

CPR**LifeLinks**

911 and EMS united to save more lives.

The CPR LifeLinks Implementation Toolkit

CPR LIFELINKS

A national initiative to unite EMS and 9-1-1 agencies to improve survival rates in their communities by implementing Telecommunicator CPR and High Performance CPR



CARES

Cardiac Arrest Registry
to Enhance Survival

**Measuring Outcomes.
Improving Care.
Saving Lives.**



CPRLifeLinks Coalition:



Tennessee
Emergency Communications Board



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- Mickey Eisenberg MD, MPH, PhD
 - Director of Medical QI
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 - Thomas Rea, MD
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 - Kevin Seaman, MD
 - Medical Director
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CPR LIFELINKS PROJECT TEAM

University of Arizona Department of Emergency Medicine:

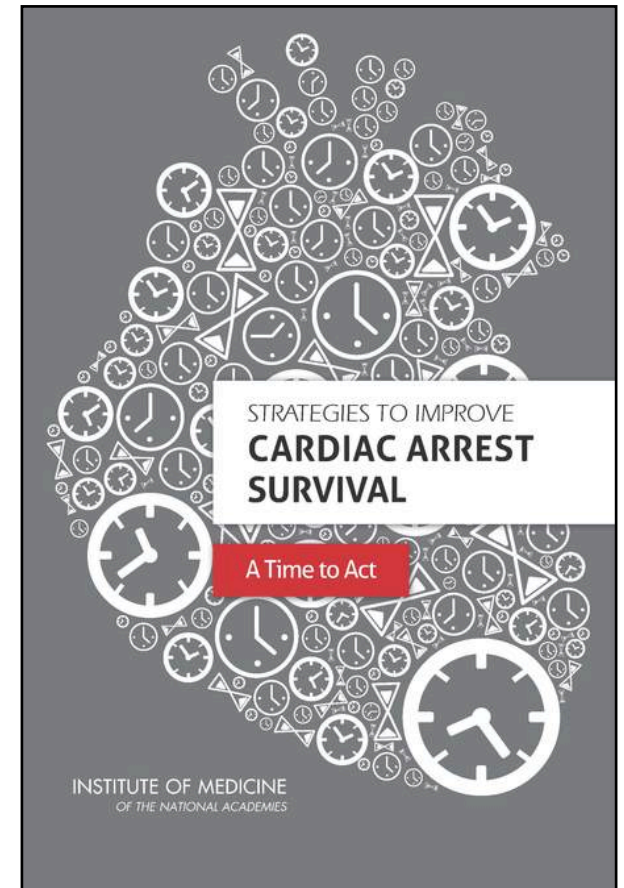
- Ben Bobrow, MD
- Micah Panczyk, MS
- Dan Spaite, MD



INCREASING OHCA SURVIVAL

2015 Institute of Medicine (IOM): EMS systems should take steps to enhance T-CPR and HP-CPR to improve patient outcomes in their communities.

In response to the report, the National Highway Traffic Safety Administration created convened experts and created **CPRLifeLinks**.



Recommendation 3: Enhance the Capabilities and Performance of EMS Systems

NHTSA should coordinate with other federal agencies and representatives from private industry, states, professional organizations, first responders, EMS systems, and non-profit organizations to convene interested stakeholders:

- To develop standardized **Telecommunicator-Assisted CPR protocols and national educational standards** for use by all PSAPs
- To establish a **standardized definition and training curriculum** for **High-Performance CPR** to be used in basic emergency medical technician training and certification

