- Can affect up to 50% of patients with sepsis
- Risk of having PSS is higher among people admitted to an intensive care unit (ICU) and for those who have been in the hospital for extended periods of times
- Study in 2010 published in *JAMA*
  - found that older severe sepsis survivors were at higher risk for long-term cognitive impairment and physical problems than others their age who were treated for other illnesses

Post-Sepsis Syndrome

Physical

- Difficulty sleeping, either difficulty getting to sleep or staying asleep
- Fatigue, lethargy
- Shortness of breath, difficulty breathing
- Disabling muscle or joint pain
- Swelling in the limbs
- Repeat infections, particularly in the first few weeks and months following the initial bout of sepsis
- Poor appetite
- Reduced organ function, eg kidney, liver, heart
- Hair loss
- Skin rash

Psychological

- Hallucinations
- Panic attacks
- Flashbacks
- Nightmares
- Decreased cognitive (mental) functioning
- Loss of self-esteem
- Depression
- Mood swings
- Difficulty concentrating
- Memory loss
- Post-traumatic stress disorder (PTSD)

What can be done about post-sepsis syndrome?

- Doctors and other healthcare professionals must recognize post-sepsis syndrome among sepsis survivors. This way, patients can be directed to the proper resources.
- Emotional and psychological support (counseling, cognitive behavioral therapy, or neuropsychiatric assessment)
- Physical support such as physical therapy or neurorehabilitation.

Many survivors are left with **LIFE-CHANGING** *challenges.*

LIFE AFTER SEPSIS FACT SHEET

WHAT SEPSIS SURVIVORS NEED TO KNOW

ABOUT SEPSIS

What is sepsis?

Sepsis is a complication caused by the body's overwhelming and life-threatening response to an infection, which can lead to tissue damage, organ failure, and death.

What causes sepsis?

Any type of infection that is anywhere in your body can cause sepsis. It is often associated with infections of the lungs (e.g., pneumonia), urinary tract (e.g., kidney), skin, and gut. An infection occurs when germs enter a person's body and multiply, causing illness and organ and tissue damage.

LIFE AFTER SEPSIS

What are the first steps in recovery?

After you have had sepsis, rehabilitation usually starts in the hospital by slowly helping you to move around and look after yourself: bathing, sitting up, standing, walking, taking yourself to the restroom, etc. The purpose of rehabilitation is to restore you back to your previous level of health or as close to it as possible. Begin your rehabilitation by building up your activities slowly, and rest when you are tired.

https://www.cdc.gov/sepsis/pdfs/life-after-sepsis-fact-sheet.pdf

Sepsis Prevention

Preventing Sepsis in Nursing Homes

- **Nursing home staff can practice proper infection prevention by:**
- Cleaning rooms and objects properly
- Isolating residents who show signs of illness
- Observing isolation protocol when necessary (masks, gloves, and/or gowns)
- Washing hands before moving from one resident to the next when providing care

HOW CAN I GET AHEAD OF SEPSIS?

As a patient, you can take specific steps to reduce your risk of sepsis, including caused by COVID-19, such as:

1 PREVENT INFECTIONS

Talk to your healthcare professional about steps you can take to prevent infections that can lead to sepsis.

- Take good care of chronic conditions
- Get recommended vaccines

2 PRACTICE GOOD HYGIENE

Remember to wash your hands and keep cuts clean and covered until healed.

- Wash your hands
- Keep cuts clean and covered until healed

3 KNOW THE SIGNS AND SYMPTOMS

A patient with sepsis might have one or more of the following signs or symptoms. A medical assessment by a healthcare professional is needed to confirm sepsis.

- High heart rate or low blood pressure
- Fever, or shivering, or feeling very cold
- Confusion or disorientation
- Shortness of breath
- Extreme pain or discomfort
- Clammy or sweaty skin

4 ACT FAST

Sepsis is a medical emergency. ACT FAST.

If you or your loved one has an infection that's not getting better or is getting worse, ACT FAST. Get medical care IMMEDIATELY either in-person, or at minimum, through telehealth services. Ask your healthcare professional, "Could this infection be leading to sepsis?" and if you should go to the emergency room for medical assessment.

To learn more about sepsis and how to prevent infections, visit **www.cdc.gov/sepsis** or call **1-800-CDC-INFO.**

CDC
Centers for Disease Control and Prevention

Sepsis Prevention:

- Hand Hygiene
- Avoid foleys and central lines as much as possible
- Keep UTD with vaccines
- Proper wound care
- Mobility
- Oral care

Pledge for Clean Hands

To Help Keep Each Other Safe

As a patient of this facility it is okay for me to speak up for clean hands.

Washing your hands for at least 20 seconds is the most effective way to prevent the spread of diseases like the flu, cold, and COVID-19.

When should I wash my hands?

Before:

- Touching your eyes, nose, or mouth
- Leaving the bathroom

Before and after:

- Eating
- Leaving your room

After:

- Blowing your nose, coughing, or sneezing
- Touching common surfaces and objects such as bed rails, remote controls, or the phone
- Touching garbage

When should I ask others to wash their hands?

