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INTRODUCTION

In the United States, there is growing awareness of and attention to the tremendous, lasting damage and loss of life in communities affected by natural disasters. This attention brings the topics of preparedness, response, and recovery to the fore. Central to these discussions is resilience: how and why some individuals, and some communities, recover more quickly and more effectively than others in the face of a natural disaster.

Striking landfall in the United States on October 29, 2012, Superstorm Sandy affected large areas of coastal New York and New Jersey, devastated communities, killed more than 130 people, and caused tens of billions of dollars in property damage. The impacts of the storm are still being felt in many communities today as the long recovery process continues. The high level of damage and often slow recovery from natural disasters such as Superstorm Sandy are causing policymakers, emergency managers, and local leaders to ask: what characteristics of a community make it more resilient, and thus better able to effectively respond?

The economic development and physical infrastructure of a community are substantial factors in its resilience. However, recovery rates often differ in adjacent communities and neighborhoods with similar economic and structural

resources. Not as visible, but arguably just as tangible, are social resources that can be critical to response and recovery efforts. Indeed, extant literature suggests that factors such as social network connectedness, social cohesion, trust, and community bonds facilitate social interaction and information exchange. This reservoir of social resources can then be drawn upon in the event of a disaster.¹

This study provides unique data on and insights into the interplay of social factors, resilience, and recovery following Superstorm Sandy. With funding from The Rockefeller Foundation, The Associated Press-NORC Center for Public Affairs Research conducted a national survey of 2,025 individuals, with an oversample of 1,007 interviews with residents of the Superstorm Sandy affected region. This study accomplished two goals. First, the study provides rigorous data on the region most affected by Superstorm Sandy to systematically measure the impacts of the storm on individuals and neighborhoods and to assess the level of recovery six months after the storm. Second, by collecting data on neighborhood characteristics and social factors, the study provides an opportunity to understand how these factors relate to recovery and resilience. The key findings from the study, summarized below, will provide much-needed

1 Sampson, R.J. (2012). *Great American city: Chicago and the enduring neighborhood effect*. Chicago: University of Chicago Press.

information for policymakers, emergency managers, and local leaders to build better policies, programs, and interventions to bolster resilience to future disasters.

- As a result of Superstorm Sandy, many affected Americans say they turned to family and friends, both near and far, as well as neighbors, for support or assistance. About a third of the affected region reached out to nearby friends, family, and neighbors for assistance in the aftermath of the storm. Far fewer affected Americans turned to the government for support or assistance.
- Although the majority of the affected region reports high levels of recovery, many individuals and neighborhoods continue to struggle. Among the hardest hit in the region,

nearly 40 percent report that their neighborhood is less than halfway recovered six months out from the storm, and over 20 percent of them believe their neighborhood will never fully recover.

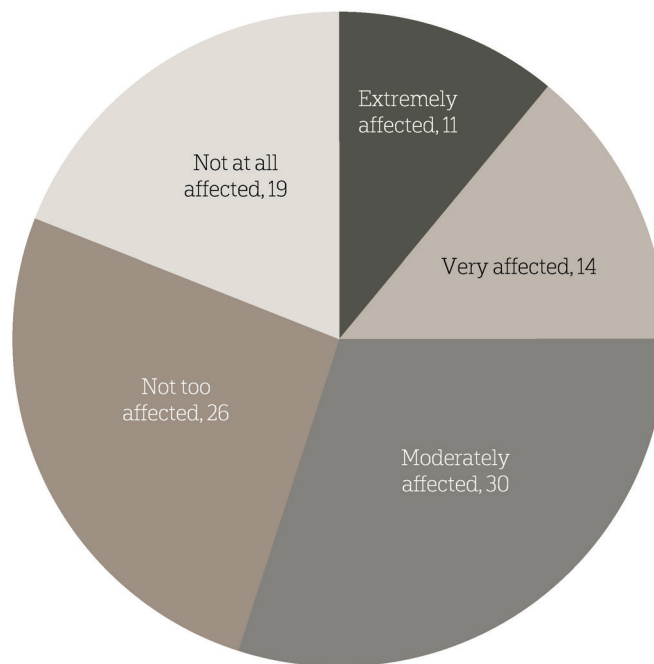
- Neighborhoods lacking in social cohesion and trust more generally are having a difficult time recovering from Sandy. Individuals in slowly recovering neighborhoods are less likely to believe that people can be trusted or that the storm brought out the best in people compared to neighborhoods reporting greater levels of recovery. Individuals in slowly recovering neighborhoods are also more likely to report greater levels of hoarding food and water, looting and stealing, and vandalism in their neighborhoods during or immediately after the storm.

RESIDENTS OF THE SUPERSTORM SANDY AFFECTED REGION REPORT EXTENSIVE IMPACTS OF THE STORM BEYOND THE PHYSICAL DAMAGE, INCLUDING PROLONGED EFFECTS ON DAILY LIVING AND SOCIAL RELATIONSHIPS.

Of those Americans who live in areas which sustained major impacts from Superstorm Sandy, 55 percent say they were at least moderately affected personally by the storm, with 25 percent reporting they were extremely or very affected. Similarly, 26 percent report that their neighborhood was

extremely or very affected, with another 26 percent reporting a moderate effect on their neighborhood, and 48 percent reporting that their neighborhood was not too or not at all affected.

How seriously, if at all, were you personally affected by Superstorm Sandy?



One in six (16 percent) had to be evacuated from their homes, and nearly half of those (44 percent) were displaced for more than seven days. One-quarter of those living in the affected region sustained damage to their home as a result of Superstorm Sandy. Twenty percent of those reporting damage say their home sustained severe damage.

Superstorm Sandy caused widespread and prolonged power outages, with two-thirds of those living in the affected region reporting that they lost power. Forty percent of those who lost power report outages of a week or more. The storm left 44 percent in these hardest hit regions without heat, and nearly half of those, 49 percent, were without heat for more than a week. Thirteen percent in these areas lost water service, with 36 percent having lost water for more than a week.

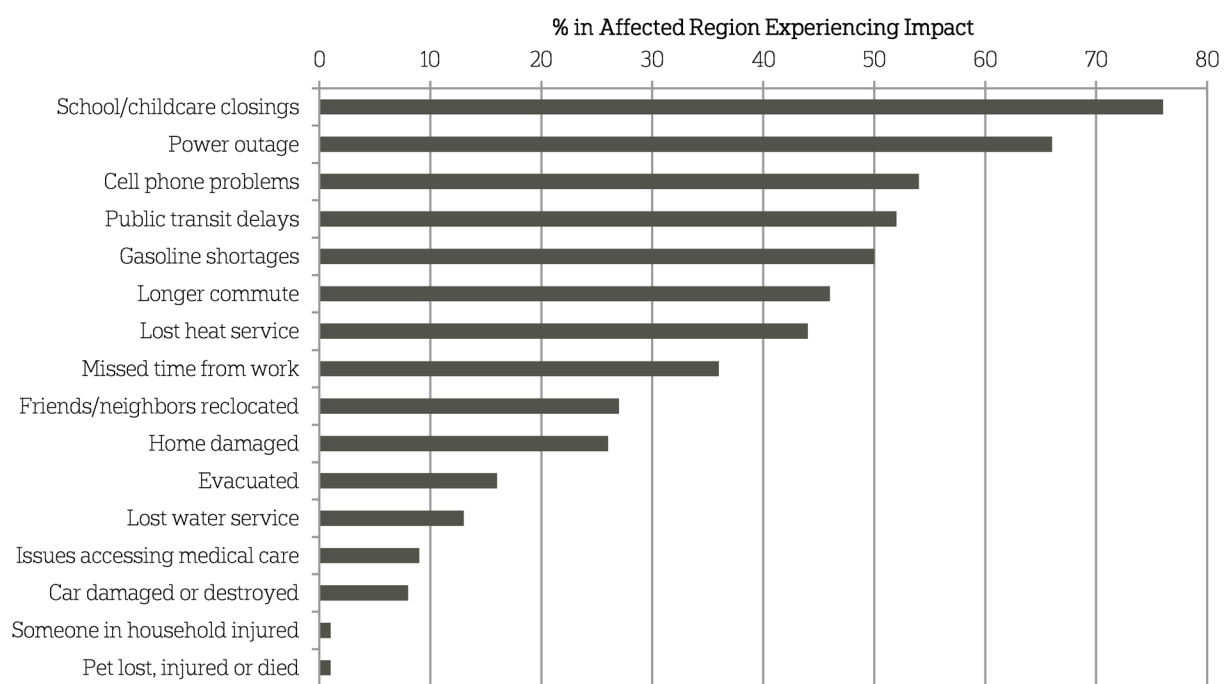
Superstorm Sandy also had a significant and prolonged impact on daily living, including transportation, communications systems, work, schools, and relationships. The New York City Metropolitan Transportation Authority reports that 80 percent of rush hour commuters rely on public transportation.² In the wake of Superstorm Sandy, half of the population living in the affected region report that they experienced service disruptions and delays in public transportation. Lower income people in affected areas were more likely than the highest income group to have had a

difficult time getting around due to disruptions to public transportation, 63 percent to 46 percent, although those making \$30,000 or more in affected areas were more apt to have run out of, or were unable to find, gasoline for their car (30 percent to 54 percent).