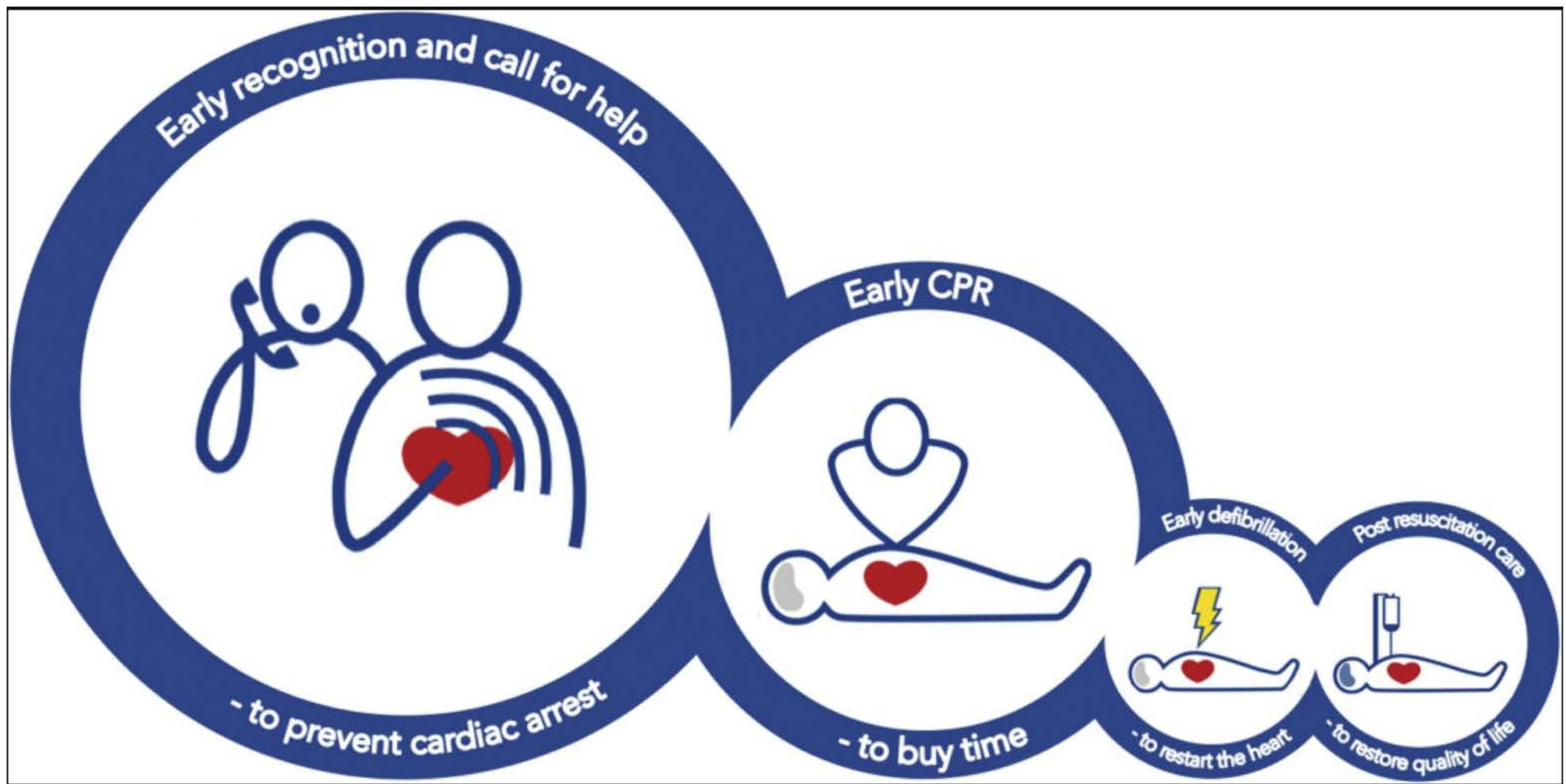


Telecommunicator CPR Training/Protocol/CQI

▶ **Examples of Telecommunicator-Assisted CPR Performance Metrics**

- ▶ Percentage of cardiac arrests recognized when dispatchers have a chance to assess patient consciousness and breathing
- ▶ Time from call receipt to recognition of cardiac arrest
- ▶ Percentage of cases that receive chest compressions when dispatchers have a chance to assess patient status and CPR is not already in progress
- ▶ Time from call receipt to first chest compressions





IMPLEMENTATION TOOLKIT

Complete package of cognitive and hands-on training and assessment tools with audiovisual demonstrations and case studies.

CPRLifeLinks Implementation Toolkit is a how-to guide for EMS and 911 agencies interested in implementing programs to improve cardiac arrest survival rates in communities across the nation.

