Enhancing Sepsis Awareness and Management: Across the Continuum of Care

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Presented by:

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Objectives:

At the end of this session you should be able to:

• Describe the scope of the burden of sepsis
• Identify and use sepsis resources available to the healthcare team to help provide optimal patient care
• Recall past and current awareness levels of sepsis
• Describe the opportunities for patient and community education and list available resources
About Sepsis Alliance

- Founded in 2007
- Working in all 50 states
- 501(c)(3) charitable organization
- GuideStar Platinum Rated Charity
- Focus on Education:
  - Public and patient
  - Health Providers
  - Thought leaders
- About partnership and...
- Patient empowerment

Carl Flatley, DDS, MSD, Sepsis Alliance founder, with daughter Erin, a victim of sepsis
## Maternal Mortality

<table>
<thead>
<tr>
<th>Country</th>
<th>Maternal Mortality Ratio (per 100,000) 2000</th>
<th>Maternal Mortality Ratio (per 100,000) 2015</th>
</tr>
</thead>
<tbody>
<tr>
<td>Brazil</td>
<td>66</td>
<td>44</td>
</tr>
<tr>
<td>Canada</td>
<td>9</td>
<td>7</td>
</tr>
<tr>
<td>Finland</td>
<td>5</td>
<td>3</td>
</tr>
<tr>
<td>India</td>
<td>374</td>
<td>174</td>
</tr>
<tr>
<td>Rwanda</td>
<td>1,020</td>
<td>290</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>12</td>
<td>9</td>
</tr>
<tr>
<td>United States</td>
<td>12</td>
<td>14</td>
</tr>
</tbody>
</table>

*US Department of Health and Human Services, Health Resources and Services Administration*
Maile's Story – Today is Maternal Sepsis Day

• Maternal sepsis was the cause of 12.7% of pregnancy-related deaths in the US in 2011-2013
• Maile Le Boeuf developed maternal sepsis in 2015 after the birth of her second daughter
  • Survived septic shock, a medically induced coma, hysterectomy, two skin graft surgeries, and rehabilitation
  • Required double hip replacement while recovering
• Now Maile is an advocate with Sepsis Alliance
  • Hosts awareness and fundraising events, Salutations for Sepsis, and Sips for Sepsis
  • Tells her story at a variety of conferences and meetings, as well as through online webinars.
  • Involved with the launch of Maternal Sepsis Day
Maile's Story – Today is Maternal Sepsis Day

- Sepsis Alliance is working with partners to reduce maternal mortality
Committed to Partnership*

*Partial list
Critical Support*

*Partial list
Definition: Sepsis is the body’s overwhelming response to infection, which can lead to tissue damage, organ failure, amputations, and death.

Very young, older adults, those with chronic disease or other immune compromising conditions are more susceptible BUT anyone can get sepsis!
Rich, Poor, Young, Old, Well, or Ill...

Anyone can get sepsis!
Introduction: Incidence of Sepsis & More

- **1.7+ million people** are diagnosed with sepsis in the U.S. each year (1 person every 20 seconds)
- 270,000 people die from sepsis every year in the U.S. - **1 person every 2 minutes**; more than from prostate cancer, breast cancer and AIDS combined
- More than **75,000 children develop severe sepsis** each year in the U.S.
- **More children die** of sepsis (6,800) than from pediatric cancer
Burden of Sepsis - Continued

• Sepsis is the #1 cause of death in U.S. hospitals
• Sepsis is the #1 cost of hospital care - $27B/year
• Sepsis is the #1 cause of hospital readmissions
• As many as 87% of sepsis cases are community-acquired

We have the opportunity to reduce these numbers dramatically!
Relative Incidence and Impact of Sepsis*