The storm made fueling motor vehicles difficult, as half of affected Americans say they had trouble accessing fuel, and 8 percent say that their vehicle was damaged or destroyed. Nearly half, 46 percent, experienced longer commutes to work, and 36 percent missed time from work, of which 28 percent missed more than a week as a result of the storm. Just over three quarters of parents report that their children missed time from school, with 29 percent missing more than a week of classes.

During the storm, half of those living in the affected region say they experienced problems using cell phones. Twenty-seven percent report that they lost touch with friends or neighbors who had to relocate because of the storm; this was especially true for women compared to men (33 percent vs. 21 percent). Nine percent of individuals in the affected region were unable to get needed medical care or medicines, although only 1 percent report that they or someone in their household was injured. One percent also suffered the loss, injury, or death of a pet.

Impacts of Superstorm Sandy on individuals in the affected region



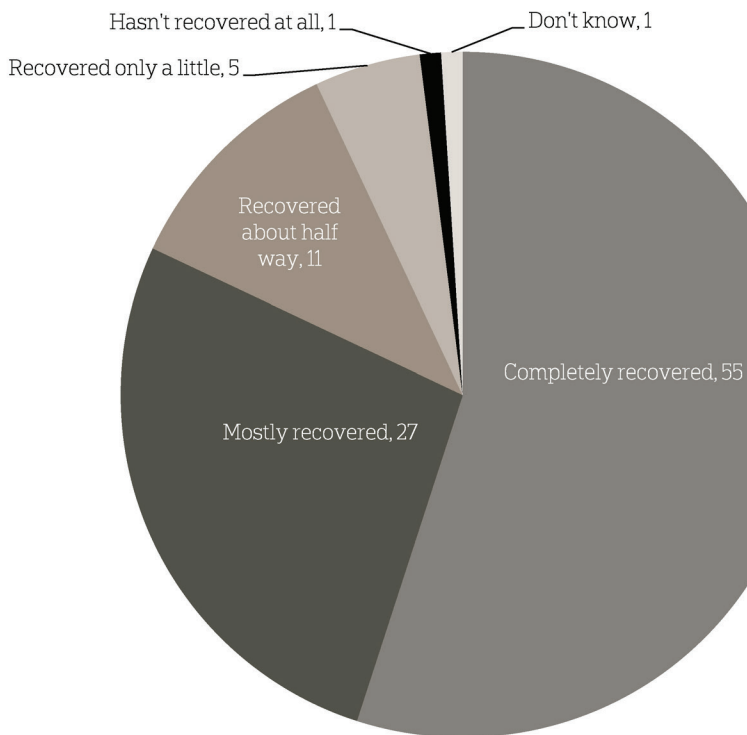
² <http://web.mta.info/mta/network.htm>

ALTHOUGH THE MAJORITY OF THE AFFECTED REGION REPORTS HIGH LEVELS OF RECOVERY, MANY INDIVIDUALS AND NEIGHBORHOODS CONTINUE TO STRUGGLE.

In terms of neighborhood recovery, 55 percent of Americans living in the affected region say their neighborhoods have completely recovered from Superstorm Sandy, and another 27 percent report that they have mostly recovered. However, many neighborhoods are still recovering from the hurricane's destruction, with 17 percent of those living in the affected region reporting that their neighborhoods have recovered only halfway or less. Among respondents who report that their neighborhood was extremely or very affected by Sandy, 38 percent report that their neighborhood is only halfway recovered or less. Of those Americans who report that their neighborhoods have not completely recovered, 12 percent believe that their neighborhood will never completely recover, and that figure increases to 22 percent for those who report living in especially hard-hit neighborhoods.

Reported levels of personal recovery are even higher with 86 percent of individuals in the affected region reporting complete or mostly complete recovery, 7 percent reporting that they have recovered halfway, and 7 percent reporting little or no recovery. Seventy-six percent of individuals in the affected region report high levels of both personal and neighborhood recovery. Eight percent report that they have personally recovered, but that their neighborhood is still struggling to recover. Ten percent report that they have personally recovered, but that their neighborhood is still struggling to recover. Within the affected region, 9 percent of individuals report that neither they nor their neighborhoods have recovered from the storm.

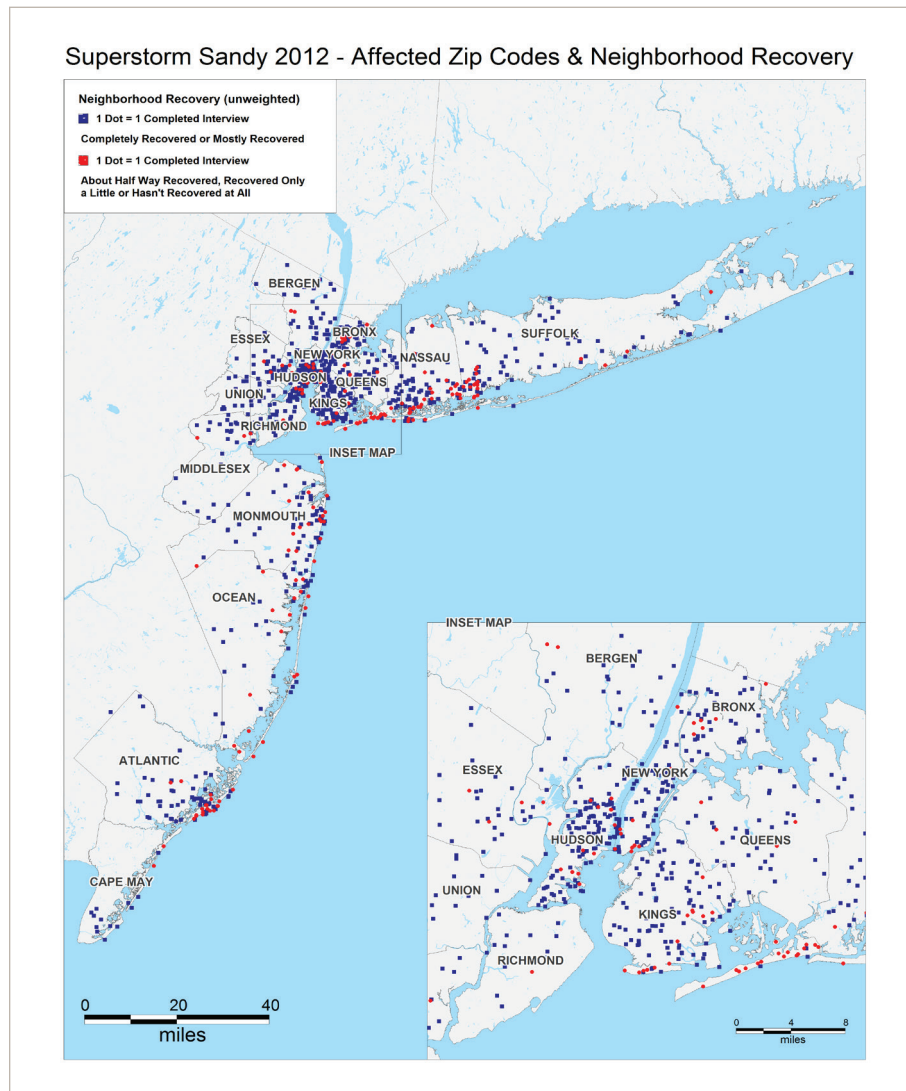
What best describes how your neighborhood is recovering from Superstorm Sandy?



