

## STEMI Reminders:

- 1) Early ECG in patients with chest pain.
- 2) Early notification to ED and activation of cardiac cath labs.
- 3) Early transmission of ECG by EMS to receiving hospital.
- 4) Early and rapid transport to an appropriate receiving hospital.

**Register Today**  
**AHA/Caruth AMI**  
**Advisory Symposium**  
**June 3rd and 4th, 2011**  
 Westin Park Central, Dallas  
 EMS - Nursing - Cath Lab  
 Staff - Physicians  
 CE will be available

### Dallas Caruth Committee Co-Chairs

#### Stakeholder Co-Chairs:

Ray Fowler  
 Michael Taylor

#### EMS Resources:

Kevin Cunningham  
 Craig White

#### Conference Planning:

Tami Kayea  
 Jennifer Ledbetter

#### Education:

Karen Pickard  
 Chris Weinzapfel

#### Quality Improvement:

Bob Hillert  
 Thomas Tierney

#### Protocols:

Chris Chiara  
 Mark Till

### AHA Dallas Caruth Staff

Wendy Segrest  
 Dawn Kregel  
 Russell Griffin  
 Leilani Stuart  
 Diana Ramirez

## Making an Impact on Heart Disease

### What is the Dallas Caruth Initiative?

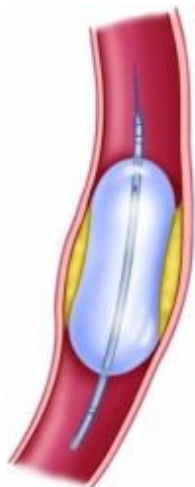
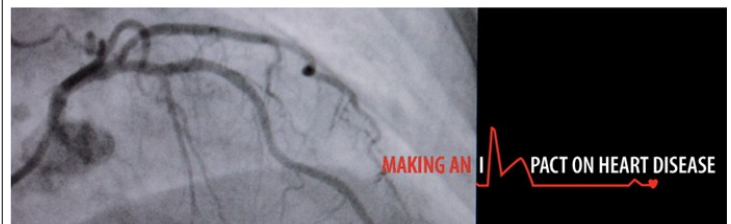
The SouthWest Affiliate of the American Heart Association was awarded grant funding from the W.W. Caruth Jr. Foundation to create a seamless and integrated heart attack emergency care system in Dallas County. The two-year project, which will be managed by AHA staff, will allow the AHA to work closely with 15 hospitals and 25 EMS agencies in Dallas County to coordinate and streamline protocols and to reduce the amount of time it takes for heart attack patients to receive lifesaving treatment. This innovative regional collaboration will work to ensure equipment compatibility, consistent training and uniform protocols for both transporting and treating heart attack patients across the region.

[www.heart.org/caruth](http://www.heart.org/caruth)

### Focus on Data

Collection of accurate and quality data is an important goal of the Dallas Caruth Grant. For the first time in North Texas STEMI research, the University of Texas Health Science Center Houston in coordination with the American Heart Association will pair pre-hospital patient care records with hospital Action Registry data to review and identify current trends in STEMI care. It is essential that all providers ensure thorough and complete documentation of each patient so that quality information can be assessed, and utilized to

develop our cardiac systems of care. One important metric that the Dallas Caruth Grant is measuring is the patient "Symptom Onset to Arterial Reperfusion" (SOAR). Through EMS and ED patient care records, identifying the true onset of symptoms through coronary artery reperfusion is a genuine means of identifying how long it takes for chest pain patients to seek and receive emergency cardiovascular intervention. Be sure to document in your patient care record when the symptoms started that led your patient to calling 911 or visiting your facility's ED.



## Important Meetings to Remember

AHA Dallas Office - 8200 Brookriver Drive, Classroom A  
 Conference Call - 1-866-506-5191 - Code: 335721#

- May 9th - 0730-0900 Conference Planning Meeting - Dallas AHA
- May 10th - 0730-0900 Protocols Meeting - Dallas AHA
- May 11th - 0730-0900 Education Meeting - Dallas AHA
- May 12th - 0730-0900 EMS Resources Meeting - Dallas AHA
- May 18th - 0730-0900 QI Meeting - Dallas AHA
- May 23rd - 0730-0900 Conference Planning Meeting - Dallas AHA
- May 25th - 1200-1300 AR-G Site Manager/User Conference Call (866-854-6779 - Code: 7929798)

