

Participant Assessment of a Wilderness First Aid Course

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Introduction

- ▶ Lay caregivers asked to perform broader array of medical skills
 - Increasing numbers of brief training courses to provide these skills
 - Wilderness First Aid (WFA) course among those gaining popularity



Goals of WFA

- ▶ Increase safety of wilderness activity participants
 - Prevent injuries & illnesses
 - Treat injuries & illnesses



Challenges of WFA

- ▶ Lifesaving skills rarely used by participants
 - Under extreme stress
 - In a remote setting
 - With limited resources
- ▶ Range from basic first aid skills to moderately advanced lifesaving skills
 - From splints to “sucking chest wounds”
- ▶ Train concepts such as triage, management and transportation of sick and injured, and ongoing care
- ▶ Short time frame, reasonable cost

Challenges of Course Evaluation

- ▶ ATLS as model
 - Effective for professional caregivers
 - Gap between professional care and lay care
- ▶ Evidence-based studies difficult to undertake
 - Wilderness emergencies rare
 - Differing environments
 - Differing provisions and dispositions
 - Broad range of events
- ▶ Little evidence-based literature exists

Our Study

- ▶ Dr. Steve Donelan, a leader in wilderness emergency care, suggests
 - “Encourage alumni of your courses to e-mail you accounts of wilderness emergencies”
- ▶ Our study intends to identify injuries and illnesses encountered by alumni, assess the course’s usefulness in addressing these problems, and solicit advice for improving the course.



Methods

- ▶ Survey of students from previous 3 years of courses (March '08, April '09, April '10)
 - 45 students contacted via mail/email
 - Average time between students' taking the course and participating in survey is 16 months



Survey

1. Since taking the course, have you experienced a situation requiring first aid?

- Yes Please answer questions 1a – 1c
- No Please answer question 1d

1a. Please describe:

1b. Was the material from WFA class (please circle)

Very
helpful

Helpful

Moderately
helpful

Slightly
helpful

Not at all
helpful

1c. What would have been helpful that was not covered or that was under covered in the course?

1d. How helpful was the course to your confidence in your skills to deal with first aid situations?

Very
helpful

Helpful

Moderately
helpful

Slightly
helpful

Not at all
helpful

Survey

2. What, if anything, have you changed about the way you lead in wilderness situations since you took this course?

3. Based on your experience in the 16 hour course, what do you feel would be an appropriate length for the WFA course (in hours)?

<12

12-14

14-18

18-20

>20

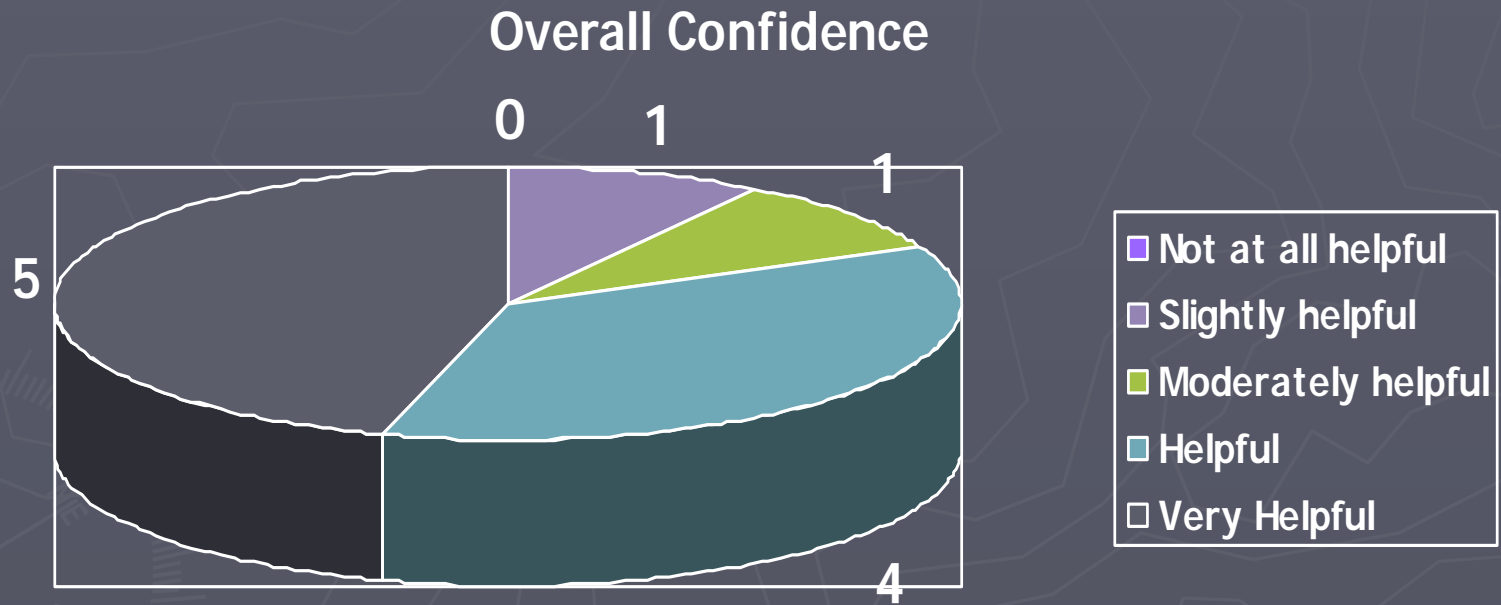
4. Please list any other thoughts or suggestions for the overall improvement of the course.