<table>
<thead>
<tr>
<th></th>
<th>Cases/year</th>
<th>Mortality (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Stroke</td>
<td>591,996</td>
<td>6-7</td>
</tr>
<tr>
<td>AMI</td>
<td>540,891</td>
<td>10</td>
</tr>
<tr>
<td>Trauma</td>
<td>697,025</td>
<td>5-16</td>
</tr>
<tr>
<td>Sepsis</td>
<td>859,858</td>
<td>15-20</td>
</tr>
<tr>
<td>Severe Sepsis</td>
<td>791,000</td>
<td>27-40</td>
</tr>
<tr>
<td>Septic Shock</td>
<td>200,000</td>
<td>36-47</td>
</tr>
</tbody>
</table>

*National Institutes of Health
Survivorship

Surviving and Readmission

• **1.4 million** people survive sepsis each year in the United States
• Hospital **readmission** after sepsis
  • Leading cause of unplanned 30-day hospital readmissions
  • About 1/3 of all patients and +40% of older patients are re-hospitalized within 3 months of the initial sepsis
  • More than half of all hospital readmissions after sepsis are infection-related
Survivorship

Sepsis survivor's daily life

• Almost 60% experience worsened cognitive, mental and/or physical function

• Older sepsis patients experience on average 1 to 2 new limitations on their daily activities (e.g. bathing, dressing, managing money) after hospitalization

• Many sepsis survivors report symptoms of post-traumatic stress disorder

• Risk of suicide increases 42% following an infection that requires hospitalization
The Patient Journey – Many Paths

Key is Early Identification and Rapid Treatment
Public Awareness

- **Good News:** Sepsis awareness has risen from 19% to 65% in the past decade

**BUT**

- Only 12% know the most common sepsis symptoms
- Only 50% strongly agree that you need to seek urgent medical attention if you see signs of sepsis
- Nearly half (41%) of parents think children can only get sepsis if they are already in the hospital
Infection Prevention = Sepsis Prevention

Many infections can be prevented

• **Hygiene**
  • Frequent handwashing
  • Regular cleaning of environmental surfaces
  • Use of fist bump instead of handshake

• **Vaccines**

• **Care for wounds**

• **Be Aware** - higher risk for seniors (65+), the very young (< 1 year), and immunosuppressed

• **Manage chronic conditions** (diabetes, lung, kidney, liver disease)
Public Awareness

Public Education Resources:

- Sepsis.org – 3.5+ million visits/year
- Award winning public education
  - Videos
  - PSAs (video, radio, digital)
  - Sepsis Information Guides
  - Posters, infographics, cards
- Community Outreach
- Erin’s Campaign for Kids
- Spanish language resources
- All free and can be co-branded
Public Awareness

Sepsis 911 Community Education Kit

• A leader-guided presentation that allows anyone to share information about sepsis with their community.
  • Sepsis 911 Video
    • Ft. Sue and Jay Stull
  • Leader’s guide (with instructions on planning and conducting a presentation)
  • Attendee pre- and post-event quizzes
  • Attendee surveys
• NEW! Sepsis and Aging kit
Survivor Resources

• Sepsis Information Guide
• Tri-fold brochure
• Spanish-language materials
• NEW! Sepsis Caregiver Guide
• Faces of Sepsis support site
• Life After Sepsis video
• NEW! "Readmission to Hospital After Sepsis: A Q&A with Dr. Hallie Prescott"
After Discharge Care

**Life After Sepsis**

*A short informational video for sepsis survivor, their loved ones and caretakers.*

For more information and resources about life after sepsis, please visit [www.sepsis.org/life-after-sepsis/](http://www.sepsis.org/life-after-sepsis/)
Healthcare Provider Awareness

- **3 in 4 nurses (74%)** surveyed say there is a lack of support services and training on the core concepts of managing sepsis at their facility (SA/ Lippincott/ Wolters Kluwer survey)

- **51% of nurses** report that they are *not* very aware OR not at all aware of post-sepsis syndrome
The goal of this research is to understand the prevalence of sepsis encounters among EMS practitioners, their awareness level of different aspects of sepsis and the education they receive regarding sepsis.

