

## AUDIENCE

New residents of an area prone to flooding

## TOPIC

Flood Preparedness

## TIME NEEDED

60 minutes

## LEARNING OBJECTIVES

By the completion of the program,

1. At least 80% of the participants will be able to list five precautionary measures to take before a flood warning has been issued as seen on the post-test.
2. At least 80% participants will be able to list three different items that should be in a flood preparation kit, which will be written on a post-test question.

## MATERIALS NEEDED

- Phones
- Computer and Projector
- Pamphlet/ brochure
- Dummies for demonstration
- Example Emergency Preparedness Kit- should include all that is listed on the slides/  
lesson plan
- Whiteboard/ chalkboard to list answers
- Evacuation Plan Worksheet
- Maps/ Google Maps
- Paper with websites (one copy per participant)
- Paper Post-test (one copy per participant)

# Flood Preparedness

Beery & Uniacke

## PREPARATION

1. Load videos (allow the advertisements to play if there is any).
2. Prepare the slides.
3. Print out 30 Post Test papers.
4. Prepare Kahoot/questions and webpage.
5. Print/hand out 30 “Evacuation Plan” worksheets.
6. Print/hand out 30 “Additional Information” sheets.
7. Prepare for the icebreaker (review questions).
8. Prepare Emergency Preparedness Kit

## PROCEDURE

### 1) Introduction (5 minutes)

- a) Open the PowerPoint to Slide 1
  - i) Welcome the participants to the session and introduce yourself (instructor)
- b) Start the IceBreaker (questions are attached). Read the question out loud and have the participants go around and share their answers to the questions.
- c) Ask the participant the following questions about family planning:
  - i) What is your name?
  - ii) If you have just moved here, where did you move from?
  - iii) How long have you lived here?
  - iv) Have any of you ever experienced a flood before? If so, where?
- d) Instructors should take the time to speak more about themselves.

### 2) Flood Warning Signs/ Dangers of a Flood (10 minutes)

- a) Present the information that is given on Slides (2-4).
- b) Flip to Slide 2
  - i) **“What is a Flood?”**
    - (1) According to the National Severe Storms Laboratory, “A flood is an overflowing of water in an area that is typically dry”
- c) Flip to Slide 3
  - i) **“Warning Signs and Danger Area”**

## Flood Preparedness

Beery & Uniacke

- (1) Floods can happen very quickly and suddenly, the best way to prepare is to know if you are in a higher risk area!
  - (a) Low elevation places near a large body of water
  - (b) Areas at the base of a mountain
  - (c) Areas that are close to a dam
  - (d) Areas with high rates of rain or storms
  - (e) Areas that have been hit by hurricanes
- d) Flip to Slide 4
  - i) **“Dangers of Flooding”**
    - (1) Floods can move very fast, which can destroy houses and other resources very quickly
    - (2) Flood waters can have debris in them, which makes it even more dangerous if someone is in the water.
    - (3) Water pollution due to household chemicals can have a lasting impact on the environment
    - (4) Drowning in a flood is always a possibility.
- e) Continually encourage participants to ask any questions that they may have
- f) Flip to Slide 5
  - i) Show “The Dangers of Flash Flooding” from The Weather Channel
    - (1) URL: <https://youtu.be/PvJuocemHS4>
    - (2) “This video shows a very serious and dangerous flood, and while all floods are serious and should be taken seriously, I’ve never seen a flood this bad in all of the years I’ve lived here”
- g) Ask the participants some Discussion Questions about the video.
  - i) Can anyone summarize what the video said? What was a message that you got from it?
  - ii) Was this new information or things that you already knew?
  - iii) How might you incorporate what you learned from the video into your life here?

# Flood Preparedness

Beery & Uniacke

## 3) How to Limit Damage (10 Minutes)

- a) Switch to Slide 6
  - i) Pose the question “What are some potential ways to limit damage to your house and yourself in a flood emergency?”
- b) Have the participants brainstorm ideas
- c) Switch to Slide 7
  - i) **“How to Limit Damage”**
    - (1) Find higher ground if possible/second floor of house.
    - (2) Bring the outdoor furniture inside.
    - (3) Place valuables in high places (such as the attic).
    - (4) If advised, EVACUATE.
    - (5) Try to stay out of the water as much as possible, both in cars and yourself.