There are geographic differences in the level of recovery within the affected region. Twenty-two percent of individuals in Nassau and Suffolk counties in New York report that their neighborhoods have recovered only halfway or less. Individuals in Middlesex, Monmouth, and Ocean counties in New Jersey report a similar level of recovery (20 percent). Seventeen percent of individuals in the Bronx, Kings County,

New York, and Queens report neighborhood recovery at about halfway or less, as do 12 percent of individuals in Bergen, Essex, Hudson, Richmond, and Union counties. Atlantic and Cape May counties in New Jersey report the highest levels of recovery, with less than 8 percent of individuals in those counties reporting that their neighborhood has recovered halfway or less.

Status of reported neighborhood recovery in the affected region



Controlling for the reported level of storm damage and other demographic and socioeconomic factors, there are several other characteristics that predict the speed of recovery, including both social factors and demographic characteristics. It is important to note that our data from this survey are not designed to be representative of any particular neighborhood. However, across the neighborhoods covered by individuals sampled for our survey, our data do point to signs that neighborhoods lacking in social cohesion and trust more generally have had a more difficult time in recovering from

Sandy. Individuals in slowly recovering neighborhoods are less likely to believe that, generally speaking, most people can be trusted (31 percent vs. 44 percent) and are more likely to believe that you can't be too careful in dealing with people (68 percent vs. 53 percent) compared to neighborhoods reporting greater levels of recovery. Individuals in slowly recovering neighborhoods are also less likely to say that Sandy brought out the best in people than individuals in neighborhoods reporting greater levels of recovery (63 percent vs. 81 percent).

Consistent with these social perceptions, individuals in slowly recovering neighborhoods report greater levels of hoarding food and water (47 percent vs. 25 percent), looting and stealing (31 percent vs. 7 percent), and vandalism (21 percent vs. 5 percent) in their neighborhoods during or immediately after the storm compared to reports from neighborhoods reporting greater levels of recovery.

In terms of demographic characteristics, neighborhoods that are slow to recover have fewer residents with a bachelor's degree than those with greater levels of recovery (19 percent in the neighborhood with a bachelor's degree vs. 21 percent, on average). The slowly recovering neighborhoods are also more likely to be older. The mean age of individuals in slowly

recovering neighborhoods is a little more than four years older than the mean age of individuals in neighborhoods reporting greater levels of recovery (50 years vs. 46 years, on average).

Looking ahead to the possibility of another disaster striking their neighborhood, individuals in neighborhoods slow to recover from Sandy are much less confident that their neighborhood would recover quickly after a major disaster than those in neighborhoods with greater levels of recovery after Sandy. Forty-one percent of individuals in slowly recovering neighborhoods report that they are not too or not at all confident that their neighborhood could recover quickly after a major disaster compared to 22 percent in neighborhoods with greater levels of post-Sandy recovery.

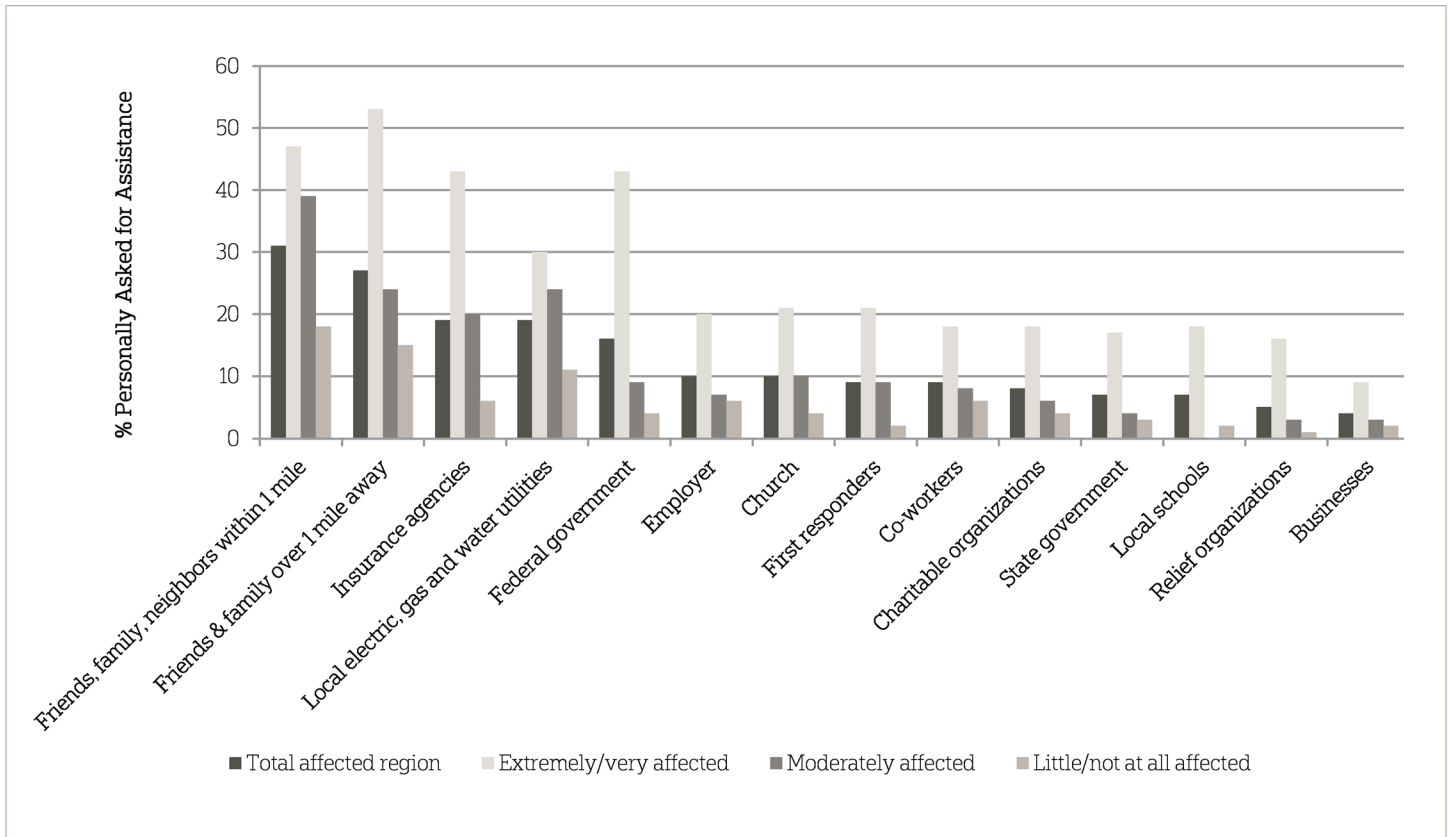
INDIVIDUALS, EVEN THOSE MOST IMPACTED BY SANDY, TURNED TO FRIENDS, FAMILY, AND NEIGHBORS FOR HELP MOST OFTEN.

As a result of Superstorm Sandy, many affected Americans say they turned to family and friends, both near and far, as well as neighbors for support or assistance. About a third, 31 percent, say they reached out to nearby friends, family, and neighbors for assistance in the aftermath of the storm, and 27 percent say they turned to friends and family who live more than one mile away. Far fewer affected Americans turned to the government for support or assistance, as 16 percent say they contacted the federal government, including FEMA, and just 7 percent say they contacted their state government in the wake of the storm. Roughly one-fifth (19 percent) say they reached out to their insurance company for assistance.

On the local community level, 19 percent of residents of the affected region say they turned to local utility providers for assistance; 9 percent say they turned to local police, fire department, ambulance services, hospitals, and other first responders; and 7 percent say they turned to local schools for assistance. One in 10 employed adults in the affected region say they asked co-workers. Ten percent in the affected region say they turned to churches and religious communities, 8 percent to charitable organizations such as food banks or the Salvation Army, 5 percent to relief organizations such as the Red Cross, and 4 percent to local businesses for help.

