National Park Service
U.S. Department of the Interior

Jay Shields
Chief Ranger
Visitor & Resource Protection
Olympic National Park
National Park Service

National Park Service
U.S. Department of the Interior

Coming to the Rescue!

What Happens During an Emergency Response to a Serious Incident in a National Park?

NATIONAL PARK SERVICE
Search & Rescue

Objectives

Upon completion participants will be able to:

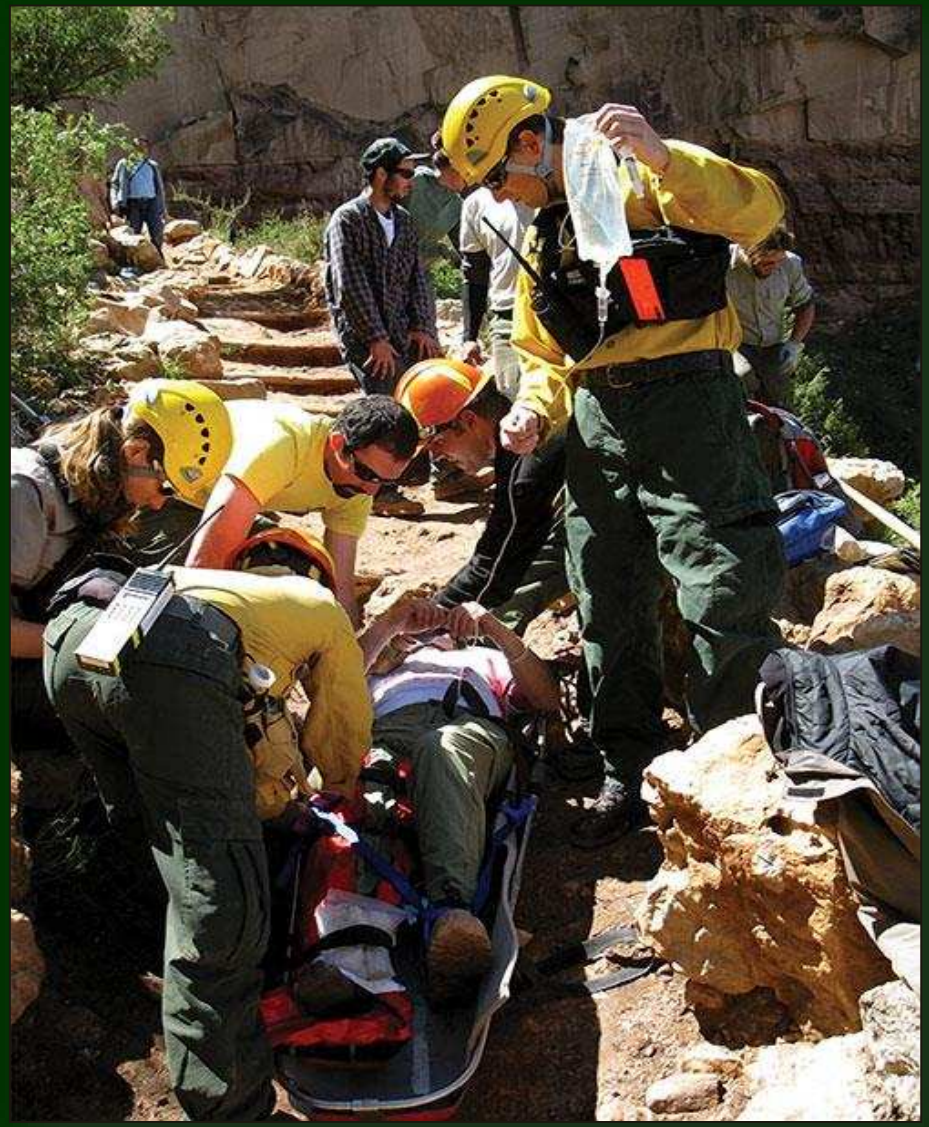
1) Understand the history and applicability of SAR in the NPS

2) What is ICS (incident command system) and how is it applied to a SAR incident.

3) Understand who will be responding when a response occurs for you or for someone in your group.

4) Plan ahead….but what does that really mean?

National Park Service
U.S. Department of the Interior



Incident Management Statistics

$4 million spent annually on SAR Service-wide

3,453 annual SAR incidents

84,000-hours from park staff and volunteers

Incident Management Needs

Well Trained and Qualified Staff

- ✓*Operational Leadership*
- ✓*Emergency Medicine*
- ✓*Search & Rescue*
- ✓*All-Hazards Incident Management*

Supplies & Equipment

Reliable Communications & Notification Procedures

Strong Leadership Infrastructure

So what are we actually talking about from a numbers standpoint?

National Park Units – 417

Reported SAR Incidents - 3,453

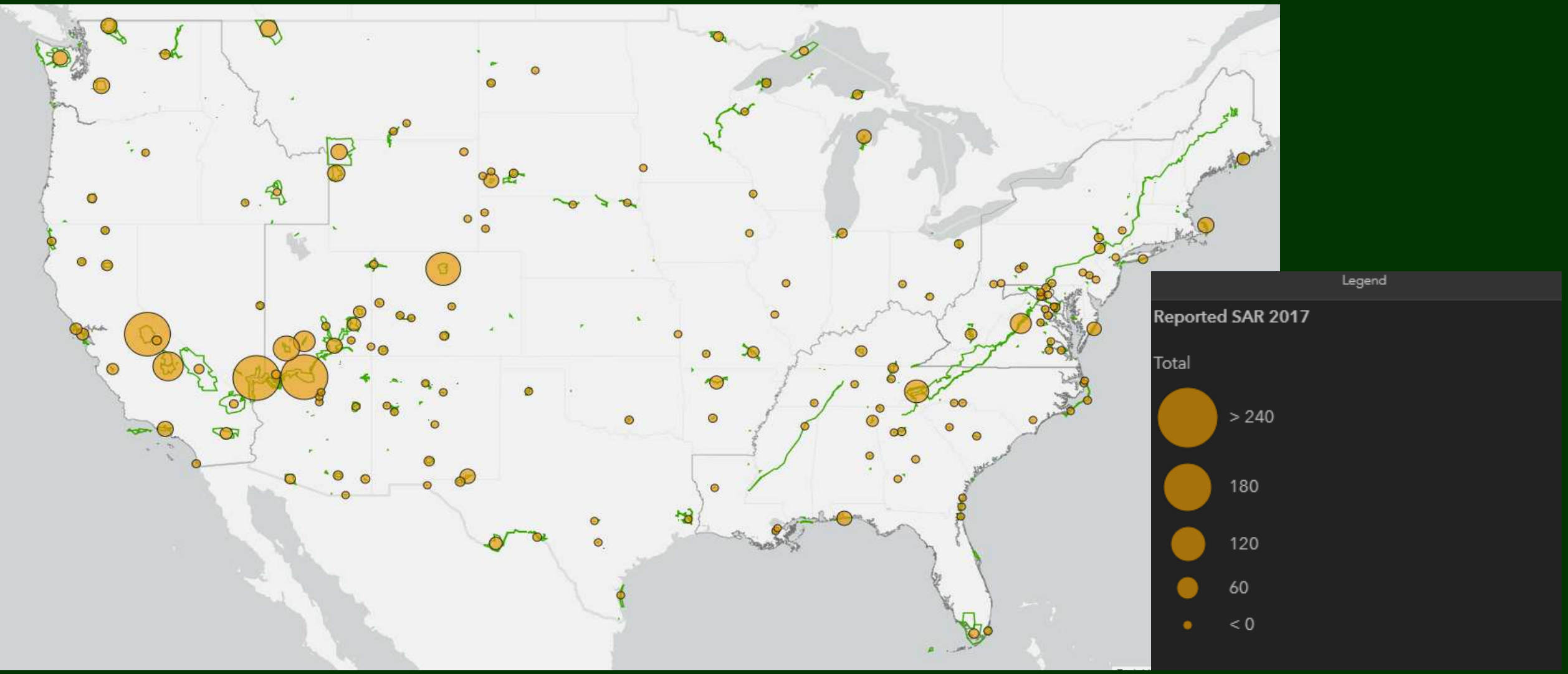
(all reportable incidents requiring a search or a rescue or both)