## 4) Kahoot (10 minutes)

- a) Switch to Slide 8
- b) Explain Kahoot and have participants join the Kahoot by entering the pin generated on your presentation screen. If anyone does not have a phone or laptop, have them partner with someone who has one.
- c) Go over answers for Kahoot
  - i) **What will you do if water is rising inside of the car?**
    - (1) Open the window and swim to higher ground
  - ii) **When do you return home?**
    - (1) When authorities declare that it is safe to do so
  - iii) **What will you do if you have to evacuate your home?**
    - (1) All of the Above

## 5) Emergency Preparedness Kit (10 Minutes)

## Flood Preparedness

Beery & Uniacke

- a) Take out the example Emergency Preparedness Kit. Take time to open the kit, remove the items and describe each of them and the importance of having them in the kit.
- b) Flip to Slide 9 and review the items that are listed
  - i) Emergency Preparedness Kit
    - (1) Essentials
      - (a) Emergency water pouches
      - (b) Food bar
      - (c) Rain poncho
      - (d) Water storage container
      - (e) Drinking cup
      - (f) Flashlight w/batteries
      - (g) Waterproof matches
      - (h) Dust masks
      - (i) Emergency radio w/batteries
      - (j) 5-in-1 Whistle
      - (k) Campers tool
      - (l) Gas shut-off tool
    - (2) Additional Items
      - (a) Body warmers
      - (b) Emergency blanket
      - (c) Tube tent
      - (d) 12-Hour light sticks
      - (e) Emergency candle
      - (f) Leather palm gloves
      - (g) Duct tape
      - (h) Rope
- c) Place all of the items into the kit and pass the kit around so that the participants are able to look around and see it up close.
- d) Switch to Slide 10

# Flood Preparedness

Beery & Uniacke

- i) Cuts and Scratches
    - (1) Apply pressure
    - (2) Elevate bleeding body part
    - (3) Disinfect wound
    - (4) Use gauze pad to wrap wound
  - ii) Fractures, Dislocations, Sprains or Strains
    - (1) Keep injured body part still
  - iii) Note to the participants: This is not a certification class, just a basic introduction to First Aid
- e) Ask for 1-2 participants to demonstrate what they have learned about First Aid

## 6) Evacuation Plan (10 Minutes)

- a) Switch to slide 11.
- b) Hand out the Evacuation Plan Worksheet to the participants and explain that this worksheet is to have the participants start thinking and preparing in case of a flood emergency.
- c) Have them work on the worksheet for 5 minutes.
- d) Go over answers for 5 minutes.

## 7) Conclusion (5 Minutes)

- a) Ask the participants if they have any more questions.
- b) Switch to slide 12.
  - i) What are 5 Precautionary Measures?
    - (1) Having Flood Insurance
    - (2) Having an Emergency Kit
    - (3) Store valuable items in a safe location
    - (4) Understand Basic First Aid Care
    - (5) Have an evacuation plan in place
- c) Switch to Slide 13
  - i) Pass out the Post-Test to the participants and allow them to complete it.
- d) Switch to Slide 14
  - i) Thank the participants for coming to the session.

## **Flood Preparedness**

Beery & Uniacke

- e) Pass out the information sheet that has additional resources and information about flood insurance.
- f) Have the participants hand in their Post-Test when they leave.

## References

- Centers for Disease Control and Prevention. (2020, March 9). Flood Safety Tips. Retrieved from [https://www.cdc.gov/nceh/features/flood-safety/index.html?CDC\\_AA\\_refVal=https://www.cdc.gov/features/flood-safety/index.html](https://www.cdc.gov/nceh/features/flood-safety/index.html?CDC_AA_refVal=https://www.cdc.gov/features/flood-safety/index.html)
- Charleston County. (n.d.). FEMA Aid Information. Retrieved from <https://www.charlestoncounty.org/fema.php>
- Charleston City Government. (n.d.). Flood zones. Retrieved from <https://www.charleston-sc.gov/327/Flood-Zones>
- Disaster Supply Center - Your Emergency Supply Store. (n.d.). Flood Survival Kit. Retrieved from <https://disastersupplycenter.com/products/flood-survival-kit>
- Johnson, C. (2019, October 4). Coastal flooding is accelerating in Charleston and around the US, NOAA reports. Retrieved from [https://www.postandcourier.com/hurricanewire/coastal-flooding-is-accelerating-in-charleston-and-around-the-us/article\\_2a45e406-9cfa-11e9-a913-4391aca2c1c7.html](https://www.postandcourier.com/hurricanewire/coastal-flooding-is-accelerating-in-charleston-and-around-the-us/article_2a45e406-9cfa-11e9-a913-4391aca2c1c7.html)
- Merriam-Webster Dictionary. (n.d.). Flood. Retrieved from <https://www.merriam-webster.com/dictionary/flood>
- National Severe Storms Laboratory (n.d). Severe weather 101: Flood basics. Retrieved from <https://www.nssl.noaa.gov/education/svrwx101/floods/>
- New Jersey State Government (n.d). Flood waters can be extremely dangerous. Retrieved from [https://www.nj.gov/humanservices/dmhas/home/disaster/resources/Flood\\_waters\\_extremely\\_dangerous.pdf](https://www.nj.gov/humanservices/dmhas/home/disaster/resources/Flood_waters_extremely_dangerous.pdf)
- New York Department of Health. (2017, February). How to avoid getting sick and injured after a flood. Retrieved from <https://www.health.ny.gov/publications/7289/index.htm>
- The Weather Channel. (October, 2019). Dangers of flash flooding. Retrieved from <https://youtu.be/PvJuocemHS4>
- UWEC. (n.d.). Flood Hazards and Terms. Retrieved from <https://people.uwec.edu/jolhm/eh2/nelson/nelsonmchazards/terms.htm>