Whether those living in the affected region reached out for support or assistance at all varied considerably by how affected one's neighborhood was by the storm, with those who say their neighborhood was extremely affected by the storm asking for support or assistance at a much higher rate than those who say their neighborhood was moderately or only a little affected. Even those individuals who report that their neighborhood was extremely or very affected by the storm, most often cite friends, family, and neighbors as sources of support or assistance. For those who say their neighborhoods were extremely affected by Superstorm Sandy, the percentages who report turning to nearby friends and family for assistance jumps to 47 percent, and 53 percent for friends and family who live more than one mile away. Seventeen percent who say their neighborhood was extremely affected say they reached out to their state government and 43 percent say they reached out to federal agencies, including FEMA, for assistance. The percentage of people who reached out to their church or religious community doubled to 21 percent, and the percentage of people who reached out to relief organizations tripled to 16 percent for those who say their neighborhood was extremely affected by the storm.

Where affected individuals turned for help by reported level of storm impact on the neighborhood



DURING THE STORM, SOME SOURCES OF RELIEF PROVED MORE HELPFUL THAN OTHERS.

Among those individuals who reached out for help during Superstorm Sandy, friends, family, and neighbors were cited as among the most helpful sources of assistance and support. Sixty-three percent of those who turned to friends, family, or neighbors within a mile of their home say they helped quite a bit or a great deal. Even among those individuals in the neighborhoods most affected by Superstorm Sandy, friends, family, and neighbors are cited as providing quite a bit of help when asked. First responders also rated as helpful; 60 percent of respondents who turned to first responders for help report that they provided quite a bit or a great deal of assistance.

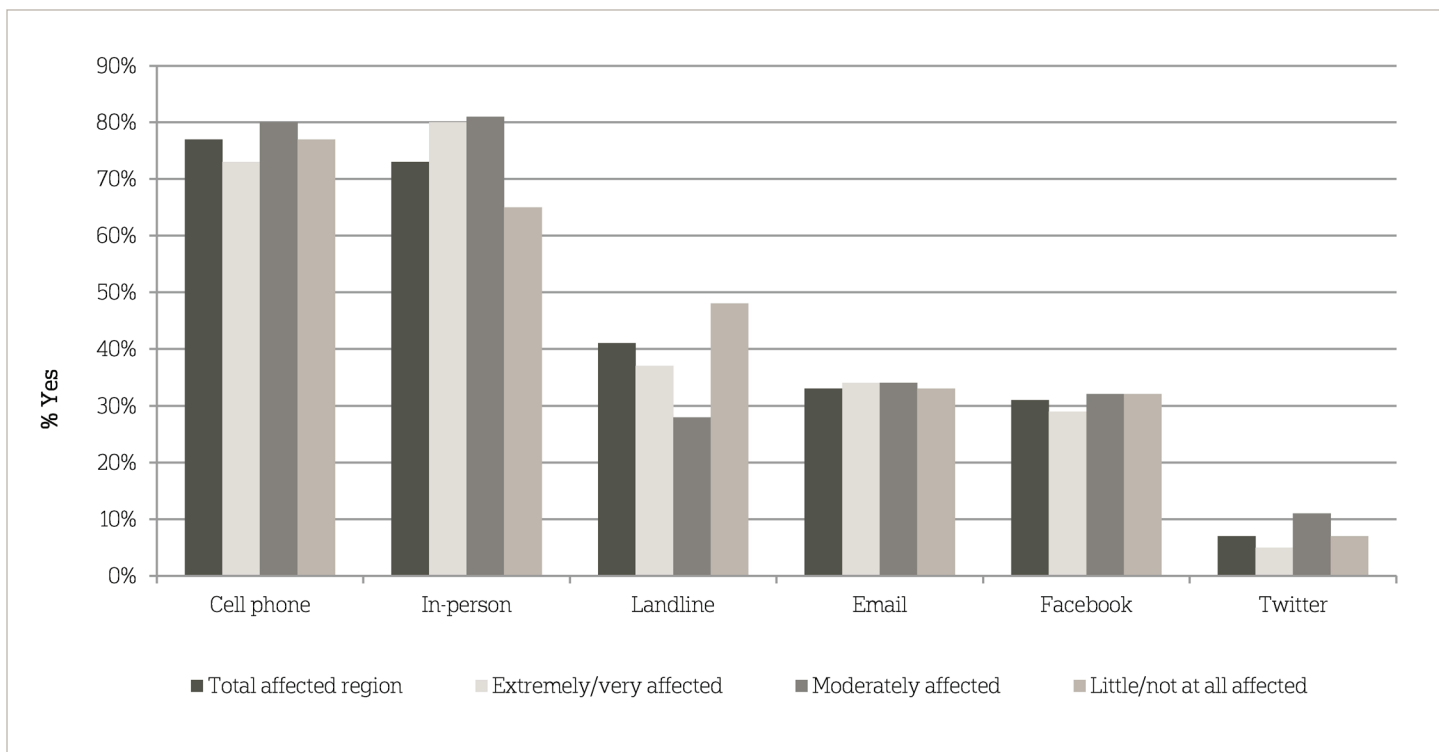
Other groups were deemed not as helpful by individuals affected by the storm. Just 31 percent of those who asked their utility company for help report that they actually received at least quite a bit of help during or after the storm. Both the state and federal governments rate poorly as well among those individuals in the affected region who asked them for help. Only 26 percent and 19 percent, respectively, report receiving a great deal or quite a bit of help from these sources. Employers and neighborhood business were also less helpful. Just 35 percent of individuals who asked for help report receiving at least quite a bit of assistance from employers, and 33 percent report the same from neighborhood businesses.

AFFECTED INDIVIDUALS STAYED CONNECTED DURING THE STORM WITH BOTH LOW-TECH METHODS AND SOCIAL MEDIA.

Reliable and accessible communication and information systems are key to a community's resilience. This includes communicating with relatives, friends, neighbors, relief agencies, and other groups and can take place through a variety of means. Individuals in the affected areas of New York and New Jersey report using a variety of communication methods to reach out to those around them, including cell phones (77 percent), landline phones (41 percent), and in-person communications (73 percent). People in the affected area also utilized electronic methods to communicate during the storm. Thirty-three percent say they used email, 31 percent say they used Facebook, and 7 percent say they used Twitter.

Communication methods differed in some small but noteworthy ways among those individuals in neighborhoods reported to be extremely or very affected by the storm. Individuals in these neighborhoods were most likely to rely on in-person communications (80 percent) compared to cell phones (73 percent), landlines (37 percent), email (34 percent), Facebook (29 percent), or Twitter (5 percent). The total for in-person communications represents a 7 percentage point increase over the affected region as a whole. Cell phone, landline, Facebook, and Twitter usage, on the other hand, all decreased by 2 or more percentage points.

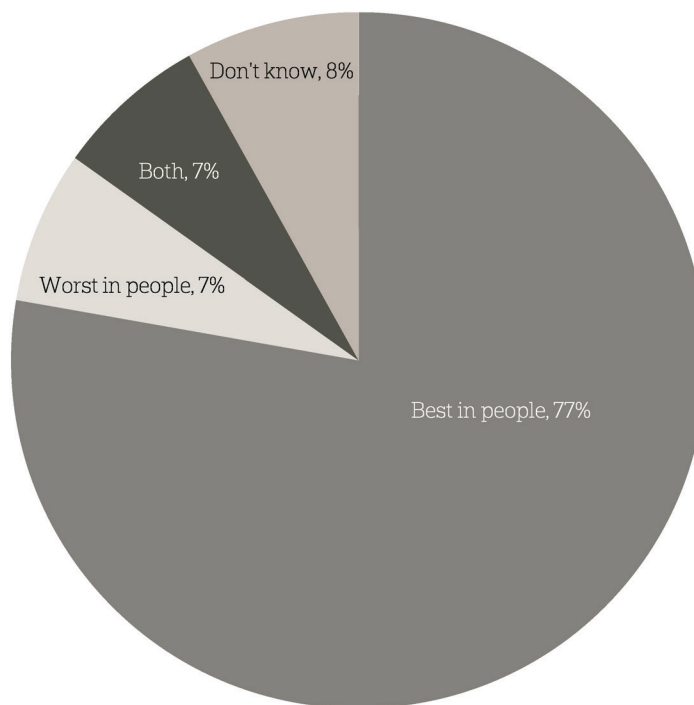
Communication methods used during Superstorm Sandy



ALTHOUGH SOME NEIGHBORHOODS SUFFERED LOOTING AND VANDALISM, SOCIAL NORMS OF BEING A GOOD NEIGHBOR WERE MUCH MORE COMMON.

