

Preparing for Emergencies
Stepping Out of Our Silos and into Integrated Care

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Disclosures

I have no conflicts of interest to disclose regarding the content or ideas in this presentation.

I must disclose:

I am a paramedic who considers himself a patient advocate and that supports a collaborative multidisciplinary approach to providing care to the sick and injured.

Aside from cited material any opinions and views are solely mine

About Myself

- Nationally Registered and State Licensed Paramedic
- State of Connecticut EMS-Instructor
- Captain of Professional Standards and Training at New Britain EMS
 - 16 years of service
- CCSU Alum... Go Blue Devils!!!
- Pursuing Grad Degree in Clinical Mental Health Counseling

Objectives

- Need for Planning for Response to Emergencies
- Recommendations Planning and Equipment
- Exchange of Info and Transfer of Care

Why Plan?

- Participation in high school sports has risen for past 29 years to all time Record high of 7,980,886 from 2017-2018.
- While life threatening injuries are rare, they are unpredictable and when they do occur care must be seamless.
 - Life depends on it
 - In the public eye
 - People expect it
- So many variables...venue, system of care, levels of care, access to care, timing, severity, etc.

NATIONAL FEDERATION OF STATE HIGH SCHOOL ASSOCIATIONS. High School Sports Participation Increases for 29th Consecutive Year, 2018, <https://www.nfhs.org/articles/high-school-sports-participation-increases-for-29th-consecutive-year-2018>

Why Plan?
Duh!

It is the Right Thing to Do!!!!

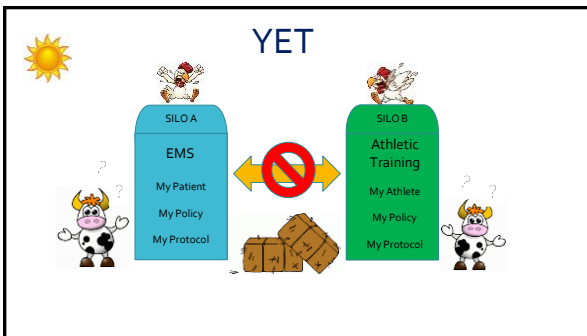
Doesn't it just kind of make sense???

National Athletic Trainers' Association Position on Emergency Planning (2002)

"Each institution or organization that sponsors athletic activities must have a written emergency plan. Should be comprehensive and practical yet flexible enough to adapt to any emergency"

"Must be written and distributed to all trainers, attending MDs, AT students, safety personnel coaches...Should be developed in consultation with the local emergency medical services personnel"

*Anderson J, Courson, R., Klienert D., McLoda, T. *National Athletic Trainers' Association Position Statement: Emergency Planning in Athletics. Journal of Athletic Training* 2002, 37 (1) 99-104.



Planning in Order to Overcome Conflict

- Studies revealing lack of trust between ATs and EMS
- Systems of Care Collide
 - Policies
 - Protocols
 - Medical Model Approach
- EMS Systems of Care (*What you need to know*)
 - 1st responders
 - Transport
 - Paramedic

Planning in Order to Overcome Conflict

Lack of Trust

EMS Personnel's Perceptions of the Roles and Responsibilities of Athletic Trainers During On-Field Injury Management (2017)

- Survey Methodology 115 EMS Personnel 18 states
- Findings:
 - EMS protocols determine how EMS personnel respond and handle situations on the field
 - 29% say AT should "assist" EMS
 - 50% say AT should work with EMS
 - 17% say AT should Assist "when needed"
 - 29% say AT should provide assessment and care and determine if EMS is needed
 - EMS Providers lack knowledge regarding the emergency care domain in AT education
 - Personal training, conditioning, sports injuries, many lacked knowledge of AT training.
 - Previous Experiences with AT guide overall trust of profession

Cline, S., Cotter, J., Diakogorghiou, E., Jusino, D.L. (2017) Emergency Medical Services: Personnel's Perceptions of the Roles and Responsibilities of Athletic Trainers During On-Field Injury Management. *Athletic Training and Sports Care*, 36(1) 154-162.

Planning in Order to Overcome Conflict

Lack of Trust

Study 1: EMS Personnel's Perceptions of the Roles and Responsibilities of Athletic Trainers During On-Field Injury Management (2017)

Findings / Implications

- More training, communications, practice together
- Emergency Planning
- Introduction prior to game time
- Suggest it is the AT responsibility to reach out to EMS as EMS works with the entire population.