Results

- ▶ 15 out of 45 students responded (33%)
- ▶ 9 people have experienced a wilderness first aid situation

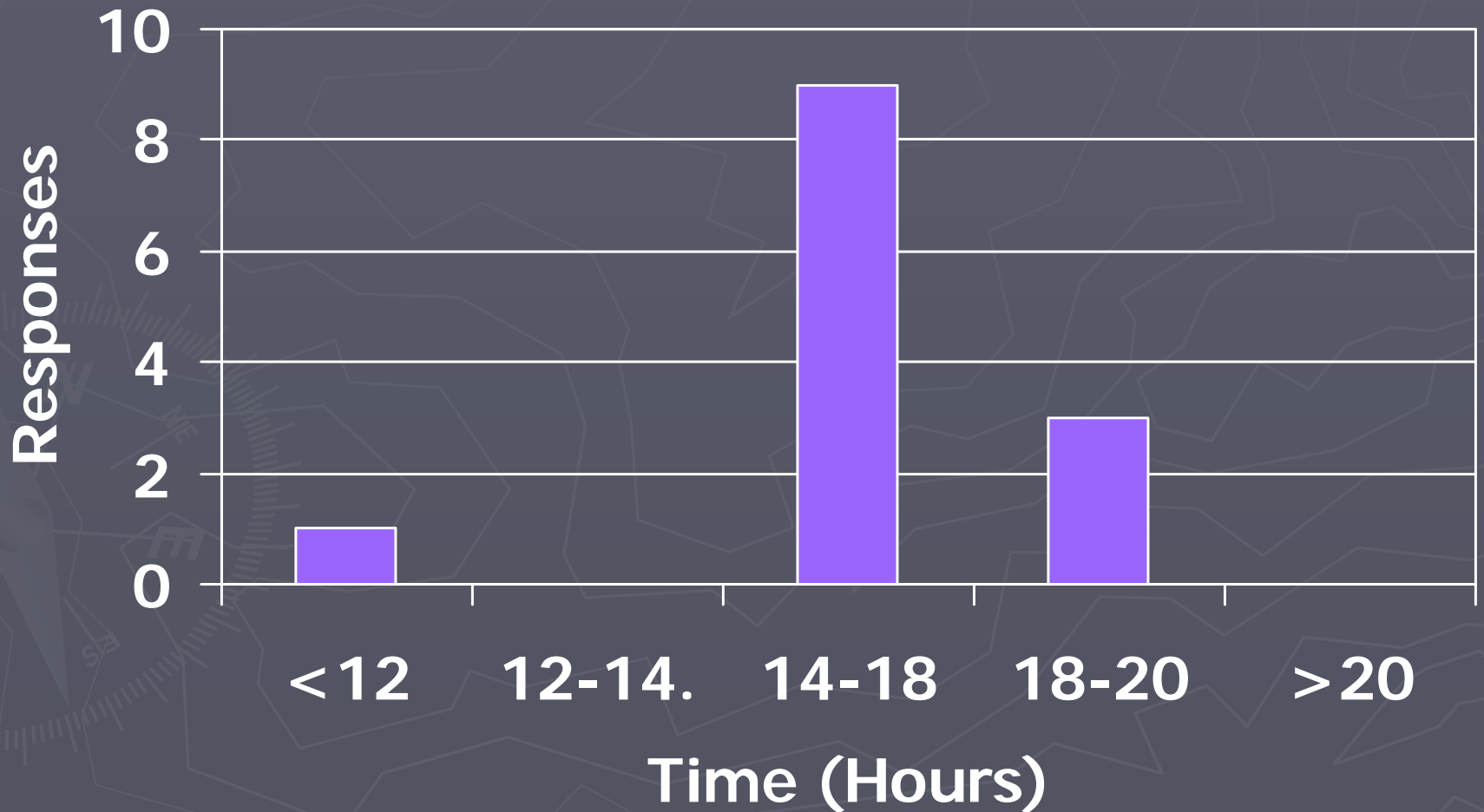


Results



Results

Course Length



Results

- ▶ Cases included insect bites, injuries to extremities & unspecified sites, overuse problems, and a travel problem
- ▶ Mild: 11
- ▶ Moderate: 5
- ▶ Serious: 3
- ▶ Serious problems included:
 - Concussion
 - Dehydration
 - Chest pain



Results

- ▶ Change in leadership style
 - Increased awareness of problems and preventative measures: 7
 - Increased awareness of and/or improved team process: 4
 - Improved general confidence: 4

Examples of comments

- ▶ I am more careful because you really are in a bad situation if you were to get hurt
- ▶ I am more aware of my physical needs and those of people around me before setting out on a trip, I carry proper first aid.
- ▶ We had a man go off a horse, hit his head, and go unconscious out on the trail.
- ▶ My niece had a tick embedded in her head. (I knew the correct way to remove it.)