Fatalities – 182 *(those that die during or after the incident, directly related to that incident)*

Saved – 1,000 *(those that would have died without intervention)*

2017 Statistics

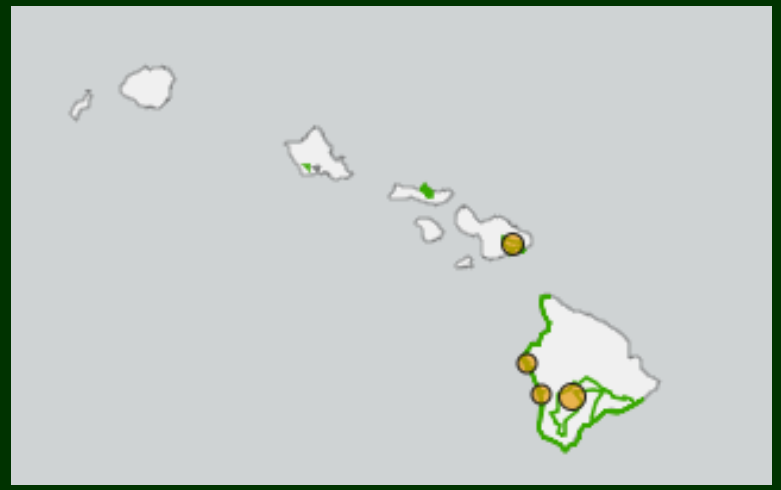
National Park Service
U.S. Department of the Interior