Before:

- Entering and leaving the room
- Leaving the bathroom

Before and after:

- Your team provides personal care such as treating a cut or wound
- Receiving medications
- Handling equipment
- Close contact with others

After:

- They blow their nose, cough, or sneeze

Your healthcare team supports this effort and cares about your health. Speak up and remind us to keep our pledge for clean hands.

HSAG HQIC

This material was prepared by Health Services Advisory Group (HSAG), a Hospital Quality Improvement Contractor (HQIC) under contract with the Centers for Medicare & Medicaid Services (CMS), an agency of the U.S. Department of Health and Human Services (HHS). Views expressed in this material do not necessarily reflect the official views or policy of CMS or HHS, and any reference to a specific product or entity herein does not constitute endorsement of that product or entity by CMS or HHS. Publication No. XS-HQIC-IP-10142021-01.

Source: Centers for Disease Control and Prevention, When and How to Wash Your Hands. Accessed December 2, 2020. Available at: https://www.cdc.gov/handwashing/when-how-handwashing.html#KeyTimes

https://www.hsag.com/globalassets/hqic/hqic_cleanhandspledge.pdf

Thank you!

References

- Goodwin AJ, and Ford DW. Readmissions among sepsis survivors: Risk factors and prevention. Clin Pulm Med 2018.
- Lee JT, et al. Trends post-acute care use after admissions for sepsis. Ann Am Thorac Soc 2020.
- https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6141202/ https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6944346
- https://www.nursinghomeabusecenter.com/nursing-home-neglect/sepsis
- https://www.ncbi.nlm.nih.gov/pmc/articles/PMC7544455/#:~:text=Post%2Dsepsis%20syndrome%20consists%20of,increased%20comorbidity%20and%20mortality%20(

Open Forum

Any questions or ideas from the talk?

Share an idea!
Anything you need help with?
What's new in your Virginia Health District?
Any announcements?

COVID-19 Vaccine Payment Meeting

Dear HAI/AR Programs,

Register Now: Overcoming COVID-19 Vaccine Payment Challenges — This webinar is open to QIN-QIOs, nursing home leaders, medical directors, directors of nursing and billing supervisors interested in overcoming vaccine payment challenges to maximize immunization rates for COVID-19 at their facilities.

The commercialization of COVID-19 vaccines following the end of the public health emergency has led to vaccine payment challenges for nursing homes. Join the Centers for Medicare & Medicaid Services (CMS) and the Centers for Disease Control and Prevention (CDC) to hear directly from a Medicare payment expert, learn how QIN-QIOs are connecting nursing homes with pharmacies to provide vaccines and handle billing and learn about resources for navigating the vaccine payment process.

This webinar will be held on **Thursday, May 30, 2024, from 2:00 – 3:00 p.m. ET.**

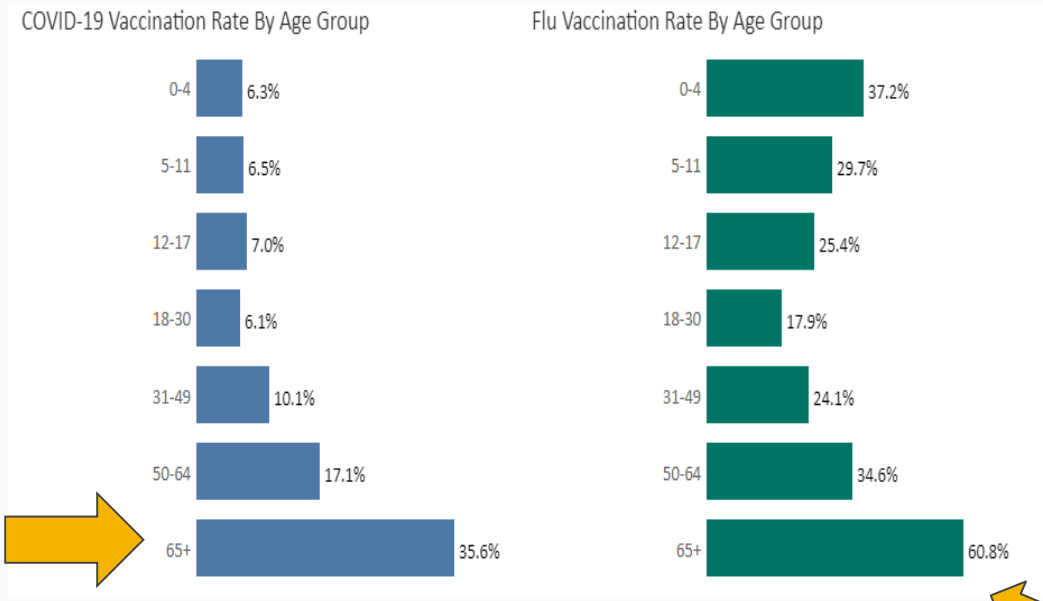
Please note: There is a cap of 3,000 registrants for this event. **Registration will be on a first come, first served basis. Register here**