Across the affected region in New York and New Jersey, individuals largely feel that Superstorm Sandy brought out the best in the people in their neighborhood. Seventy-seven percent report that it brought out the best, while just 7 percent say it brought out the worst in their neighbors. Seventy-nine percent of individuals in the affected region report that neighbors were helping each other to prepare for, or recover from, the storm. People in the affected region report that

neighbors shared generators or access to power (49 percent), shared food or water (52 percent), and took in neighbors with damaged homes or without utilities (48 percent). Four out of 10 say that neighbors helped others prepare their homes for the storm, and almost half say that neighbors helped others repair damage after the storm.

Did Superstorm Sandy bring out the best in people in your neighborhood or the worst?

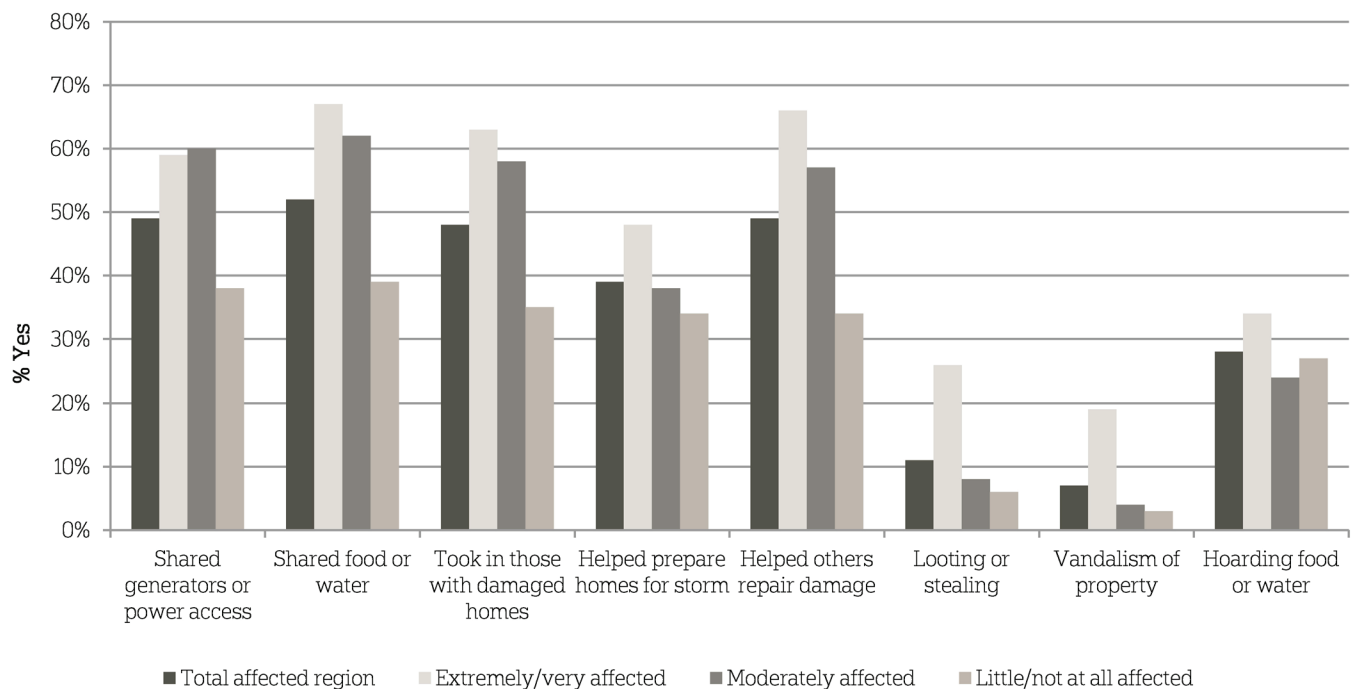
Some individuals also report the occurrence of activities that go against social norms, albeit with less frequency. Just 11 percent of those in the affected region report seeing looting or stealing during or immediately after Superstorm Sandy. Even fewer (7 percent) report vandalism of property. Only 28 percent of individuals saw neighbors hoarding food or water, roughly half the number that report neighbors sharing these resources.

Compared to the entirety of the affected region, those in extremely or very affected neighborhoods report higher levels of both positive and negative social behaviors before, during, and after Superstorm Sandy. Nearly 6 out of 10 report seeing neighbors share generators or access to power in highly affected neighborhoods compared to 5 out of 10 in the affected area at large. Sixty-seven percent report neighbors sharing food or water, which is 15 percentage points higher than the

total for the entire affected region. Individuals reporting neighbors taking others into their homes was also 15 percentage points higher (63 percent) in highly affected neighborhoods. People were more likely to help neighbors prepare their homes for the storm (48 percent, 9 points higher) and help them repair the damage afterward (66 percent, 17 points higher) as well.

However, reports of looting (26 percent) and vandalism (19 percent) were also more frequent in extremely or very affected neighborhoods than in less-affected areas. These totals are 15 percentage points and 12 percentage points higher, respectively, than in the affected region as a whole. The hoarding of food and water was also slightly more common in these neighborhoods, with 34 percent of individuals reporting such behavior.

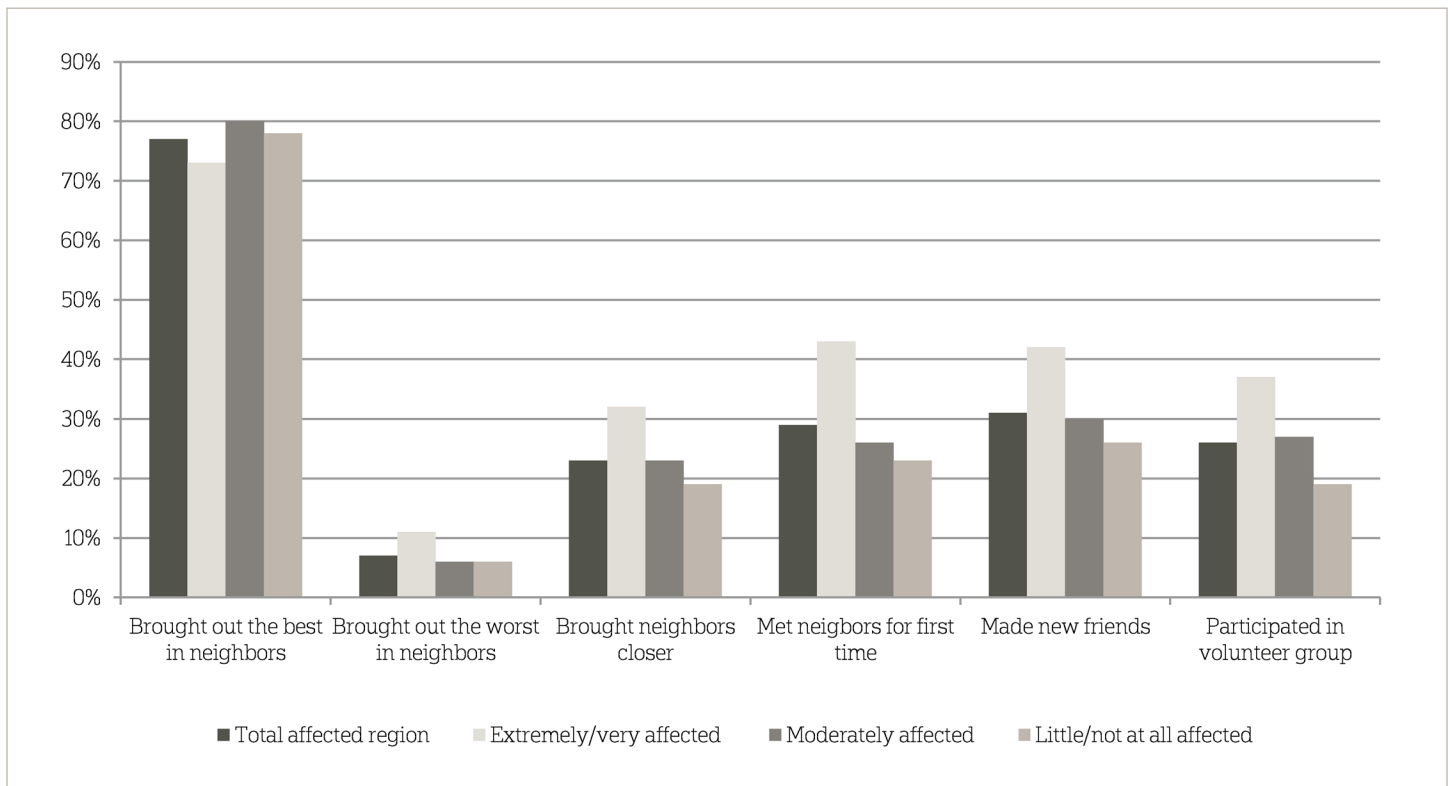
Did any of the following happen in your neighborhood during or immediately after Superstorm Sandy? (reported by level of neighborhood impact)