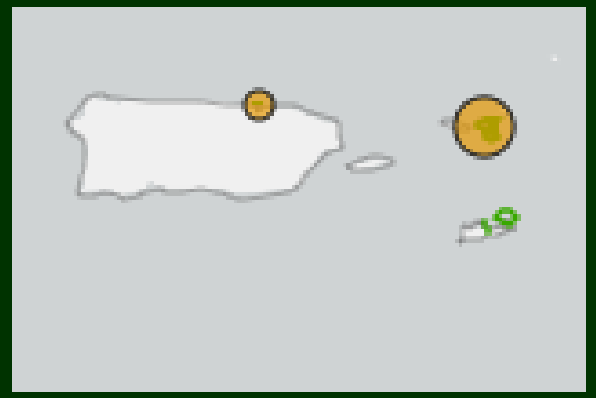
https://arcg.is/fKbuS

National Park Service
U.S. Department of the Interior

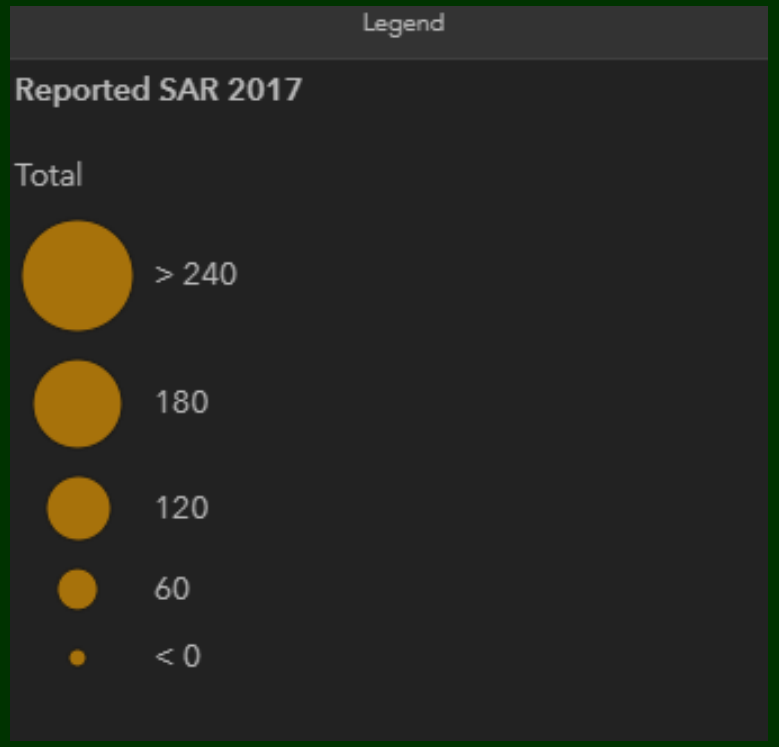
Alaska



Hawaii

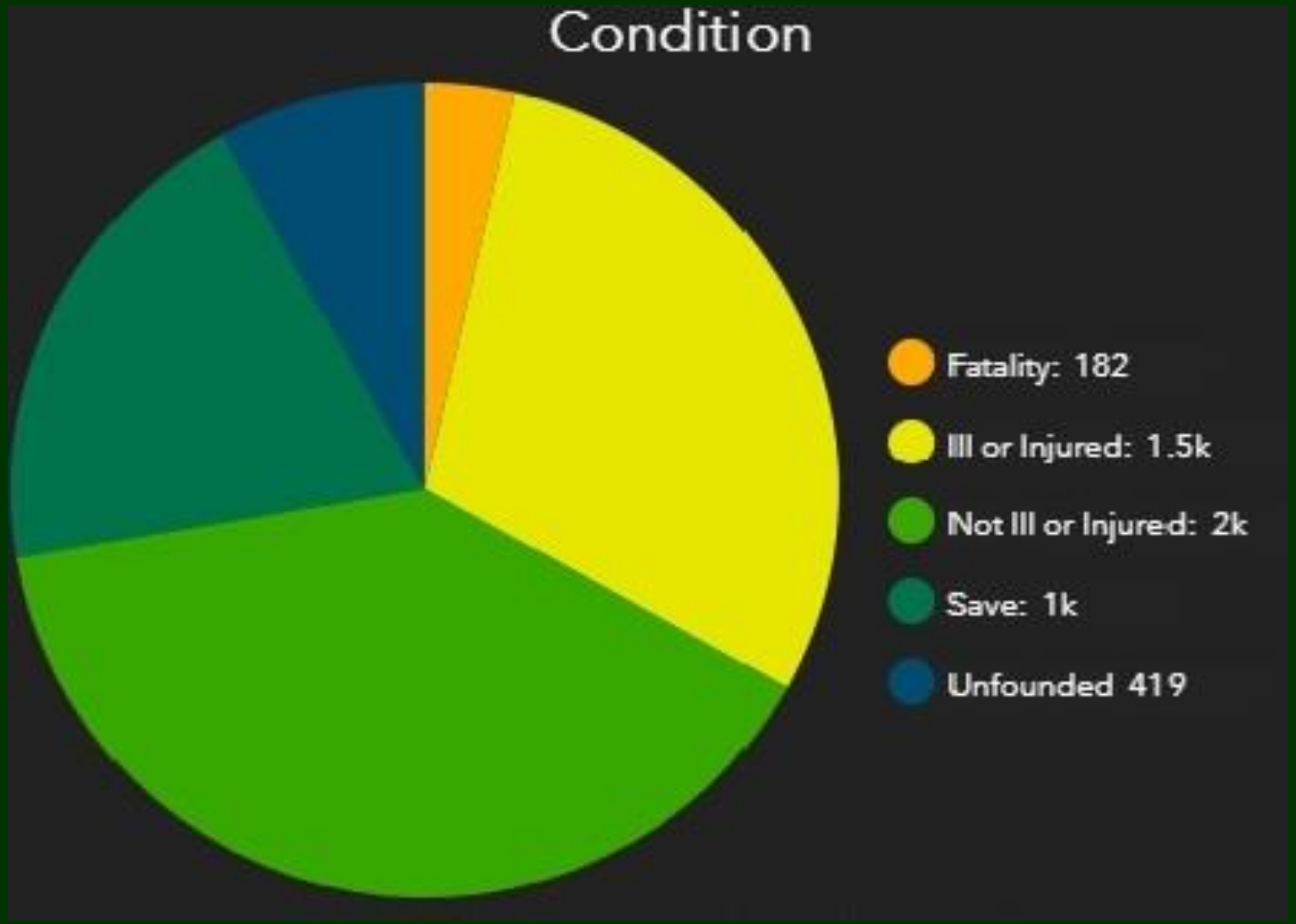


US Virgin Islands



https://arcg.is/fKbuS

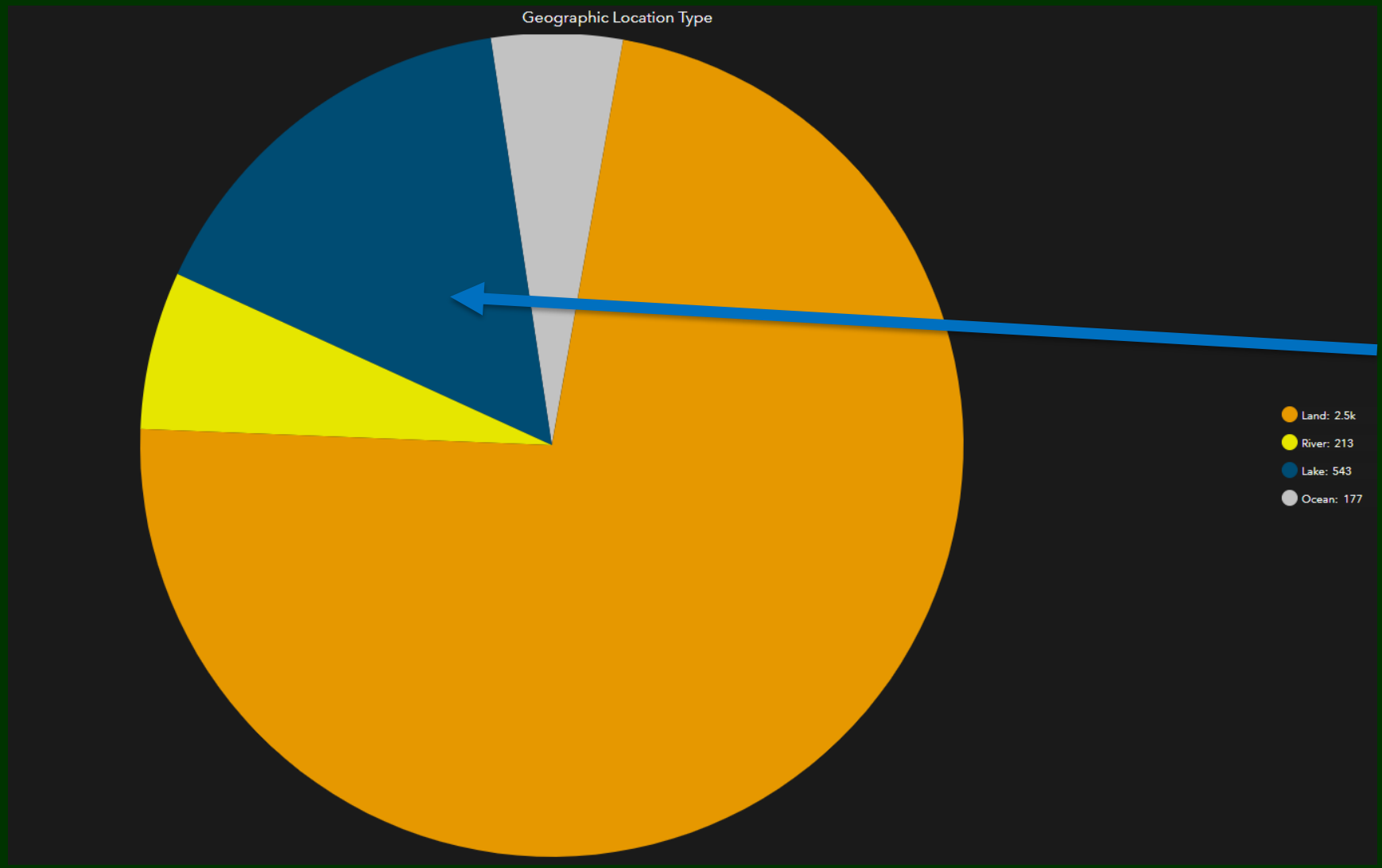
National Park Service
U.S. Department of the Interior



The largest use of SAR was for those not injured or ill, meaning they were either lost, or were overdue and resources were “launched”.

https://arcg.is/fKbuS

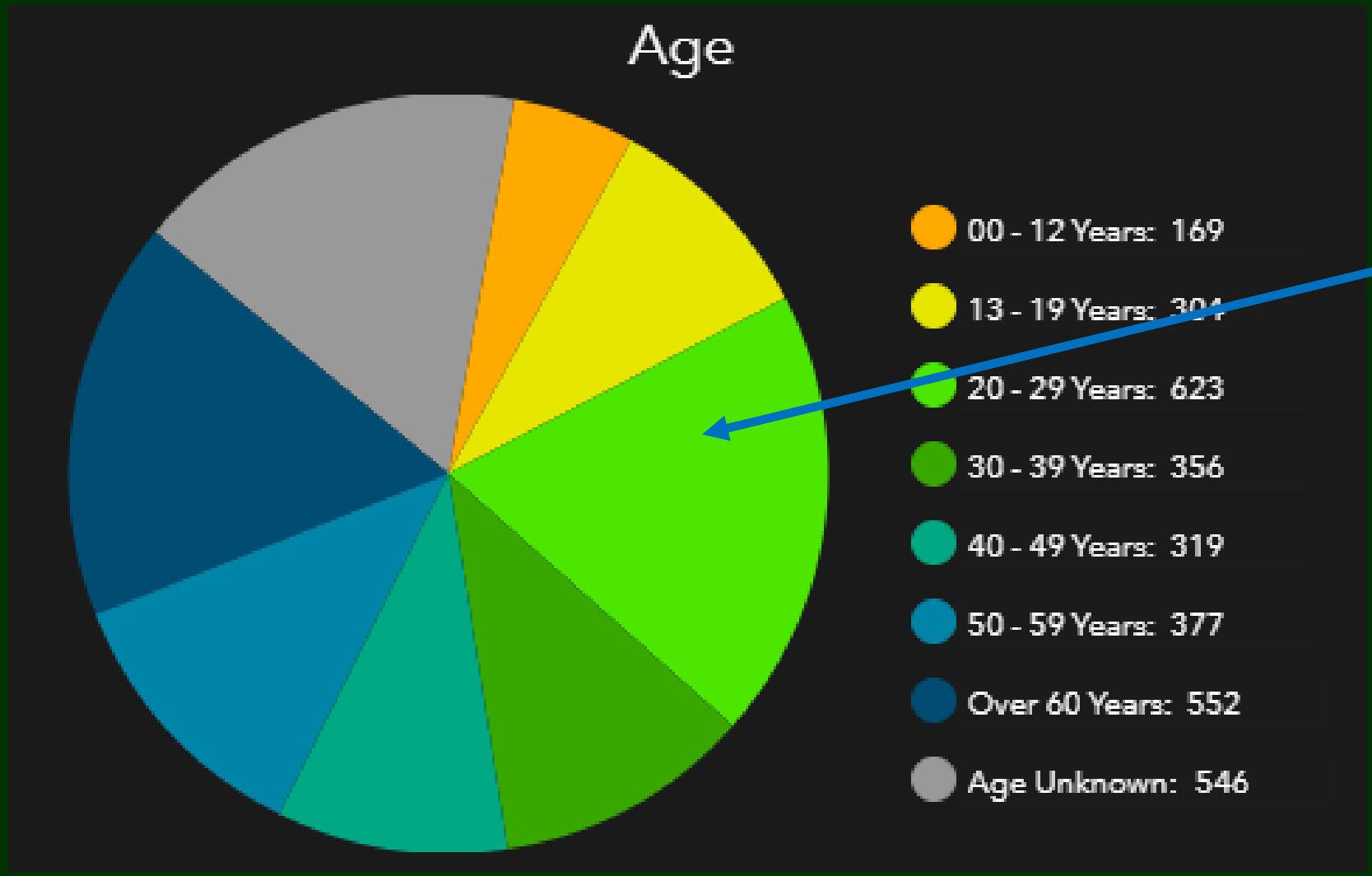
National Park Service
U.S. Department of the Interior