https://us06web.zoom.us/webinar/register/WN_ZurIWVBiSrOKrd7sdcZi5Q#/registration

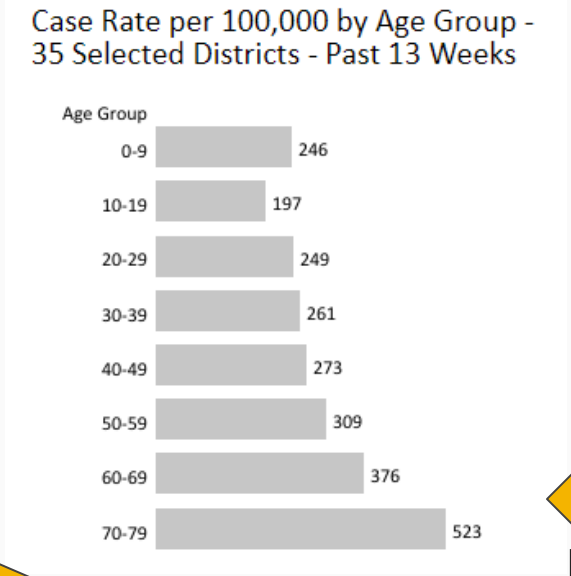
VDH Dashboard Snapshot

VDH no longer posting LTC Specific

65+ COVID 35.6%/ Flu 60.8% Vaccination Rates



13 Week COVID19 Case Rate as of 5/13



ltccn.vcu.edu

https://www.vdh.virginia.gov/coronavirus/see-the-numbers/covid-19-in-virginia/

Accreditation

	In support of improving patient care, VCU Health Continuing Education is jointly accredited by the Accreditation Council for Continuing Medical Education (ACCME), the Accreditation Council for Pharmacy Education (ACPE), and the American Nurses Credentialing Center (ANCC), to provide continuing education for the healthcare team.
	VCU Health designates this live activity for a maximum of ***1.00 AMA PRA Category 1 Credits™***. Physicians should claim only the credit commensurate with the extent of their participation in the activity.
	VCU Health Continuing Education designates this activity for a maximum of ***1.00 ANCC*** contact hours. Nurses should claim only the credit commensurate with the extent of their participation in the activity.
	VCU Health Continuing Education has been authorized by the American Academy of PAs (AAPA) to award AAPA Category 1 CME credit for activities planned in accordance with AAPA CME Criteria. This activity is designated for ***1.00 AAPA Category 1 CME credits***. PAs should only claim credit commensurate with the extent of their participation.

Disclosure of Financial Relationships

Disclosure of Commercial Support:

We acknowledge that no commercial or in-kind support was provided for this activity.

Claiming CE Credit

Submit Attendance

1. *If you have **not participated in a VCU Health CE program** in the past:*
   a. Go to vcu.cloud-cme.com to create an account – make sure to add your cell phone number
2. Once you have registered or if you have participated before:
   a. Text the course code to **(804) 625-4041.**
   b. The course code for today's event is: ##### *(within **5** days of the event)*

Complete Evaluation & Claim Credit, *(within 60 days of the event)*

1) Go to https://vcu.cloud-cme.com
2) Sign in using email address used above
3) Click "My CE"
4) Click "Evaluations and Certificates"

Need help? ceinfo@vcuhealth.org

OR

1) Open the CloudCME app on your device
2) Click "My Evaluations"
3) Click the name of the activity to complete evaluation

Thank you for joining us!

Next Newsletter - coming to you in **June**

Next Monthly Forum: **Wednesday, June 19, 2024, 4-5 pm, Dr. Marissa 'Mari' Mackiewicz, RN, MSN, PhD** Postdoctoral Fellow, Department of Medicine, Section of Hospital Medicine, University of Chicago **TOPIC: Substance Use Disorder in LTC**

Your Calendar Link - In the Zoom Registration Confirmation email you received today, there's a calendar link to update your calendar for future meetings.

On your way out of our meeting today, kindly answer a brief feedback survey.

Stay in touch! Email us at ltccn@vcu.edu

Invite your colleagues! They can register at ltccn.vcu.edu

Disclosures

VDH VIRGINIA DEPARTMENT OF HEALTH VCU

The speakers and presenters for today have no relevant financial conflicts of interest.

*Funding Disclosure: This work is supported by the **Virginia Department of Health, Office of Epidemiology, Division of Healthcare-Associated Infections (HAI) and Antimicrobial Resistance (AR) Program** and the Centers for Disease Control and Prevention, Epidemiology and Laboratory Capacity (ELC) Program under federal award number NU50CK000555 and state subrecipient number VCULTC603GY23 in the amount of $820,002. The content presented is solely the responsibility of the authors and does not necessarily represent the official views of the Centers for Disease Control, the Virginia Department of Health, or Virginia Commonwealth University.*

Virginia Long-Term Care Infrastructure Pilot Project (VLIPP) funding will be utilized in nursing homes and long-term care facilities to assist with the ongoing COVID-19 response and to bolster preparedness for emerging infections. The projects are based on identified needs that align with funding objectives.