While there is no doubt that the storm caused extensive damage, some individuals in the affected region do report positive social impacts from the storm. Almost a quarter, 23 percent, feel that the storm actually brought people in their neighborhood closer together, while 75 percent report they are about the same as before the storm and 1 percent say they are more distant. Three out of ten individuals in the area affected by the storm met neighbors for the first time or say they made new friends as a result of Superstorm Sandy. One out of four say they participated in a volunteer or community service group as a result of the storm.

Despite reporting higher rates of positive behaviors like sharing access to power and repairing damaged homes, those in extremely or very affected neighborhoods were less likely to say Superstorm Sandy brought out the best of those in their neighborhood (73 percent) and more likely to say it brought out the worst (11 percent) when compared to those in the broader affected region.

Other changes in the social context of communities were more pronounced in the neighborhoods most highly affected by the storm. Individuals were more likely to meet neighbors for the first time (43 percent compared to 29 percent in the affected region as a whole), make new friends (42 percent compared to 31 percent), and participate in a volunteer or community service group (37 percent compared to 26 percent). And overall, more than 3 out of 10 individuals felt that people in their neighborhoods are now closer to one another than they were before the storm. Less than 1 percent say that those in their neighborhood are more distant from one another than they were before the storm.

Social outcomes after Superstorm Sandy by neighborhood level of impact

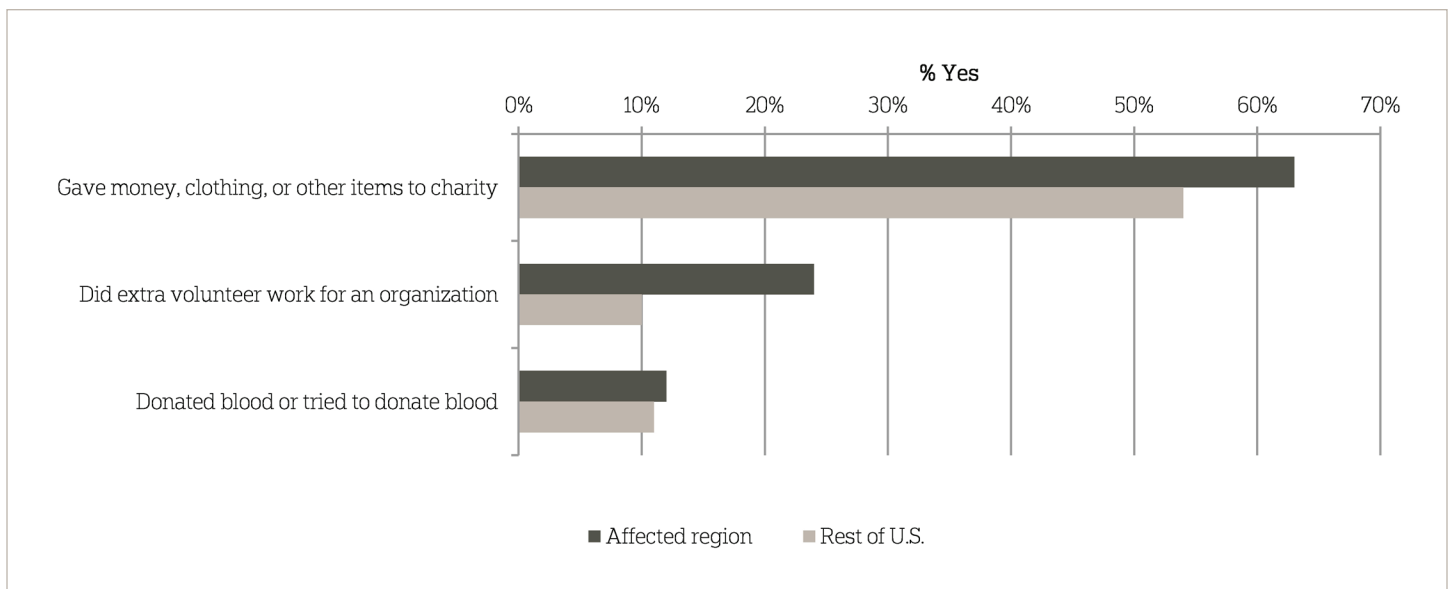
SUBSTANTIAL NUMBERS OF AMERICANS PROVIDED HELP TO SUPERSTORM SANDY VICTIMS, ESPECIALLY THOSE WHO WERE IN THE AFFECTED AREA THEMSELVES.

Superstorm Sandy's impact inspired a majority of Americans to provide assistance to those affected by the storm. Sixty-three percent of those in the storm's path report giving money, clothing, or other items to charity as a direct result, while 54 percent of other Americans report doing so. Twenty-four percent of those in the affected area did volunteer work directly related to the storm, as compared with 10 percent in the rest of the United States. Nearly equivalent percentages of the two groups report donating blood or trying to donate blood (12 percent in the affected region and 11 percent in the rest of the country).

Those offering help from other parts of the country were not limited to individuals who knew someone directly impacted by the storm. Of Americans outside the storm's path, 78 percent say Sandy did not really impact any of their friends or family, and yet many of them offered some type of assistance to the victims of the storm. Fifty-one percent of those Americans who report that Sandy did not have a serious impact on any friends or family members report that they

donated money, clothing, or other items to charity, 10 percent donated or tried to donate blood, and 7 percent did extra volunteer work for an organization.

Of the 22 percent who say the storm had an impact on their friends or family, 59 percent report that they personally donated their time or money to help these friends or family members. These people were also more likely to donate money, clothing, or other items to charity than those who didn't know anyone impacted by the storm (69 percent vs. 51 percent) and to do extra volunteer work for an organization (20 percent vs. 7 percent).

Percent of Americans who provided assistance to Superstorm Sandy victims

AMERICANS SUPPORT GOVERNMENT ASSISTANCE FOR REBUILDING IN AREAS SUSCEPTIBLE TO NATURAL DISASTERS OVER BUYOUTS.

A majority of Americans favor state governments providing money to help local residents rebuild in the same neighborhood in the wake of disasters such as landslides, earthquakes, hurricanes, or flooding, even when the neighborhoods are known to be susceptible to natural disasters. Despite the risks for future disasters, 65 percent of Americans favor this type of assistance. Those who report being extremely or very affected by Superstorm Sandy have the highest level of support at 78 percent.

At least 7 in 10 Democrats in both the affected area (75 percent) and nationally (71 percent) favor state governments providing money to local residents to help them rebuild in the same neighborhood. Democrats are more likely to support the policy than Independents, both nationally and in the affected region, but 75 percent of Independents in the affected region are in favor of this idea compared with 56 percent of Independents in other parts of the country. Sixty-one percent of Republicans nationally favor state governments providing money to help residents of disaster prone areas rebuild in

their same neighborhood. In the affected area, support among Republicans drops to 45 percent, significantly less than Democrats and Independents from these affected areas.

