

▶ **DIRECT FROM CDC** ENVIRONMENTAL HEALTH SERVICES

Using Effective Communication Strategies to Help Teens Manage Stress After Natural Disasters

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Editor’s Note: The National Environmental Health Association (NEHA) strives to provide up-to-date and relevant information on environmental health and to build partnerships in the profession. In pursuit of these goals, NEHA features this column on environmental health services from the Centers for Disease Control and Prevention (CDC) in every issue of the *Journal*.

In these columns, authors from CDC’s Water, Food, and Environmental Health Services Branch, as well as guest authors, will share tools, resources, and guidance for environmental health practitioners. The conclusions in these columns are those of the author(s) and do not necessarily represent the official position of CDC.

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- improve perceptions of social support and solidarity among teens who have experienced natural disasters.

NCEH and CH wanted to create resources that reflect teen experiences with natural disasters and promote healthy coping skills. Using clear writing best practices, we developed materials that resonate with teens, including relatable stories and simple coping strategies to help teens manage stress in the aftermath of a disaster.

Taking a Human-Centered Design Approach

NCEH and CH wanted to create materials that put teens front and center, highlighting real-life stories of teens who have been through natural disasters. To achieve this goal, we applied a human-centered design approach that involved teens throughout the creative process.

Step 1: Conduct Formative Research

We conducted formative research with teens to inform the key messages, creative direction, and format of our materials. We used an interactive research platform called Aha! to gain insight into teen communication preferences and experiences with natural disasters. From our formative research, we learned that teens gravitate to real-life, first-person stories.

Step 2: Interview Teens

We interviewed four teens who had experienced natural disasters (e.g., tornadoes, hur-

Creating Resources to Support Teens After Natural Disasters

According to a 2020 report published by the Society for Research in Child Development, each year more than 175 million children experience natural disasters like floods, severe storms, and earthquakes (Lai & La Greca, 2020). This problem has been compounded by the COVID-19 pandemic (U.S. Government Accountability Office, 2020), which has made it even more difficult for local governments, schools, and families to plan for and recover from emergency situations.

In the months following natural disasters, many teens struggle with stress, depression, and anxiety (National Child Traumatic Stress Network, n.d.). Yet few resources address the emotional challenges that teens can face in the aftermath of a disaster.

To fill this gap, the Centers for Disease Control and Prevention (CDC) National Center for Environmental Health (NCEH) and CommunicateHealth (CH), an independent health communication and research agency, set out to develop materials that

- encourage teens to use healthy strategies to cope after experiencing a natural disaster and

ricanes, wildfires) and focused on what they went through in the months immediately following the disaster. Natural disasters often disproportionately affect low-income communities and communities of color (Centers for Disease Control and Prevention, 2022). To ensure that our materials reflected this priority audience, we included Black and Hispanic teens in our interviews. Due to the COVID-19 pandemic, we conducted and recorded all interviews over Zoom.

Step 3: Create Resources

We designed a suite of engaging and innovative products based on our interviews. These resources included vlog-style videos, posters, and social media graphics.

Step 4: Test Resources

We tested our materials with teens and revised them based on participant feedback. We used click testing to get feedback on the materials within a limited budget and to focus on the areas that most resonated with participants or needed improvement.

Creating Resources That Resonate With Teens

From our formative research, we learned that teens gravitate to real-life, first-person stories on peer-to-peer messaging platforms like TikTok and YouTube. We crafted vlog-style videos, posters, and social media that focus on the personal experiences of teens. We developed a look and feel that combines the bright, welcoming look of these popular apps with encouraging and relatable messages.

Following Clear Writing Best Practices

In keeping with the focus on authentic personal stories, our materials showcase quotes from teens who have been through natural disasters. On social media graphics and posters, we added a brief call to action directing viewers to CDC resources. On the posters, we also incorporated a short introduction to set the stage and provide context for the experience of our participants with natural disasters (Figure 1).

In writing the supplemental content, we followed clear writing best practices that included:

- Adopting a casual, empathetic tone.
- Putting the most important information first.

- Incorporating a strong call to action.
- Keeping sentences simple.

With this approach, we kept the focus on the personal stories of teens, making the materials more relatable to our priority audience.

Adapting to the COVID-19 Pandemic

The pandemic presented some additional challenges to the production of these materials. We had already decided to prioritize vlog-style videos when it became clear that we would not be able to film in person due to social distancing guidelines. We quickly pivoted to conducting interviews over Zoom, enabling our teen participants to share their stories from home.

We also needed compelling images of our teen participants to feature on our posters and social media graphics. Zoom screenshots and photos taken at home proved difficult to incorporate into our materials due to image quality. To get professional-quality images that aligned with our look and feel, we set up socially distanced photoshoots for several of our participants. Teen participants and their parents were thrilled with the outcome and the final photos (Figure 2).

As many families and communities confront the effects of climate change and escalating natural disasters, these relatable and empathetic materials will be resources to help teens cope with stress during a difficult time in their lives. ✨

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FIGURE 1

Example of a Poster That Features Jaylon's Experience



FIGURE 2

Example of a Social Media Graphic That Features Abby's Experience



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