A practical roadmap to help:


- ✓ 9-1-1 agencies implement Telecommunicator-CPR protocols, training and QI
- ✓ EMS agencies implement High-Performance CPR programs

DEVELOPING THE CPR LIFELINKS TOOLKIT

The NHTSA Office of EMS and National 911 Program convened a group of 20 public safety leaders to draft the CPR LifeLinks Implementation Toolkit.

16-Month Development Process

- Monthly meetings
- One in-person meeting
- Multiple Toolkit revisions
- Public comment solicitation



CPR LifeLinks
911 and EMS united to save more lives.

CPR LifeLinks is a national initiative that encourages local collaboration between 9-1-1 and EMS to improve out-of-hospital cardiac arrest survival rates by improving care in the first links in the "Chain of Survival": early 9-1-1 access/intervention and early (and effective) CPR.

The CPR LifeLinks Implementation Toolkit
Find resources and a practical roadmap for how:

- Any 9-1-1 agency can put telecommunicator CPR protocols and training into place.
- Agencies providing EMS can implement High-Performance CPR.

Learn strategies and explore case studies for how 9-1-1 and EMS can collaborate, working together to strengthen the Chain of Survival.

WHAT'S INSIDE:

Two “Linked” Training Chapters

PART 1: Telecommunicator CPR (T-CPR)

- Section 1: Overview
- Section 2: The Commitment to Act: Challenges and Perspectives
- Section 3: AHA T-CPR Program and Performance Recommendations
- Section 4: Protocols
- Section 5: Telecommunicator Training
- Section 6: Achieving a T-CPR Culture of Excellence

PART 2: High-Performance CPR (HP-CPR)

- Section 1: Overview
 - Section 2: The Commitment to Act: Challenges and Perspectives
 - Section 3: Performance Recommendations
 - Section 4: Common CPR Quality Issues
 - Section 5: Training
 - Section 6: Achieving a HP-CPR Culture of Excellence
-

Culture of Excellence:

An environment which requires a shared organizational vision by both 911 and EMS leaders

Leadership: Need to identify and empower EMS/911 leaders

Achieving a Culture of Excellence for Telecommunicator CPR:

- Build bridges between stakeholders across the Chain of Survival
 - Recommend elements of T-CPR CQI/QA
 - Fulfilling additional steps PSAPs can take toward a culture of excellence
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Achieving a Culture of Excellence for High-Performance CPR:

- Build bridges between stakeholders across the Chain of Survival
- Recommend elements of EMS CQI/QA
- Fulfilling additional steps EMS agencies can take toward a culture of excellence

TELECOMMUNICATOR CPR DEFINED

A THREE-STEP PROCESS WHERE TELECOMMUNICATORS:






1. Work together with 9-1-1 callers to identify potential OHCA patients
2. Provide callers with pre-arrival CPR instructions
3. Coach callers to perform continuous CPR until EMS assumes care

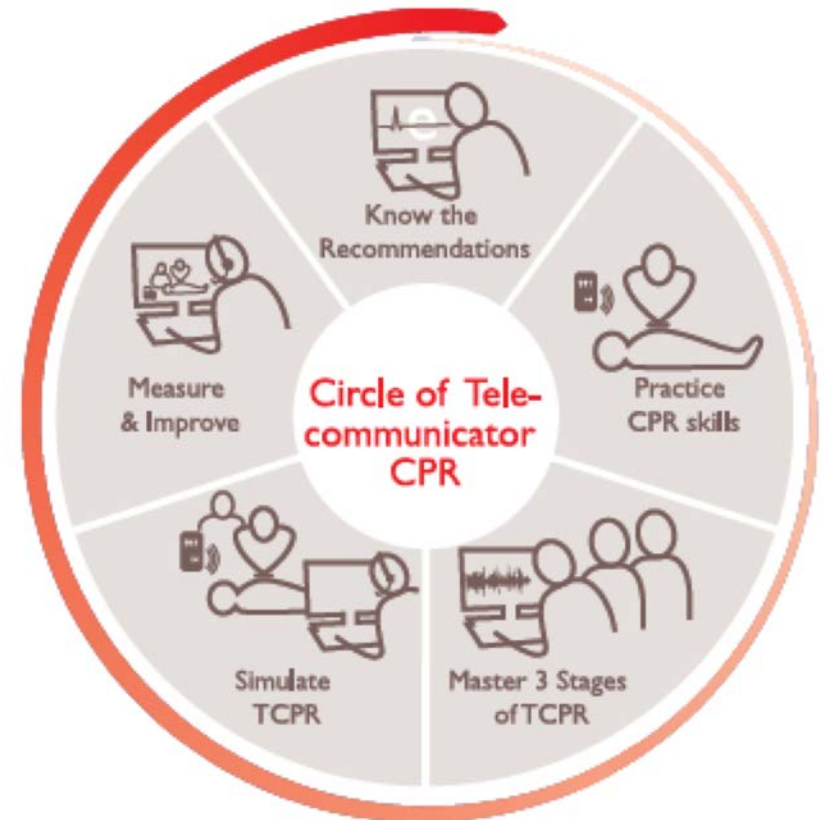
2017 American Heart Association Recommendations