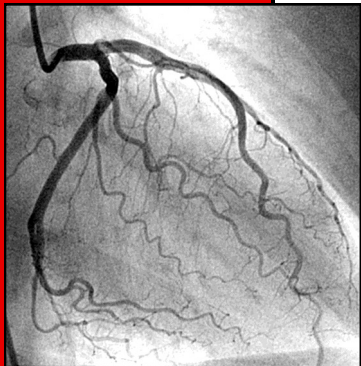
## QI Subcommittee Update

The QI subcommittee met on April 20<sup>th</sup> to review 4<sup>th</sup> Quarter 2010 data received from UTHSCH. They were asked to provide input on how the subcommittee would like to review data (e.g. blinded, unblinded, assign letter, etc.) They were also asked to provide input on the QI process once data is received and reviewed. Initial data was discussed and the committee will have a tremendous and important responsibility in assessing and making recommendations based on their findings.

The monthly newsletter "Dallas Caruth Update" has been created for hospitals and EMS agencies to inform their personnel of upcoming meetings and any important information regarding the grant. We encourage you to share this newsletter with your colleagues at work.

Approved recommendations from all subcommittee meetings are now posted on the Caruth website. A contact list of educators from each organization has been created to implement approved recommendations to ensure that

all approved Dallas Stakeholder recommendations are accessible. The AHA is distributing over \$1.2 million dollars to the participating EMS agencies and hospitals over two years to provide patient data and participate in the Caruth initiative.



### Join us at the Conference

We are excited to announce the 2011 Caruth AMI Symposium on June 3rd and 4th at the Westin Park Central in Dallas. This innovative conference is designed for any individual involved in STEMI care. Nationally recognized speakers in EMS and hospital systems will present at this wonderful opportunity to network and learn cutting edge techniques in AMI care.

Register Online Today  
[www.heart.org/caruth](http://www.heart.org/caruth)



## EMS Resources Committee Update

The EMS Resources committee has identified and reviewed equipment needs for the 25 EMS agencies in the Dallas Caruth grant. Upon review of 12 applications for supplemental funding for equipment allocation the EMS resources committee selected five programs for total amount of \$50,995 in supplemental equipment funding. These recommendations were presented to the Dallas Stakeholder Group and were sup-

ported unanimously by the voting members.



The EMS Resources Subcommittee will now focus attention towards supporting

existing equipment networks and strengthening the technology resources that are shared between agencies. With the funding provided by the grant we will be able to assure that all 25 EMS agencies and 15 participating hospitals will be capable of transmitting and receiving 12-lead ECG's. This is an important task in our grant goals and essential in developing our STEMI system of care in Dallas County.

## EMS Chest Pain / ACS Guideline

Through tremendous effort and collaborative work within the Protocol Subcommittee we are excited to share the 1st clinical guideline that has been unanimously supported for regional implementation by the Dallas Stakeholder Group voting members. Please view the "Chest Pain / Acute Coronary Syndrome EMS Guideline" that was

developed by physicians, nurses and paramedics for use by our EMS agencies in the Dallas Caruth Grant. The EMS Chest Pain / ACS Guideline provides thorough clinical protocols that ensures early recognition, early cardiac cath lab activation, and early transport of patients whom are suspected of having cardiac events. The distri-

bution of this protocol is tremendously important in the objective of providing one common regional protocol for multiple agencies to use across our Dallas County STEMI system of care. We encourage you to implement and integrate this protocol into your current practice.

# EMS Chest Pain / ACS Guidelines

## ACS Signs & Symptoms

Chest pain- any non-traumatic pain between the jaw & umbilicus  
 Chest pressure, discomfort or tightness  
 Complaints of "heart racing" or palpitations  
 Bradycardia  
 Syncope  
 Weakness in patients > 45 years old  
 New onset stroke symptoms  
 Difficulty breathing (without obvious cause i.e. asthma or CHF)

## STEMI Criteria

**ST segment elevation of  $\geq 1$  mm in 2 contiguous leads with or without signs & symptoms of ACS**

## 12 Lead EMS ECG Criteria

Patients > 20 years old experiencing any ACS signs & symptoms

**OR**

Any age patient with ACS signs & symptoms AND a history of:  
 HTN Cardiac disease  
 Smoking Diabetes mellitus  
 Severe Obesity High Cholesterol  
 Recent recreational drug use