Cline, S., Cotter, J., Diakogorghiou, E., Jusino, D.L. (2017) Emergency Medical Services: Personnel's Perceptions of the Roles and Responsibilities of Athletic Trainers During On-Field Injury Management. *Athletic Training and Sports Care*, 36(1) 152-161.

Planning in Order to Overcome Conflict

Lack of Trust

Study 2: Mutual Trust between Certified Athletic Trainers and EMS Personnel (2015)

- Survey Methodology 1,202 participants (517 AT / 685 EMS)
- Return to play decisions?
- Who's in charge?
- Skills as they relate to CPR/AED, Concussion Assessment, sports injury management, car accidents, fractures, etc.

Hardy, R., English, E., Siegel, C. (2015) Mutual Trust Between Certified Athletic Trainers and EMS Personnel. *Annals of Sports Medicine and Research* 2(3), 1050.

Planning in Order to Overcome Conflict

Lack of Trust

Study 2: Mutual Trust between Certified Athletic Trainers and EMS Personnel (2015)

- Findings
 - Significant lack of trust because of inaccurate beliefs about each other abilities
- Implications
 - More concerted effort by ATs to educate EMS about level of education, competency, ability to assess patient
 - Reach out to EMS partners
 - Introduce at games
 - Develop Emergency Action Plans
 - In service Training

Handy, R., Englehart, E., Stapp, C., (2015) Mutual Trust Between Certified Athletic Trainers and EMS Personnel. *Annals of Sports Medicine and Research* 1(3), 109.

Planning in Order to Overcome Conflict

Lack of Trust

Investigation #1: The Athletic Trainer's Role in Providing Emergency Care in Conjunction With EMS (2012)

- 42% ATs have encountered at least one on the field dispute with EMS in providing care to injured football players
 - Spine boarding / Equip Removal, Exertional Heat Stroke
- Investigation used focus groups to answer the following:
 - Perception of EMS Personnel and the role of the athletic trainer?
 - Lack of understanding / Lack of exposure
 - Prevention, strength training, exercising, unaware of their protocols
 - How can EMS personnel and athletic trainers work together to optimize care?
 - Improved Communication
 - Introduction and Explanation of how they function

Applegate, K., Cas, D., Marek, C., Mazerolle, S., Pagnotta, K. (2012) Athletic Trainer's Role in Providing Emergency Care in Conjunction With the Emergency Medical Services. *International Journal of Athletic Therapy & Training*, 17(1), 39-44.

Planning in Order to Overcome Conflict

Lack of Trust

Investigation #1: The Athletic Trainer's Role in Providing Emergency Care in Conjunction With EMS (2012)

- Conclusions
 - Pre-Season Meetings
 - Meet prior to games at standbys
 - Emergency Action Plans
 - Shared story form Arkansas where they developed a cool first transport after protocol with EMS

Applegate, K., Cas, D., Marek, C., Mazerolle, S., Pagnotta, K. (2012) Athletic Trainer's Role in Providing Emergency Care in Conjunction With the Emergency Medical Services. *International Journal of Athletic Therapy & Training*, 17(1), 39-44.

Planning in Order to Overcome Conflict

Systems of Care

- Each provider has a professional association responsible for producing evidence based research and best practices that we use as our road map for treatment
- Sometimes Protocols intersect (SMR, Helmet Removal, stay and play/load and go)
- As outlined prior lack of trust and understanding of each others capabilities
- Different models of medicine with different approaches based on very different response conditions

Planning

Background on EMS System of Care

- Do you know who is responding?
 - EMR v EMT v Paramedic
 - Volunteer v Career
 - Tiered response versus single provider system
 - System volume and availability of resources

Where do we Start?



*"Remember both athletic trainers and EMS are on the same side-both are medical professionals who have the best interest of the patient in mind."**

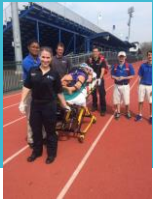
*Drop the Egos**

*Real Knowledge is to know the extent of one's ignorance.
-Confucius*

Practice Humility

* Brunetti, A (2017) In an Emergency. Training and Conditioning.

Where do we Start?