Most SAR's still occur on land, however water SAR's have continued to grow.

https://arcg.is/fKbuS

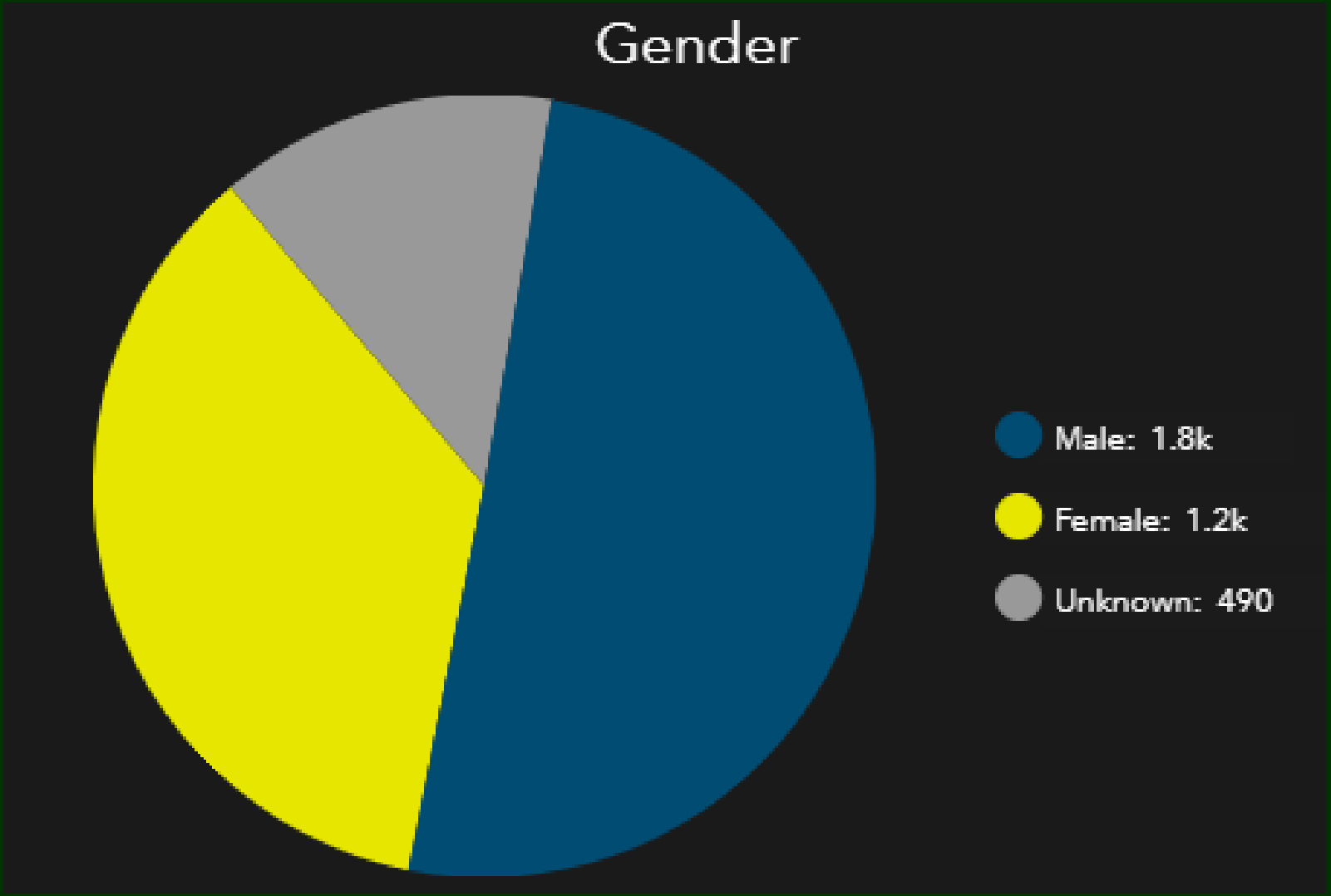
National Park Service
U.S. Department of the Interior



Largest age group identified are between **20-29** years old and over **60** years of age.

https://arcg.is/fKbuS

National Park Service
U.S. Department of the Interior



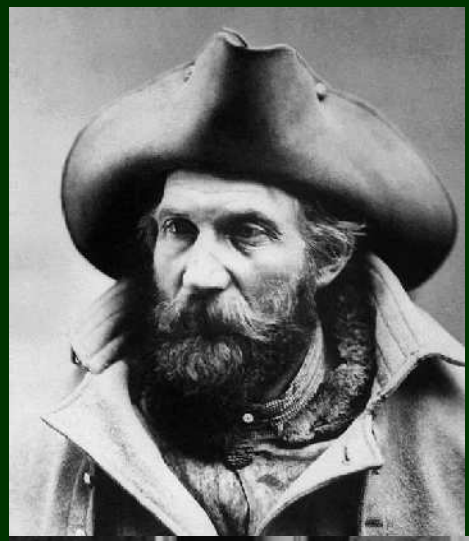
Data shows males represent 49.7% and females 36.2% of SAR related incidents.