Conclusions

- ▶ Limits of study
 - Small study
 - Limited response
 - No demographics
- ▶ First aid situations common
 - Mild and moderate most common, as expected
 - Serious problems occurred relatively frequently (3 out of 45 in only 16 months)
- ▶ WFA curriculum addresses common problems encountered by participants



Conclusions

- ▶ Problems for which the course was 'slightly helpful' or 'moderately helpful' were either not covered or very cursory in the course
 - These problems (overuse problems and a travel-related problem) will be considered for inclusion in future courses
- ▶ Open-ended questionnaires are a helpful method for collecting feedback and suggestions for improvement in the course

Comments

- ▶ Comment: The course made me realize the usefulness of Benadryl in a first aid kit. I wish I'd brought some on a recent trip to Norway. My sister had the hives and her Benadryl was running low and when we went to the pharmacy, we found out Norway doesn't have it at all and nothing that strong over-the-counter. It pays to be self-sufficient everywhere you go, not just the wilderness.
- ▶ Developed shin splints – not an acute situation but very painful.
- ▶ My niece had a tick embedded in her head. (I knew the correct way to remove it.) I dropped an ATV battery on my finger.
- ▶ Multiple wb abrasions. A-worker with chest pain – monitored and transported.
- ▶ Minor cuts/abrasions, strains (nothing serious)
- ▶ A sprained ankle, a camper wouldn't drink filtered water on a backpacking trip, insect stings
- ▶ We had a man go off a horse, hit his head, and go unconscious out on the trail.
- ▶ caring for a person with severe dehydration, caring for blisters, cuts, muscle pain from backpacking
- ▶ minor cuts and scrapes, had to take child to ER for sutures and debridement too big for me to handle.
- ▶ I had to self-administer first aid to a gash on my shin after a portage went wrong.
- ▶ The shin splints – most important for me is how to prevent them (e.g. pace yourself – don't go too fast – stretch both before, during and after long descents)
- ▶ References for SAR or evacuation methods – just as additional FYI
- ▶ What to do if evacuation will take multiple days – i.e. let's say I'm in the wilderness and we are 5-6 days in and something happens. Longer-term treatment?
- ▶ It seemed very basic. I would have liked to go more in depth. Something on weather prediction could be nice.
- ▶ Much more hands on practice and scenario practice.
- ▶ I already understood well enough how to deal with the above mentioned situations.
- ▶ I think that the class was very thorough.
- ▶ Basic first aid such as stopping/controlling bleeding. I have that info from military training, so I'm ok.
- ▶ Engage others in assessing and being aware of safety and first aid resources.
- ▶ I feel more confident now about going on wilderness camping trips, although have not been yet since the course.
- ▶ More aware, but less apprehensive about potential issues (if that makes sense)
- ▶ Helped me make a more useful first aid kit.
- ▶ I am more careful because you really are in a bad situation if you were to get hurt.
- ▶ Don't know yet as I was confident having been a BSAT leader.
- ▶ Nothing. This is my 3rd recert.
- ▶ I am more aware of my physical needs and those of people around me before setting out on a trip, I carry proper first aid.
- ▶ Look at group size activity and what could be needed in the first aid kit.
- ▶ The biggest thing that I have learned from the course is don't get hurt out in the wilderness.
- ▶ Taking prior precautions so things don't end up in a situation that first aid would be necessary.
- ▶ Things to include in a first aid kit. More prepared.
- ▶ have not changed to many things about how I lead in wilderness situations, I am more confident about handling things that might happen
- ▶ I am more conscious of people mentioning discomfort. I feel that if they go as far as mention something, it could be bad. We had a couple people mention headaches and made them hydrate.
- ▶ Perhaps supplement the WFA class with on-line course training which precedes the class itself.
- ▶ Don't really have any – I thought it was very well done. The scenarios were extremely valuable – I learn by doing and repetition.
- ▶ See 1c. (References for SAR or evacuation methods – just as additional FYI) – Additional info on evac methods would be useful/of interest.
- ▶ On the scenarios tell us what you would have done – what we did right/wrong – there way not enough feedback.
- ▶ The location was great and I really enjoyed the food.
- ▶ Having first aid – General Course & CPR should be prerequisite requirements. (I enjoyed the course and overall feel confident (maybe more) if I get into a situation to use the skills.)
- ▶ There should have been more effort to limit all the stories and extra random talking from many of the participants. Many of the students seemed more interested in one-upping each other with "trail" stories than in actually practicing what was being taught. At one point, my co-worker and I started timing how much of each hour was spent listening to others tell stories. We often approached the 20 minute mark each hour over a 3 hour period. I often felt like most people were there to try to impress each other instead of to learn.
- ▶ Very good course looking forward to renewal class.
- ▶ To be honest, the biggest thing that I got from the course is to not get hurt out in the wilderness. If you do get hurt, or come up to someone, keep them warm, splint it, and go