# Flood Preparedness

Beery & Uniacke

## Post-Test

**1. List three things that are important to have within an Emergency Preparedness Kit**

a. \_\_\_\_\_

b. \_\_\_\_\_

c. \_\_\_\_\_

**2. Define “Flood Zone”**

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

**3. Do you know if you live in a flood zone?**

a. Yes

b. No

**4. Can you list five precautionary measures to take before/af a flood warning has been issued**

a. \_\_\_\_\_

b. \_\_\_\_\_

c. \_\_\_\_\_

d. \_\_\_\_\_

e. \_\_\_\_\_

# Flood Preparedness

Beery & Uniacke

## Ice Breaker Activity:

**Each person will answer all questions when it is their turn to speak.**

1. What is your name?
2. If you have just moved here, where did you move from?
3. How long have you lived here?
4. Have any of you ever experienced a flood before? If so where?

## Kahoot Questions:

### **1. What will you do if water is rising inside of the car?**

- Open the window and swim to higher ground
  - Stay calm
  - Turn on your headlights and hazard lights.
  - Unbuckle your seatbelt.
  - Unlock your doors.
  - Take jackets and outer clothing off.
  - Lower your window slowly
  - Do not try to break windows to get out. If water pressure has not equalized, glass will explode inward
  - Use the door if the window does not work.
  - Wait until water pressure is equalized between the outside and the inside of the car.
  - Wait for water to enter the car and fill up to about your neck level
  - Once the doors are open, swim to safety and call 911.

# **Flood Preparedness**

Beery & Uniacke

- Close your windows
- Abandon the other people in your car
- Open your door

## **2. When do you return home?**

- When authorities declare that it is safe to do so
- When you realize you left your favorite pair of shoes in the house
- When you can see the floor of your home
- When the neighbor says that they miss you

## **What will you do if you have to evacuate your home?**

- Turn off utilities
- Collect important documents
- Bring in outdoor furniture
- All of the Above

# Flood Preparedness

Beery & Uniacke

## Evacuation Plan Worksheet:

1. Where can you evacuate to during a flood?
2. Is there higher ground near you?
3. Where can you store important documents, or copies of such, such as photo IDs, proof of address, medical records, and bank documents?
4. What reliable sources are available to you to receive alerts from?
5. Do you have roof access?
6. Do you know how to turn off your electricity?

# Flood Preparedness

Beery & Uniacke

## **Additional Information Sheet:**

Thank you for attending the Flood Preparedness Lesson! Here is a list of different resources that you can visit to learn even more about flooding and how to protect yourself.

- Centers for Disease Control and Prevention (CDC) tips for Flood Safety
  - [https://www.cdc.gov/nceh/features/flood-safety/index.html?CDC\\_AA\\_refVal=https://www.cdc.gov/features/flood-safety/index.html](https://www.cdc.gov/nceh/features/flood-safety/index.html?CDC_AA_refVal=https://www.cdc.gov/features/flood-safety/index.html)
- Flood preparedness kit
  - <https://disastersupplycenter.com/products/flood-survival-kit>
- First Aid Training
  - <https://www.youtube.com/watch?v=qahukkDYFbk>

While your personal safety is the most important thing, your personal items still can mean a lot to you. Flood insurance is an important step for protecting your house and items, and is good to have. The following link is for some flood insurance information from the Federal Emergency Management Agency (FEMA). If you do choose to get flood insurance, take pictures of the house before the flood so that all damages may be accounted for.

- The National Flood Insurance Program
  - URL: <https://www.fema.gov/national-flood-insurance-program>