https://arcg.is/fKbuS

National Park Service
U.S. Department of the Interior

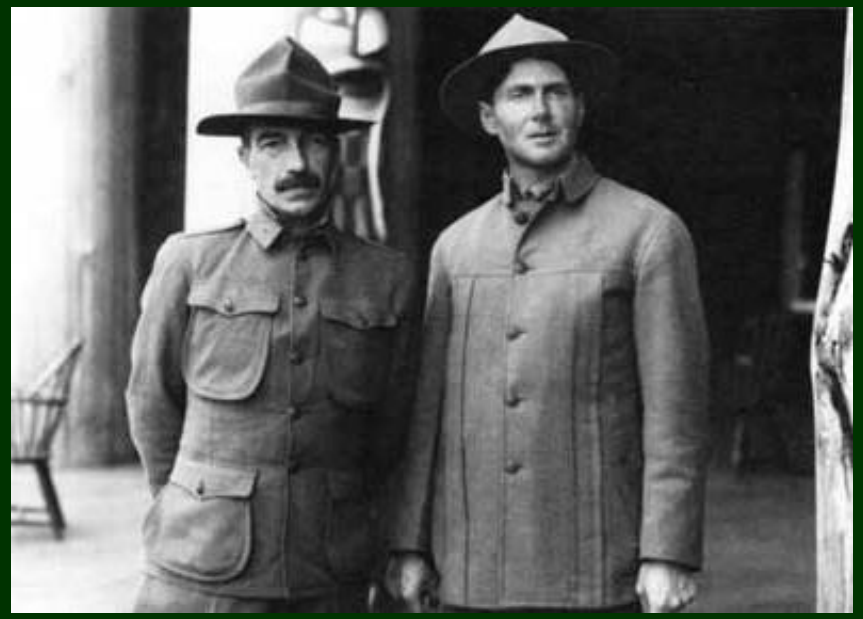
Brief History

1849 DOI Establishment



1872 Yellowstone

1890 Yosemite

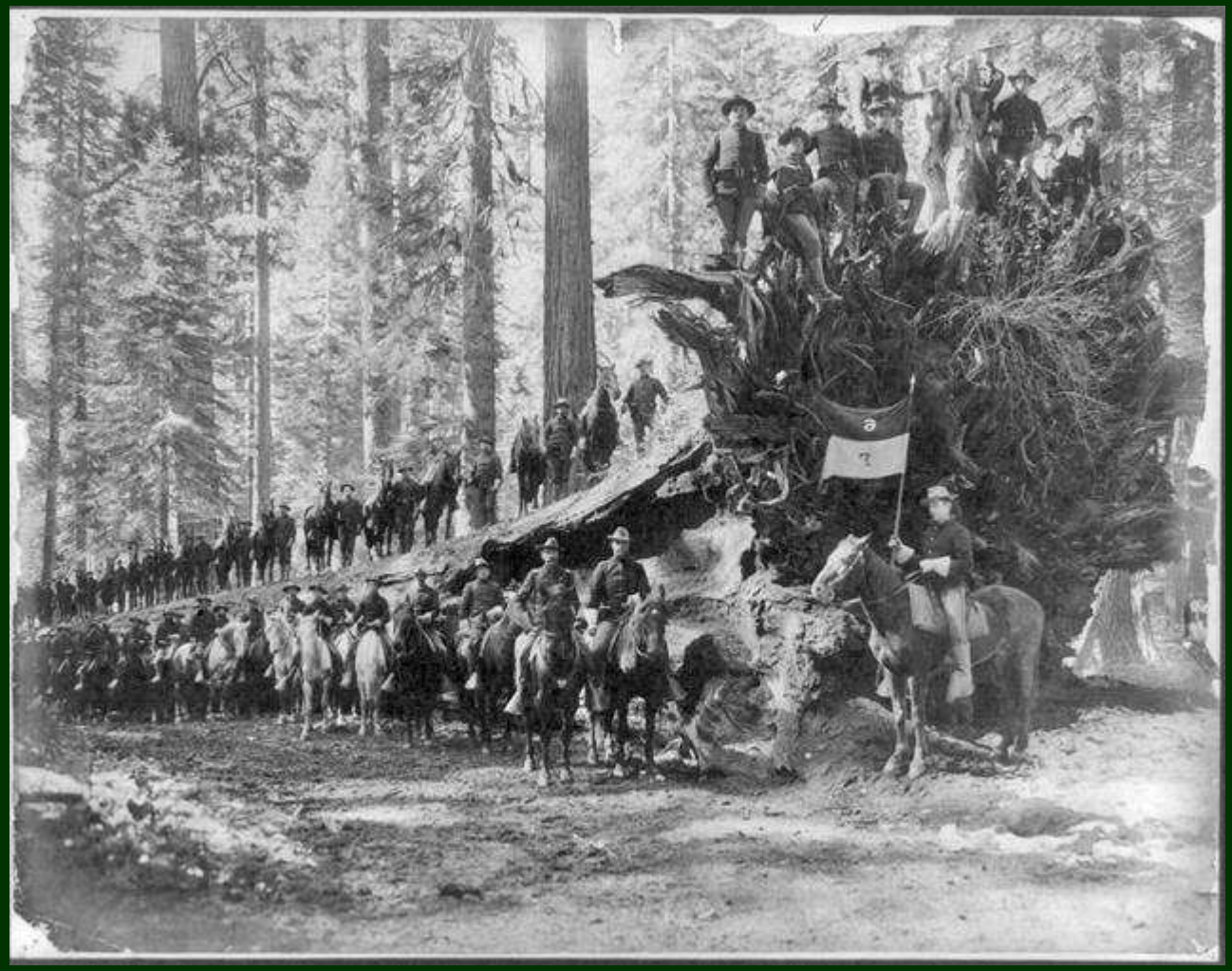


1906 Antiquities Act

1916 Organic Act

With the establishment of a national park system, visitation grew slowly in the first 40 years but has grown exponentially to current numbers…which continues to trend upwards.

2017 numbers?



National Park Service
U.S. Department of the Interior

As visitation increased so did the need for rescues.

The grand rescue 1967, Grand Tetons

First Yosemite climbing fatality

Mt Rainier crevasse rescue

National Park Service
U.S. Department of the Interior

"The saving of human life will take precedence over all other management actions as the Park Service strives to protect human life and provide injury free visits" …..

NPS Management Policies, 2006, Section 8.2.5.11

This doesn't mean we place others into peril…including rescuers

Rangers make individual search and rescue decisions based on the following considerations:

- Safety
- Human resources
- Economic resources

U.S. Court of Appeals for the Tenth Circuit - 949 F.2d 332 (10th Cir. 1992) – Johnson vs US

National Park Service
U.S. Department of the Interior

LE + EMS + SAR + Fire = Ranger

National Park Service
U.S. Department of the Interior

Due to the needs of a varied mission with limited personnel, the majority of the NPS's SAR and EMS responders are Federal Law Enforcement Officers

National Park Service
U.S. Department of the Interior

Olympic

Zion

Rocky Mountain

New River Gorge

Mount Rainier

National Park Service
U.S. Department of the Interior

Combine our trained officers + partner agencies; we can insert resources just about anywhere….

Yosemite

Grand Canyon

Yosemite

Olympic

NE Region

National Park Service
U.S. Department of the Interior

….at anytime

National Park Service
U.S. Department of the Interior

From the highest peaks on the continent to the lowest and narrowest desert slots, the NPS is capable of extraordinary patient access.

National Park Service
U.S. Department of the Interior

The NPS has a robust EMS response capability, to the extent that the NREMT recognizes the NPS as the "51st state" for certification purposes.

National Park Service
U.S. Department of the Interior

The NPS is one of four primary agencies for SAR in the USA (DOD, USCG, FEMA, NPS). The NPS coordinates with other federal, state, tribal, and local governments to assist with immediate response nationwide under ESF (emergency support functions).