**When in Doubt, Obtain an ECG**

F	Minimize patient exertion	F
F	Apply Oxygen to maintain SPO <sub>2</sub> $\geq 94\%$	F
B	324 mg Aspirin PO Chewed, not swallowed	B
B	Obtain 12 Lead ECG within 10 minutes of patient contact	B
P	<b>If STEMI Criteria met, activate CATH LAB, transmit ECG &amp; immediately initiate transport to appropriate PCI capable hospital.</b>	P
I	Establish IV access at TKO rate or saline lock	I
<b>SBP &gt; 110 mmHg</b>		
P	0.4 mg nitroglycerin SL tablet or SL spray q 5 minutes until pain is gone or max 3 doses. Maintain SBP > 110 mmHg	P
P	Pain unrelieved by Nitro: Morphine 2-4mg slow IVP max 20mg <b>OR</b> Fentanyl 1mcg/kg q 15 minutes max 200 mcg	P
<b>SBP &lt; 110 mmHg</b>		
F	Shock position	F
I	250ml NS bolus to achieve SBP $\geq$ 110mmHg. Max 1 L NS, monitoring breath sounds	I
M	Morphine or Fentanyl analgesic per medical control	M

Legend		
F	First Responder	F
B	EMT-Basic	B
I	EMT-Intermediate	I
P	Paramedic	P
M	Medical Control	M

### Code STEMI Considerations:

- 1) Keep patient connected to monitor & 12 lead cables when brought into ED for physician evaluation
- 2) If possible, remain on EMS stretcher and monitor in ED
- 3) Prepare to be escorted to CATH Lab on EMS stretcher and monitor to expedite transfer of care to CATH LAB nurse/physician.

<b>If SBP falls &lt; 110 mmHg in response to treatment:</b>		
P	Discontinue standing nitroglycerin & analgesic treatments	P

<b>If C/P is thought to be stimulant induced:</b>		
P	Diazepam 2.5-5mg slow IVP max 10mg <b>OR</b> Midazolam 2.5-5mg slow IVP max 5mg or IN max 10mg	P

### PEARLS:

- Females, diabetics and geriatric patients often have atypical signs/symptoms, or only generalized complaints
- Remember Erectile Dysfunction drugs are now being used to treat pulmonary hypertension
- Do not administer Nitroglycerin in any patient who has used Viagra (sildenafil) or Levitra (vardenafil) in the past 24 hours or Cialis (tadalafil) in the past 36 hours due to potential severe hypotension
- If possible, establish a second IV on STEMI patients DURING TRANSPORT ONLY

# AHA Dallas Caruth AMI Advisory Symposium Agenda

## Friday, June 3, 2011

1200	Registration Posters & Exhibits				
1300	Welcome and Introductions	Todd Gray & Ray Fowler			
1310	Transport & Transfers from the rural region	Tim Henry	1310	“What You Don’t Know, Might Hurt Them!”	Bob Page
1400	ACLS Update	Dawn Kregel Russell Griffin	1400	ACTION Registry - GWTC	Loni Denne
1455	Break Posters & Exhibits				
1505	The Challenge Within: Overcoming Hospital Barriers	Eva Kine Rogers	1505	“Wide and Tachy” In Lead II, You Got No Clue!	Bob Page
1600	Mission Lifeline	Chris Bjerke	1600	STEMI-OUR system of care: A Big Town Perspective with a Small Town Compassion	Todd Gray
1700	Networking Reception Posters & Exhibits				
1730	Caruth Overview with Dinner CFT Recognition Presentation Keynote Speaker	Brent Christopher James Jollis	How Do You Start a STEMI Systems of Care in Your Area?		

## Saturday, June 4, 2011

0700	Registration and Continental Breakfast				
0800	Welcome and Introductions Todd Gray & Ray Fowler				
0810	Keynote speaker LA Story – Lessons Learned from more than 6,000 STEMIs Bill Koenig				
0900	Caruth Data-Jim Langabeer Caruth Overview				
0930	Subcommittee Co-Chairs				
1000	Break & Exhibitors & Posters				
1015	STEMI Experience in Boston Lessons from the East	Peter Moyer	Rapid STEMI ID (Continuous Course 1015-1400)	Jo Haag	
1105 1115	Therapeutic Hypothermia David Marks				
1200	Lunch & Exhibitors & Posters				
1245	Anticoagulation: What’s New	Henry I. Bussey	Evidence Based Medications for post MI Care	Paul St. Laurent	
1335	Pre-activation from the Field	Chris Bjerke	ACC/AHA Guidelines for the AMI Patient	Robert Wozniak	
1430	Panel Discussion-Cath Lab Tech, ED Nurse, Paramedic, Pharmacist, & Physician (ED & Cardiologist)				
1530	Adjourn				