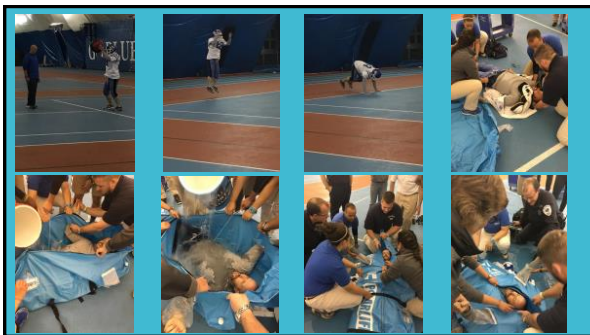
- Ride Along
- Shadows
- Information Sharing and Planning Meetings / EAP
- Drills
- Pre Game Time Outs
- Case Rounds
- Shared Continuing Education

What should an emergency action plan consist of?



- Coordinated Approach to get the right people to the right place when they are needed.*
- Define all potential responders
- Communications: Activation of 911, EMD Process, arrival instructions
- Manifest of onsite emergency equipment and where it is located
- Site Maps, Ingress / Egress, Helicopter landing zones, best approach
- Breakdown based on venue location (Gym, football field, etc.)
- Information on areas hospitals
- Mass Casualty Planning
- Responding for patron versus responding for athlete
- Debrief / Case Review

*Pettit, B. (2005) Athletic Trainers and EMS Collaboration is Best for Injured Athletes. EMS1.com, Oct 10, 2015.



Pre Event Time Out

National Athletic Trainers' Association Official Statement on Athletic Health Care Provider "Time Outs" Before Athletic Events

- Meet prior to game time to discuss EAP and roles
- Communication
- Ambulance and Personnel staging
- Destination facilities (may be dependent on state EMS regulation)
- Equipment present? Location? Working?
- Acute issues that could effect plan (weather/crowd/traffic)

National Athletic Trainers' Association Official Statement on Athletic Health Care Provider "Time Outs" Before Athletic Events. <https://www.nata.org/sites/default/files/inline-files/2019-02/0219-02-01-01.pdf>. Accessed February 09th 2019.

CENTRAL CONNECTICUT SPORTS MEDICINE

EMERGENCY ACTION PLAN FOR DEPARTMENT OF ATHLETICS

CENTRAL CONNECTICUT STATE UNIVERSITY
New Britain, Connecticut

NEW BRITAIN
EMERGENCY MEDICAL SERVICES, INC.

SUPPORT SERVICES DIVISION

Special Operations Incident Action Plan:
CCSU Football @ Arute Field

EMERGENCY MEDICAL SERVICES
411 E. MAIN ST.
NEW BRITAIN, CT 06460

RISK:	HIGH RISK
POTENTIAL:	MODERATE RISK
FREQUENCY:	LOW

Planning for Emergencies

NATA Preventing Sudden Death


- Asthma
- Catastrophic brain injuries
- Cervical spine injuries
- Diabetes
- Exertional heat stroke
- Exertional hyponatremia
- Exertional sickling
- Head-down contact in football
- Lightning
- Sudden cardiac arrest

Case, D. et al. (2013) National Athletic Trainers' Association Position Statement: Preventing Sudden Death in Sports. Journal of AT, 41(3) 96-118

Planning for Emergencies

- AED
- Oxygen / BVM (if comfortable with technique) / Basic Airway Adjuncts / Suction
- Scoop
- Splints
- Beta agonist for reactive airway (MDI) / Anaphylaxis: Epi Pen (if Permitted)
- Bleeding control Supplies
- Fast acting carb / glucagon injector (if permitted)
- Immersive Cooling Devices

The Handoff



- Nature of the Emergency
- Injuries / Interventions
- History including Meds and Allergies
- Basic Demographics / Emergency contacts for hospital

What is EMS doing/thinking?

- Initial Assessment
- Sick v Not Sick
- Additional Resources
- Life saving / stabilizing treatments & interventions
- Treatment on scene v transport
- Destination Determination
- Transport and ongoing assessment / interventions

References

Applegate, K., Casa, D., Marsh, C., Mazzeo, S., Pagnotta, K. (2012) Athletic Trainers' Role in Providing Emergency Care in Conjunction With the Emergency Medical Services. *International Journal of Athletic Therapy & Training*, 17(2), 39-44.

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