- Percentage of total OHCA Cases Correctly Identified by Telecommunicators
- Percentage of Recognizable OHCA Cases Correctly Identified by Telecommunicators
- Percentage of Telecommunicator-Recognized OHCA Receiving T-CPR
- Median Time Interval Between 9-1-1 Call and OHCA Recommendation
- Median Time Interval Between 9-1-1 Call and First Telecommunicator-Directed Compression

T-CPR TRAINING

Circle of Telecommunicator-CPR

-  Segment One: Know the Recommendations
-  Segment Two: Practice T-CPR
-  Segment Three: Learn from others
-  Segment Four: Simulate T-CPR
-  Segment Five: Deliver T-CPR



HIGH-PERFORMANCE CPR DEFINED

An expertly performed, choreographed and measured OHCA response consisting of individual and team performance that meets or exceeds current evidence-based performance recommendations.

Guideline Recommendations

- Chest compression fraction
- Compression depth
- Compression rate
- Compression release
- Compression pauses
- All should all be optimized for ALL adult and pediatric resuscitations

COMMON CPR QUALITY ISSUES

Four Common Challenges

Recognition of CPR quality issues and causes is an essential step toward improving performance.

Avoiding delays, pauses and interruptions in CPR






Optimizing compressions technique

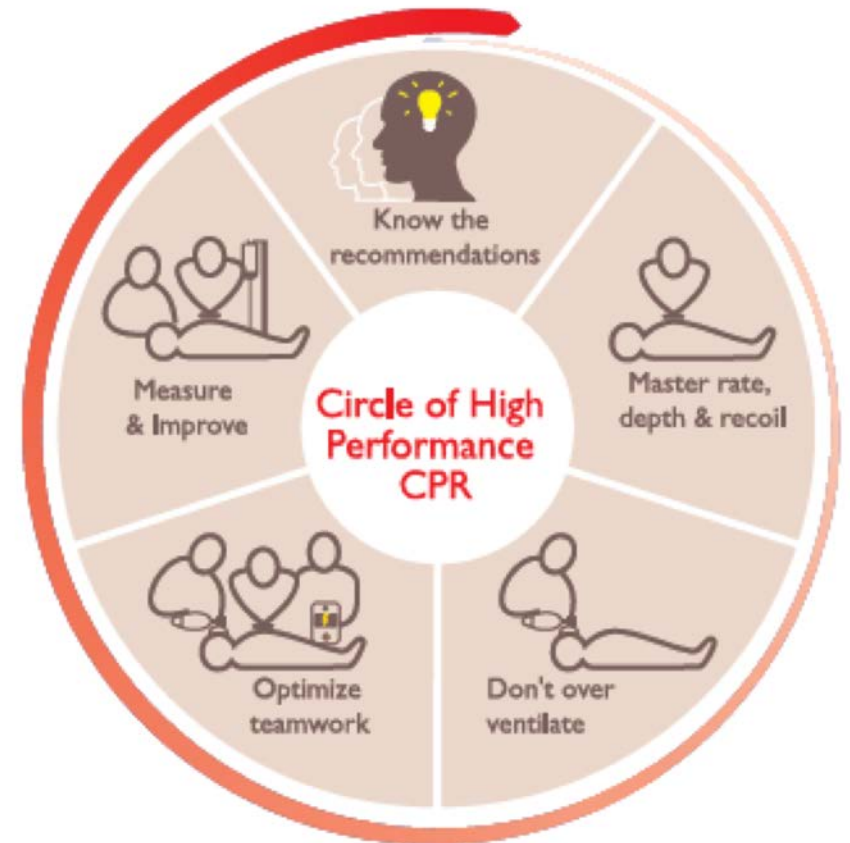
Managing the effects of airway and ventilation techniques