A smaller majority of Americans favor state governments assisting relocation after such disasters by having the state buy homes so residents can move to a safer area. Fifty-seven percent in the affected region favor this approach, as do 53 percent in the rest of the country. Support for this approach within the affected area is lower for those who report being extremely or very affected (52 percent) than moderately affected (61 percent) or only a little or not at all affected (58 percent). Democrats are also more likely than Republicans and Independents to be in favor of state governments buying homes destroyed by natural disasters so residents can move to a safer area in both the affected area and nationally. Sixty-five percent of Democrats in the affected areas are in favor of the idea compared with 45 percent of both Independents and Republicans.

INDIVIDUALS AFFECTED BY SUPERSTORM SANDY ARE SLIGHTLY LESS OPTIMISTIC ABOUT FUTURE DISASTER PREPAREDNESS AND RECOVERY THAN ARE OTHER AMERICANS.

The survey included questions about individuals' feelings about preparedness for major disasters in the future, on both a personal and neighborhood level. In terms of personal preparedness for a major disaster, those in the area affected by Sandy feel slightly less prepared than those in the rest of the country, with 41 percent reporting that they are personally not too well prepared or not at all prepared, compared to 33 percent in the rest of the country. Those who report being extremely or very affected by Superstorm Sandy are less likely to feel unprepared (31 percent) than those who were moderately affected (42 percent) or only a little or not at all affected (46 percent). In both the affected area and in other parts of the country, men are more likely than women to feel they are personally extremely or very well prepared to handle a major disaster if it happened in their neighborhood today (24 percent vs. 13 percent in the affected area; 29 percent vs. 17 percent in the rest of the country).

Individuals in the affected region and those in the rest of the United States are nearly equal in terms of expectations about neighborhood preparedness, with approximately 4 in 10 of all Americans saying their neighborhoods are unprepared for a major disaster. Those who were in the storm's path are more pessimistic about recovery than other Americans, with 25 percent reporting that they are not too or not at all confident of a quick neighborhood recovery following a major disaster, compared to 19 percent for individuals outside of the affected area. The proportion is even higher for those who report being extremely or very affected by Superstorm Sandy, with only 34 percent feeling only a little or not at all confident about future recovery.

INDIVIDUALS IN THE SUPERSTORM SANDY REGION BELIEVE A SIMILAR DISASTER IS LIKELY AND ARE MORE INCLINED TO BELIEVE THESE DISASTERS ARE BECOMING MORE SEVERE COMPARED TO OTHER AMERICANS.

Americans who experienced Superstorm Sandy first hand are more likely to fear future disasters like hurricanes and severe flooding than are those who live in other parts of the country. Half of those in the area affected by the storm think their communities are extremely or very likely to be impacted by a hurricane that could cause serious destruction or loss of life within the next five years. This varies considerably based on how much individuals were personally affected by Superstorm Sandy. The percentage of those who feel that a hurricane is extremely or very likely to impact their communities within the next five years is highest for those who report being extremely or very personally affected by Sandy (65 percent), and lower for those who were moderately affected (53 percent) and only a little or not at all affected (39 percent). There is a similar trend for expectations about severe flooding. Overall, 35 percent say that this is extremely or very likely to happen in their community in the next five years (with 55 percent of those extremely or very affected, 33 percent of those moderately affected, and 26 percent of those affected only a little or not at all).

Additionally, those in the affected region are more concerned about the severity of future weather-related disasters, with three-quarters saying these are becoming more severe as opposed to staying about the same or becoming less severe. In comparison, two-thirds of Americans in other parts of the country believe they are becoming more severe.

Those in the densely populated affected area in the New York and New Jersey region also think that terrorist attacks are more likely to occur in their communities (34 percent) than those in the rest of the country (12 percent). Expectations about health emergencies caused by contagious viruses or diseases follow a similar trend, with 19 percent in the affected area thinking this type of impact is extremely or very likely in the next five years, compared to 11 percent outside the affected area.

IN TIMES OF DISASTER, AMERICANS LOOK TO FIRST RESPONDERS, FAMILY, FRIENDS, AND NEIGHBORS AS THE MOST RELIABLE SOURCES OF HELP.

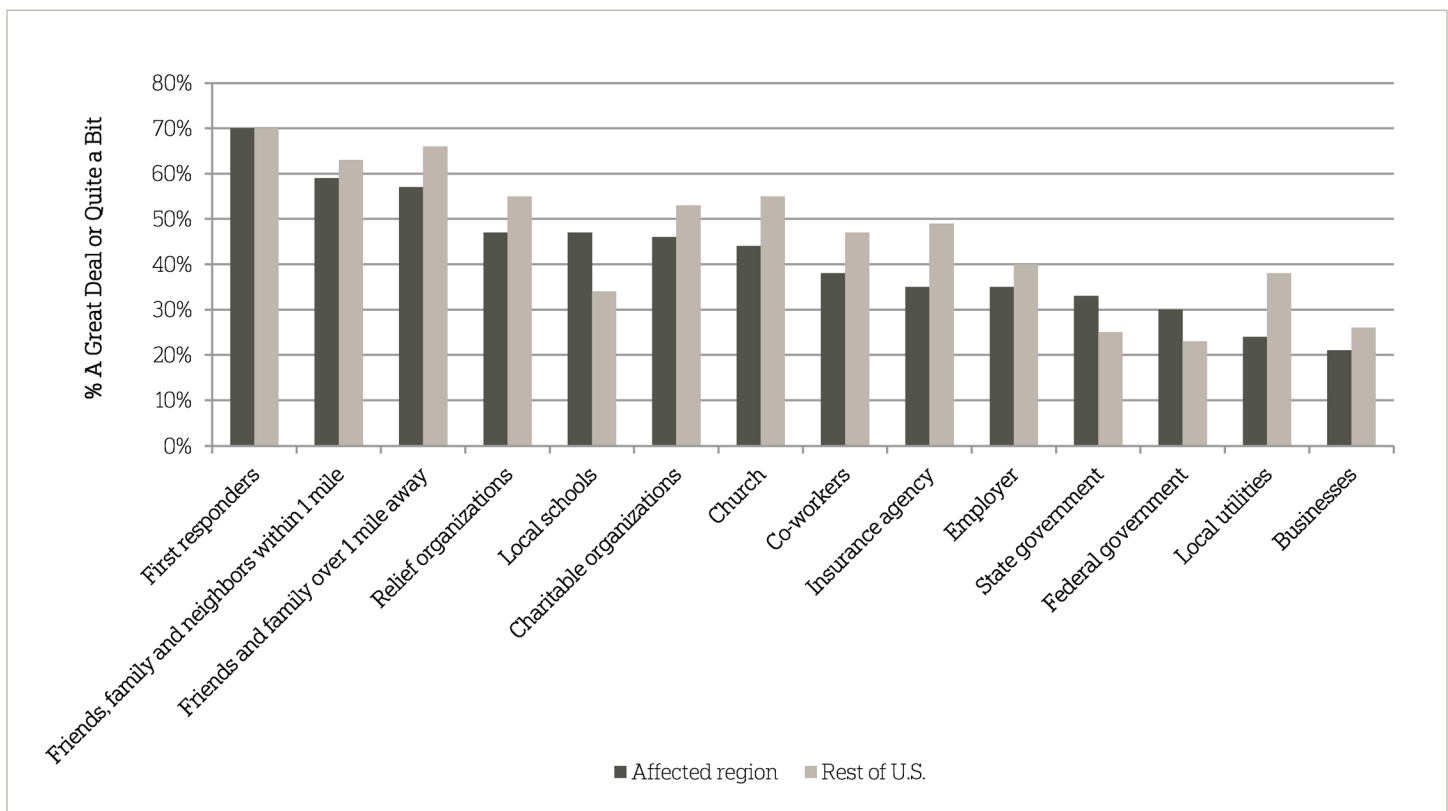
When asked to think about who would be there to help them should a major disaster happen in their neighborhood today, 7 in 10 Americans say that they would be able to rely a great deal or quite a bit on their local police, fire department, ambulance, and other first responders for help. This is true both in the area affected by Superstorm Sandy and in the rest of the country.

A majority of Americans also feel that they can rely heavily on friends and family for help. In the region impacted by Sandy, 59 percent say they would be able to rely quite a bit or more on friends, family, and neighbors who live within a mile of their home, and 57 percent say the same about friends and family who live further away. Those figures are slightly higher for Americans outside of the storm's path (63 percent and 66 percent, respectively).