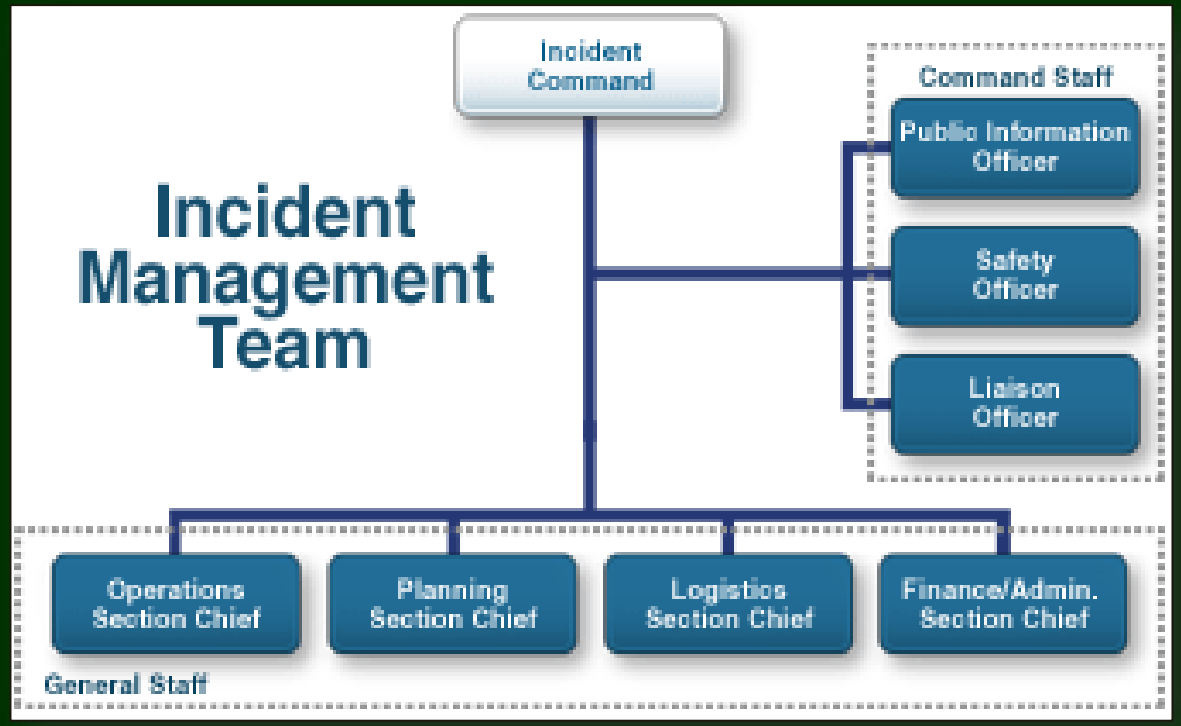
National Park Service
U.S. Department of the Interior

Incident Command System

ICS is a standardized way of control, coordination and command of emergency responders with a common terminology and hierarchy that all agencies prescribe to.

National Park Service
U.S. Department of the Interior

Incident Management Basics



ICS should be applied by all park programs for both small and large incidents, including special events!

ICS is a standardized, incident management approach that:

- ✓ Allows for the integration of facilities, equipment, personnel, procedures, and communications operating within a common organizational structure.
- ✓ Enables a coordinated response among various partners, jurisdictions and functional agencies.
- ✓ Establishes a common process for planning and managing resources.

National Park Service
U.S. Department of the Interior

The Call Comes to us in many ways….

…….in a variety of means and from a variety of reporting parties…

- cell as a 911
- inReach
- Spot
- 3rd Party and 4th party
- Parent
- Spouse
- Friend
- Work
- NPS initiated

vernal

3rd party

IERCC

National Park Service
U.S. Department of the Interior

Personal Locator Beacons (PLB)

Do you or any in your group have one?

Is it registered?

Do you know how to use it?

http://cruising.coastalboating.net/Seamanship/PLB/IndexPLB.html

National Park Service
U.S. Department of the Interior

“I can’t go up and I can’t go down on the trail. I have 4 dogs and the tide is coming in in 3 hours….I also need help setting up my campsite, please come help me”

“ I don’t like bats so I ran and now I am lost…..I crossed a bridge, can you come get me?”

“Jill’s arm just fell off…..what do I do now!?”

“This device (spot) is great! Without this we never would have attempted this hike”.

What Happens next?

Who is going to respond?

How Long will it take?

What Role Does your organization play in the response?

National Park Service
U.S. Department of the Interior

What Happens next?	Info to IERCC, AFRCC, NPS Dispatch, etc.
Who is going to respond?	NPS, allied agencies, contract ships, volunteers
How Long will it take?	Hasty vs multi operational
What Role Does your organization play in the response?	Excellent scene size up, SSOAP notes, assist in carry out, pt care etc

National Park Service
U.S. Department of the Interior

Search vs. Rescue: What's the difference?

SEARCH

- ✓ Unknown location of subject
- ✓ Requires lengthy investigation
- ✓ ICS can quickly become robust
- ✓ Significant personnel needs
- ✓ Often multiple operational periods
- ✓ GIS mapping very helpful
- ✓ Subjects often locate themselves,
- ✓ Are located deceased, or
- ✓ Tragically, sometimes never located

RESCUE

- ✓ Typically known location of subject
- ✓ Requires limited investigation
- ✓ ICS tends to be more simple
- ✓ Moderate personnel needs
- ✓ Often completed in one operational period
- ✓ GIS mapping not usually needed
- ✓ BLS vs. ALS patient care
- ✓ Slow vs. rapid evacuation
- ✓ Aviation resources often needed

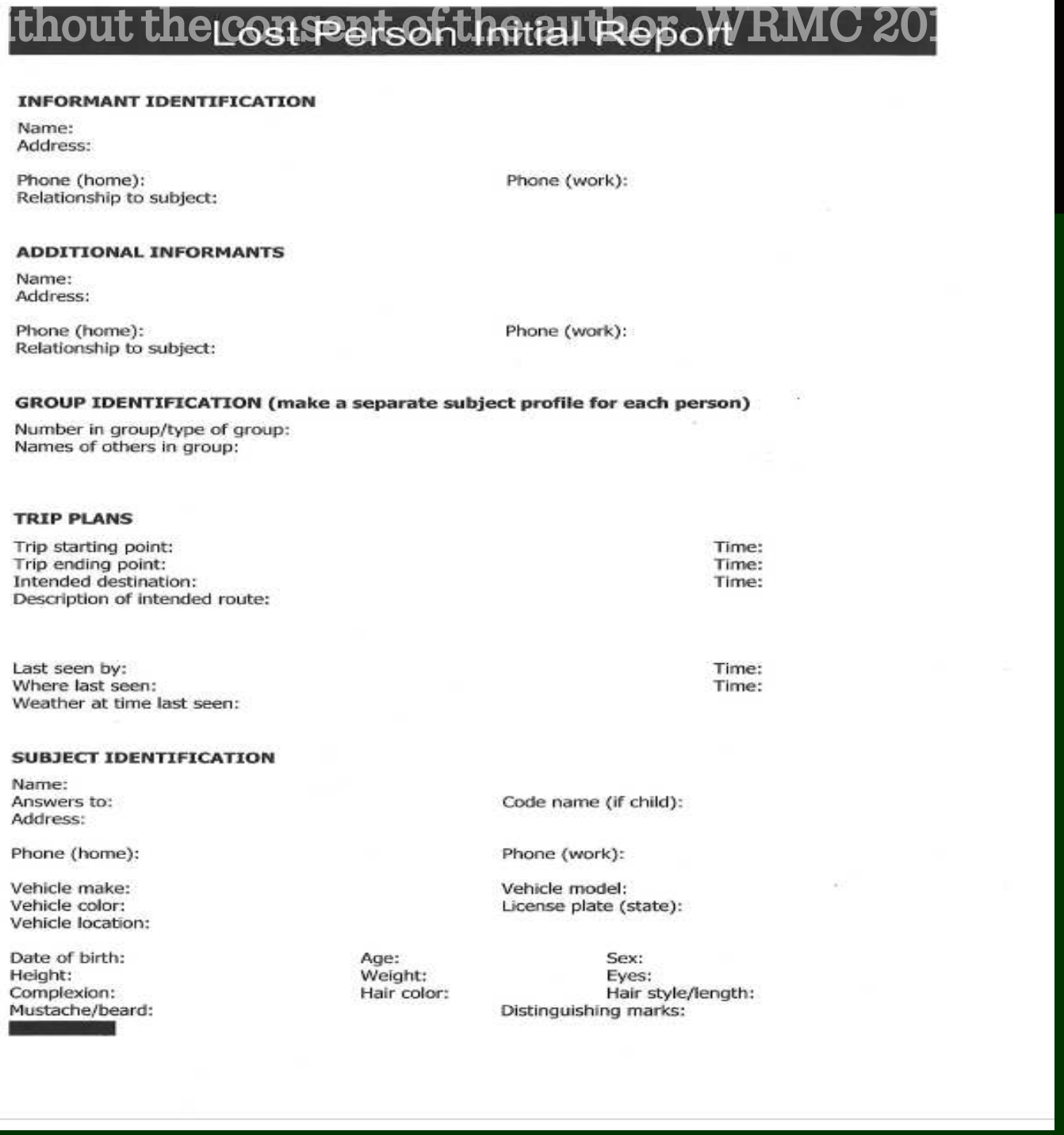
Determination of initial resources is made based upon reporting party (RP)