- Only **52%** are very confident in their ability to recognize the signs and symptoms of sepsis.
- **20%** state their organization does not have a sepsis-specific protocol.
- **33%** say their organization is not well prepared for a patient with sepsis.
- **25%** state that while they know patients have sepsis, physicians don't like to diagnose them with it.
- **58%** say when patients are showing signs of sepsis, not all hospitals initiate a sepsis protocol.
Provider Education and Training

**Professional webinar series**

Upcoming webinar schedule:
- May 15th – Maternal Sepsis
- August – Best Practices
- September – Sepsis and Antimicrobial Stewardship
- More topics to come...

Leading medical experts from
- CDC
- MD Anderson
- CHOP
- University of Michigan
- Sutter Health

Register at [www.SepsisWebinar.org](http://www.SepsisWebinar.org)
Provider Education and Training

Sepsis Coordinator Network

- Community forum
- Tools & resources
- Webinars
- Interdisciplinary clinical advisors
- P2P support and collaboration
- Specialty sub-groups: emergency response, pediatrics, etc.

www.SepsisCoordinatorNetwork.org
Provider Education and Training

Sepsis Coordinator Network

- Over 1,600 members from all 50 states
- Representing over 1,400 hospitals & facilities
- Over 460,000 hospital beds
- Join Today!

www.SepsisCoordinatorNetwork.org
Provider Education and Training

Training Modules: Sepsis First Response

Educational video and training module that provides EMS staff with the tools to rapidly identify and begin treating sepsis cases in the field.

- 15-min educational video
- 60-min training module
- EMS Provider Badge Buddy
- Infographic
- Common Infections Poster
- Ambulance Decal

NEW! NAEMT Partnership announcing soon

www.sepsis.org/sepsis-first-response
Patient Journey to the Hospital

Sepsis: First Response

For more information and resources, please visit www.sepsis.org/sepsis-first-response
Provider Education and Training

Planned Training Modules

• Sepsis and Home Care (in production)
• Pediatric Sepsis First Response
• Maternal Sepsis
• Sepsis and Long-Term Care
• Sepsis and Oncology
• Improving Sepsis Survivorship
• Sepsis for Physical Therapists
• Emergency Preparedness
• Disaster Medicine
The Sepsis Institute

Mission:
To provide expert content on the prevention, recognition, treatment, and management of sepsis for healthcare providers across the continuum of care

The first centralized hub for evidence-based sepsis education
Breaking News! Sepsis Institute Funded by BARDA

Biomedical Advanced Research and Development Authority

- DRIVe and Sepsis Alliance Partner to develop the Sepsis Institute, a healthcare provider education and training platform, to improve the diagnosis and treatment of sepsis.
- Will help prevent a major sepsis public health crisis in the event of a national pandemic, or a chemical, biological, radiological, or nuclear attack. High rates of infection in any of these situations can lead to sepsis.
- DRIVe is a US government division focused on accelerating innovative products and approaches to improve the nation’s health security.
Spreading the Word: Sepsis Awareness Month

• Launched in 2011 by SA
• State designations
• Community events
• Sepsis Superhero™ Challenge
• Toolkits for healthcare providers
  • Posters and infographics
  • Videos
• Ideas to get involved

www.SepsisAwarenessMonth.org
New Sepsis Observances

Sepsis Survivor Week February 10 - 16

Pediatric Sepsis Week April 21 – 27

Maternal Sepsis Day May 15
It's About TIME™

National initiative to create broader awareness of sepsis and the need for urgency to seek treatment when there are signs and symptoms

• Mortality from sepsis increases by as much as 8% for every hour that treatment is delayed

• As many as 87% of sepsis cases start in the community, not in the hospital as is widely believed

• As many as 80% of sepsis deaths could be prevented with rapid diagnosis and treatment

www.SepsisItsAboutTime.org
It's About TIME™

• Angelica Hale, *Sepsis Celebrity Advocate*
• Media coverage
• White paper
• Video and radio PSAs
• Billboards
• Print and digital ads
• Posters
• Merchandise

www.SepsisItsAboutTime.org
Partner with Us
Co-branding Opportunities
The Human Impact of Sepsis

Faces of Sepsis™
Connect with Us!

@sepsisalliance
Contact Us

Thomas Heymann

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theymann@sepsis.org

Thank You!
Sepsis.org