Managing chaos

HP-CPR TRAINING

Circle of High-Performance CPR

-  Segment One: Cognitive
-  Segment Two: Compression Skills
-  Segment Three: Ventilation Skills
-  Segment Four: Team Skills
-  Segment Five: Clinical Practice



MEASURE

Continuous CPR Education and Quality Improvement

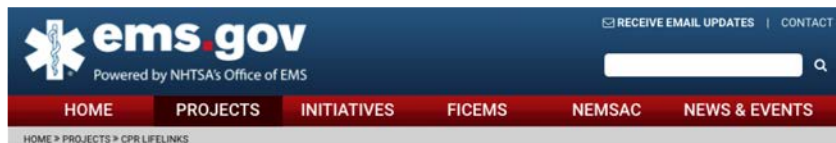


IMPROVE

Materials: Where to Find Them

▶ <https://www.ems.gov/projects/cpr-lifelinks.html>

▶ https://www.911.gov/project_telecommunicator-assistedCPR.html



- PROJECTS**
- ▶ CPR LifeLinks
 - ▶ EMS Agenda 2050
 - ▶ AACN Training Course
 - ▶ EMS Compass
 - ▶ Fatigue in EMS
 - ▶ Transportation of Children
 - ▶ Provider & Patient Safety
 - ▶ Stop the Bleed Initiative
 - ▶ Using EMS Data
 - ▶ NEMSIS

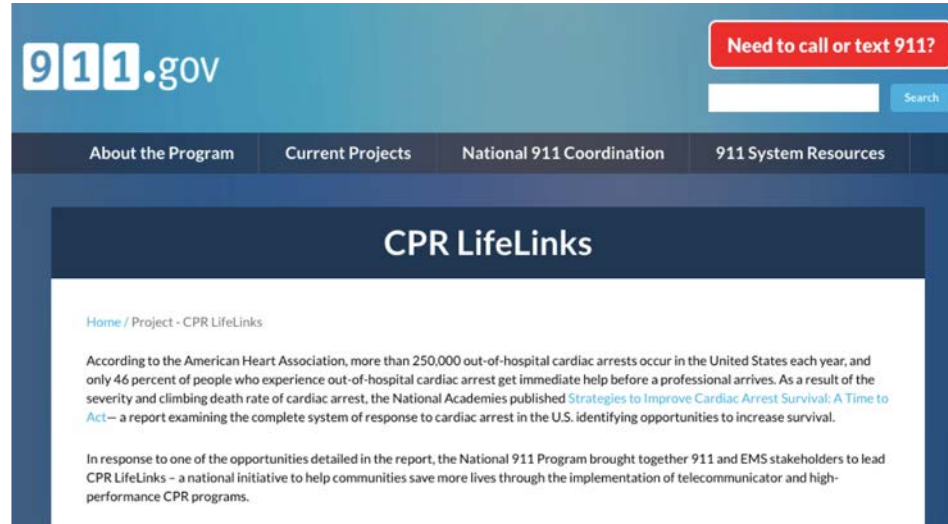
CPR LifeLinks



CPR LifeLinks is a national initiative to help communities save more lives through the implementation of telecommunicator and high-performance CPR programs. With help from the community, a how-to guide will be developed for EMS and 911 agencies to implement programs to improve cardiac arrest survival rates.

Background

According to the American Heart Association, more than 250,000 out-of-hospital cardiac arrests occur in the United States each year, and only 46% of people who experience out-of-hospital



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EMSFOCUS

WHAT YOU CAN DO

- **Build a relationship** between your 911 center and EMS agency – start the CPR dialogue.
 - **Download the CPR LifeLinks Toolkit** – available on [ems.gov](https://www.ems.gov) and [911.gov](https://www.911.gov) in Spring 2018.
 - **Share the word** about CPRLifeLinks and the resources available. They can help any agency get started, regardless of size or location.
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THANK YOU

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