Resources are gathered and dispatched appropriately (*i.e. helicopters are not always dispatched*)

National Park Service
U.S. Department of the Interior

Initial investigation

A process to initiate what and how resources will respond and what we are facing



Lost Person Initial Report

INFORMANT IDENTIFICATION

Name:
Address:

Phone (home): Phone (work):
Relationship to subject:

ADDITIONAL INFORMANTS

Name:
Address:

Phone (home): Phone (work):
Relationship to subject:

GROUP IDENTIFICATION (make a separate subject profile for each person)

Number in group/type of group:
Names of others in group:

TRIP PLANS

Trip starting point: Time:
Trip ending point: Time:
Intended destination: Time:
Description of intended route:

Last seen by: Time:
Where last seen: Time:
Weather at time last seen:

SUBJECT IDENTIFICATION

Name:
Answers to: Code name (if child):
Address:

Phone (home): Phone (work):

Vehicle make: Vehicle model:
Vehicle color: License plate (state):
Vehicle location:

Date of birth: Age: Sex:
Height: Weight: Eyes:
Complexion: Hair color: Hair style/length:
Mustache/beard: Distinguishing marks:

National Park Service
U.S. Department of the Interior

SEARCH URGENCY RATING

FACTOR:	RATING:
1. AGE	
Very Young	1
Very Old	1
Other	2-3
2. MEDICAL CONDITION	
Known/suspected injured, ill or mental problem	1-2
Healthy	3
Known fatality	3
3. NUMBER OF SUBJECTS	
One alone	1
More than one (unless separated)	2-3
4. SUBJECT EXPERIENCE PROFILE	
Inexperienced, does not know area	1
Not experienced, knows area	1-2
Experienced, not familiar with area	2
Experienced, knows area	3
5. WEATHER PROFILE	
Past and/or existing hazardous weather	1
Predicted hazardous weather (less than 8 hours away)	1-2
Predicted hazardous weather (more than 8 hours away)	2
No Hazardous weather predicted	3
6. EQUIPMENT PROFILE	
Inadequate for environment & weather	1
Questionable for environment & weather	1-2
Adequate for environment & weather	3
7. TERRAIN/HAZARDS PROFILE	
Known terrain or other hazards	1
Few or no hazards	2-3
TOTAL.....	(Range = 7 to 21)

Note: All figures are relative and the total from the chart only indicates a possible relative urgency. Other factors bearing on the incident must also be evaluated by the Incident Commander to finally establish urgency. THE DECISION TO INITIATE AN EMERGENCY RESPONSE SHOULD BE BASED UPON THE TOTALITY OF THE CIRCUMSTANCES.

SEARCH RESPONSE GUIDELINES

	FACTOR SUM	RESPONSE
A	7 -10	Urgent Response
B	11-13	Measured Response
C	14-17	Evaluative Response, Should any action be taken?
D	18-21	Investigate further

OBJECTIVE DESCRIPTION OF RESPONSE GUIDELINES:

A. Convinced that someone will die or be seriously injured if help does not arrive quickly
B. Measured response differs from an urgent response in speed and number of resources
C. The problem is unconfirmed or seems likely to resolve itself
D. High objective possibility that subject is not in area or is not in a hazardous situation

TOTAL SEARCH URGENCY RATING:_____

Completed By: _____ Date & Time:_____

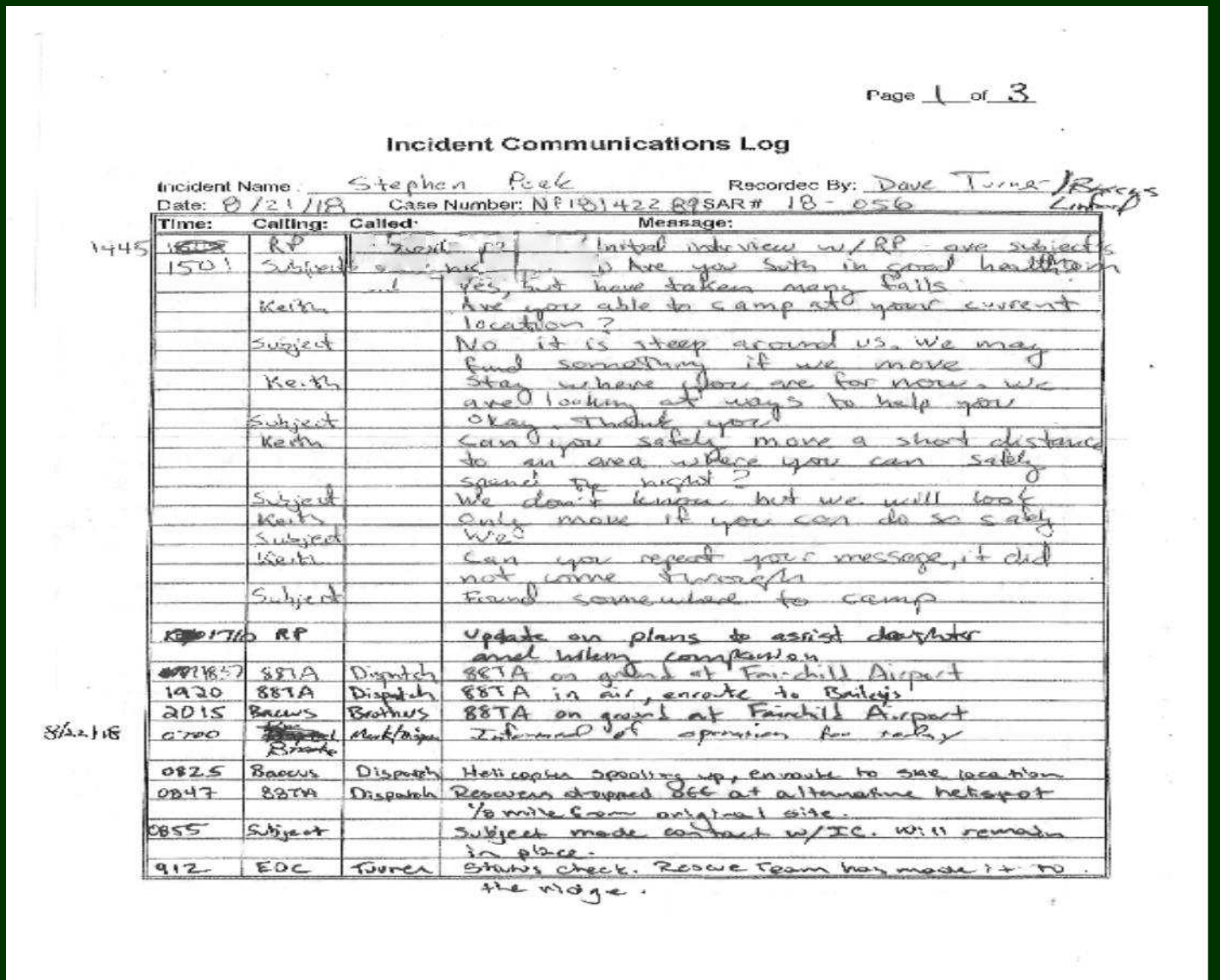
Places objective, numerical values on subjective factors.