Americans outside of the area affected by Sandy expect that they could rely on several other sources more heavily than those in the storm region, including relief organizations like the American Red Cross (55 percent vs. 47 percent), their churches and religious communities (55 percent vs. 44 percent), charitable organizations like food banks or the Salvation Army (53 percent vs. 46 percent), their co-workers (47 percent vs. 38 percent), their insurance companies (49 percent vs. 35 percent), their utility companies (38 percent vs. 24 percent), and local businesses (26 percent vs. 21 percent).

There are a few sources of help that those who were in the storm's path believe they can rely on more heavily than other Americans do, and all are government based. These include local schools (47 percent vs. 34 percent), state government (33 percent vs. 25 percent), and the federal government, including FEMA (30 percent vs. 23 percent).

Percent of Americans who believe they could rely on various sources for help in the event of a major disaster



ABOUT THE STUDY

This survey was conducted by The Associated Press-NORC Center for Public Affairs Research with funding from The Rockefeller Foundation. The survey was conducted from April 9 through June 2, 2013. AP and NORC staff collaborated on all aspects of the study, with input from NORC's Public Health Research department; Security, Energy, and Environment department; and AP's subject matter experts.

This nationally representative survey was conducted via telephone with 2,025 American adults, including an oversample of 1,007 adults residing in the Superstorm Sandy affected region at the time of the storm. The affected region was defined as the 16 counties in New York and New Jersey listed in the table below. These 16 counties all received a FEMA impact rating of "very high" based on a composite indicator of wind, storm surge, and precipitation. Eligibility for the survey was defined as any adult who lived in the targeted counties on October 29, 2012. To define the sample frame for selection of individuals most likely to have high levels of

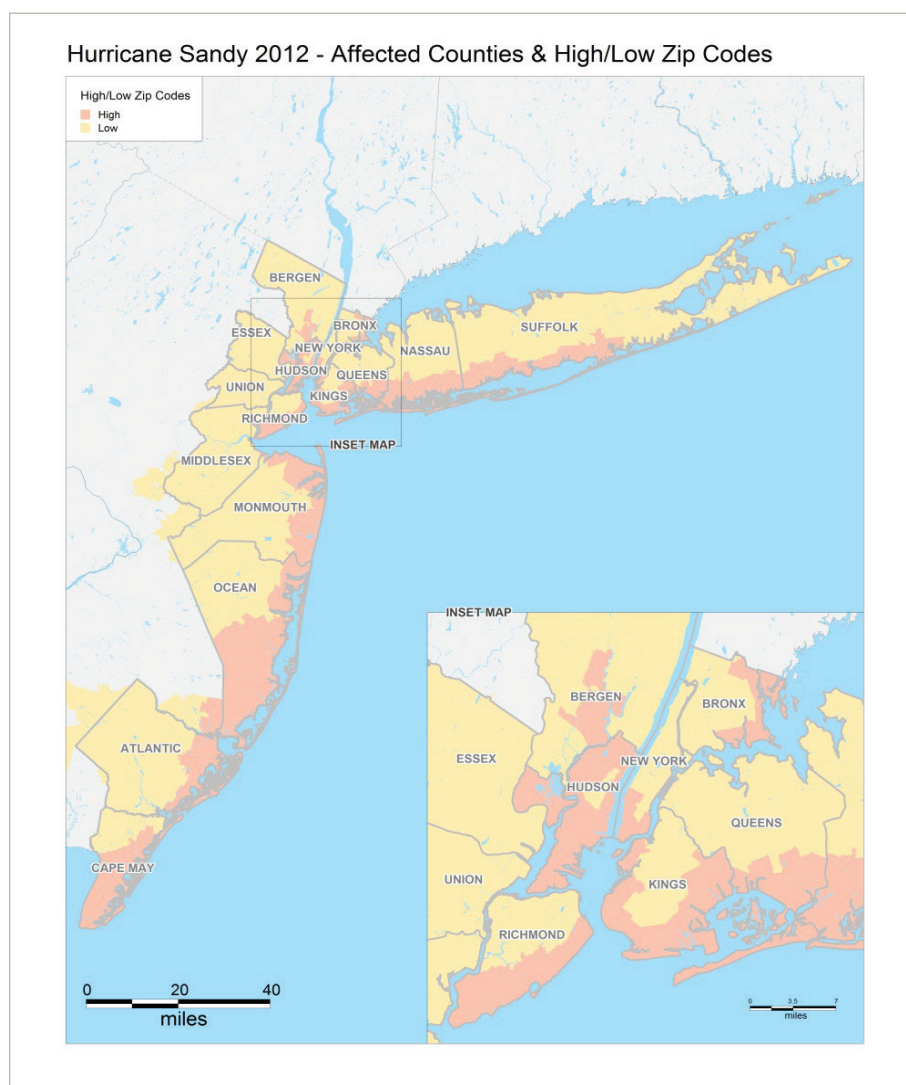
impact, the sample was stratified at the Census tract level based on the density of geocoded FEMA loan applications. Tracts with five or more loan applications near other tracts with five or more loan applications were defined as the most severely impacted areas, as illustrated in the map below.

Our sampling frame is constructed from two sources. First, we identify the landline telephone exchanges for which a majority of listed telephone numbers is located within the tracts in question. The second part of our sampling frame consists of cellular rate centers that are themselves situated mostly within the "very high" tracts; it is clear that some degree of error is introduced by respondents who reside in areas not associated with their mobile telephone numbers. Location within the "very high" area during the interview is determined by associating the ZIP code for the respondent's primary residence on October 29, 2012, with the set of tracts in question.

List of counties affected by Superstorm Sandy

County FIPS Code	State	County
34001	New Jersey	Atlantic
34003	New Jersey	Bergen
34009	New Jersey	Cape May
34013	New Jersey	Essex
34017	New Jersey	Hudson
34023	New Jersey	Middlesex
34025	New Jersey	Monmouth
34029	New Jersey	Ocean
34039	New Jersey	Union
36005	New York	Bronx
36047	New York	Kings
36059	New York	Nassau
36061	New York	New York
36081	New York	Queens
36085	New York	Richmond
36103	New York	Suffolk

Map of the affected region



The sample included 952 completed interviews conducted on cell phones and 1,073 completed interviews conducted on landline telephones. Cell phone respondents were offered a small monetary incentive for participating, as compensation for telephone usage charges. Interviews were conducted in both English and Spanish, depending on respondent preference. All interviews were completed by professional interviewers who were carefully trained on the specific survey for this study.

The final response rate for the national sample was 13 percent, based on the widely accepted Council of American Survey Research Organizations (CASRO) method. Under this method, our response rate is calculated as the product of the resolution rate (67 percent), the screener rate (32 percent), and the interview completion rate (61 percent).

The overall margin of error for the national sample was ± 4.0 percentage points. The margin of error for the affected region sample was ± 4.7 percentage points. The margin of error for the sample in the unaffected region was ± 4.2 percentage points. Sampling weights were calculated to adjust for sample design aspects (such as unequal probabilities of selection) and for nonresponse bias arising from differential response rates across various demographic groups. Poststratification variables included age, sex, race, region, education, and landline/cell phone use. The weighted data, which thus reflect the U.S. general population aged 18 years old or older, were used for all analyses. The weighted data also reflect the two sub-populations of interest, adults living in the Superstorm Sandy affected areas on October 29, 2012, and adults living in the rest of the United States.

All analyses were conducted using STATA (version 12), which allows for adjustment of standard errors for complex sample designs. All differences reported between subgroups of the U.S. population are at the 95 percent level of statistical significance, meaning that there is only a 5 percent (or less) probability that the observed differences could be attributed to chance variation in sampling. Additionally, bivariate differences between subgroups are only reported when they also remain robust in a multivariate model controlling for other demographic, political, and socioeconomic covariates.

A comprehensive listing of all study questions, complete with tabulations of top-level results for each question, is available on the AP-NORC Center for Public Affairs Research website: www.apnorc.org.

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The Center will publicize the results of all studies and make all datasets and study documentation available to scholars and the public.

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