This helps the “IC” determine the proper level of emergency response.

National Park Service
U.S. Department of the Interior

Initiation of Response

- Resources needed
- Command Structure
- PLS established
- Resupply of resources
- Longevity of operation
- Contingency plans for multiple Operational Periods



Page 1 of 3

Incident Communications Log

Incident Name: Stephen Poe Recordec By: Dave Turner / Briggs
Date: 8/21/18 Case Number: NP181422 BPSAR # 18-056

Time:	Calling:	Called:	Message:
1445	RP		Initial interview w/ RP - are subjects
1501	Subject		Are you both in good health?
			Yes, but have taken many falls
	Keith		Are you able to camp at your current location?
	Subject		No it is steep around us. We may find something if we move
	Keith		Stay where you are for now. We are looking at ways to help you
	Subject		Okay. Thank you
	Keith		Can you safely move a short distance to an area where you can safely spend the night?
	Subject		We don't know, but we will look
	Keith		Only move if you can do so safely
	Subject		Yes
	Keith		Can you repeat your message, it did not come through
	Subject		Found somewhere to camp
1710	RP		Update on plans to assist daughter and hiking companion
1857	88TA	Dispatch	88TA on ground at Fairchild Airport
1920	88TA	Dispatch	88TA in air, enroute to Bailey's
2015	Baccus	Brothers	88TA on ground at Fairchild Airport
8/22/18 0700	[redacted] Brooks	Mark/Briggs	Informed of operations for today
0825	Baccus	Dispatch	Helicopter spooling up, en route to SAR location
0847	88TA	Dispatch	Rescuers dropped SAR at alternative helispot ½ mile from original site.
0855	Subject		Subject made contact w/ IC. Will remain in place.
912	EOC	Turner	Status check. Rescue team has made it to the ridge.

National Park Service
U.S. Department of the Interior

1) Ground crew of initial hasty SAR staff ~2-4
2) Launch of helicopter or contingent assets if applicable.
3) As time increases so does the need for additional resources and "ramping up" of SAR personnel.

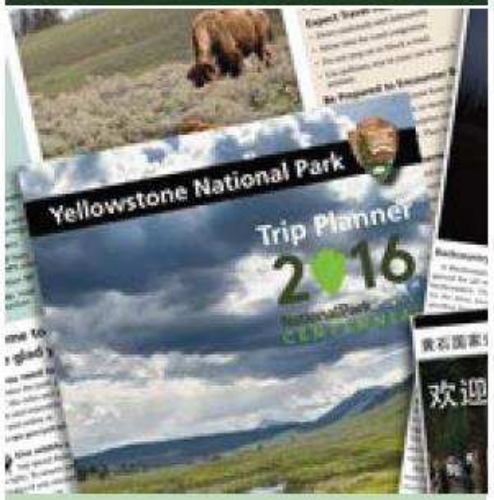
“Hasty Team” Response

- ✓ Typically the first tactic used in a SAR incident to quickly get a team to the subject’s last known point.
- ✓ Small group often comprised of at least two persons, who travel fast, light, and are self sufficient for a 24-hour operational period.
- ✓ Report directly to the IC through the SAR Duty Officer (SDO) or Ops
- ✓ Basic medical gear, PPE, qualified as NPS SAR Technician - Type 3 (SRT-3).
- ✓ Once on scene, they “size up” the incident and radio the ICS to request appropriate resources.

National Park Service
U.S. Department of the Interior

Planning Ahead

Before the Trip



"Know Before You Go"

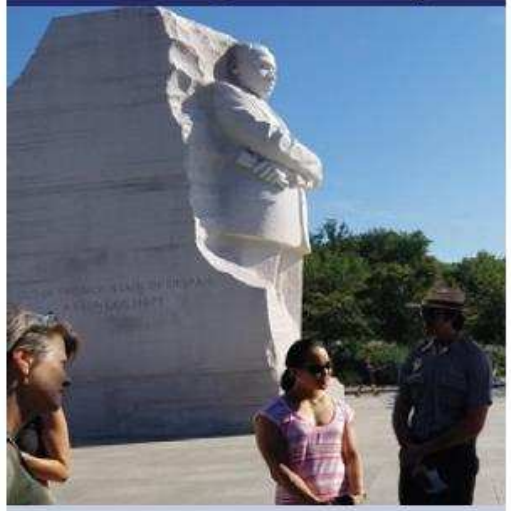
What you need to know and consider before going out to a park

Arrival at Park

"Ask a Ranger"

Get up-to-date information on park requirements and safety information

During the Trip



"Assess and Adjust"

Actions to consider while you and your group are enjoying the activity

After the Trip

"Share the Experience"

What you can do to be better prepared for your next park adventure

https://www.nps.gov/subjects/healthandsafety/trip-planning-guide.htm

National Park Service
U.S. Department of the Interior

Know Before You Go

Always Pack the 10 Essentials

1. NAVIGATION
Map, compass, and GPS system

2. SUN PROTECTION
Sunglasses, sunscreen, and hat

3. INSULATION
Jacket, hat, gloves, and rain shell,

4. ILLUMINATION
Flashlight, lanterns, and headlamp

5. FIRST-AID SUPPLIES
First Aid Kit

6. FIRE
Matches, lighter & fire starters

7. REPAIR KIT & TOOLS
Duct tape, knife, & scissors

8. NUTRITION
Extra food

9. HYDRATION
Water and water treatment supplies

10. EMERGENCY SHELTER
Tent and tarp

National Park Service
U.S. Department of the Interior

Your Cell Phone is...

NOT a light source

NOT a map

NOT a survival kit

NOT always going to have reception

https://www.nps.gov/articles/gtgemergencyplan.htm

What can I do to help?.....

Can your organization provide trained, licensed and skilled emergency response providers (EMT, WFR, etc)? *(understand your states Good Samaritan Laws)*

Can your organization implement a local medical advisor to establish protocols and procedures for your staff? (ie – epi / Benadryl for anaphylaxis)

Can your organization provide life saving and inexpensive tools such as tourniquets?

Can you include in your trip planning medical Information such as triage tags for each client that includes allergies, medications, medical information, weight + gear weight for possible flights?

National Park Service
U.S. Department of the Interior

After Action Review

What was planned?

- ✓ Objectives and expected outcomes.

What actually happened?

- ✓ Identify effective and non-effective performance.
- ✓ Review any non-SOP actions or safety concerns.

Why did it happen?

- ✓ Discuss reasons for any ineffective or unsafe performance and concentrate on WHAT happened, not WHO is responsible.

What can we do next time?

- ✓ Determine how to apply lessons-learned during the next incident.

National Park Service
U.S. Department of the Interior

Questions?

Jay Shields
(360)460-6702
jay_shields@nps.gov