FLORIDA STATEWIDE REGIONAL EVACUATION STUDY PROGRAM

> REGIONAL BEHAVIORAL ANALYSIS SUMMARY







Volume 1-9

Southwest Florida Region Technical Data Report

CHAPTER III REGIONAL BEHAVIORAL ANALYSES

Prepared by

EARL J. BAKER HAZARDS MANAGEMENT GROUP, INC.





This page intentionally left blank.

Table of Contents

Introduction 1
Methods 2
Data Collection and Sample Sizes 2
Questionnaire
Use of Survey Findings 3
Planning Assumptions for Residents 6
Organization of Tables 6
Working Data Tables 8
Evacuation Rates 8
Out-of-County Trips10
Type of Refuge10
Percent of Available Vehicles10
Evacuation Timing11
Planning Assumptions for Vacationers14
Appendix A Planning Assumptions16
Appendix A-1 Planning Assumptions for Charlotte County
Appendix A-2 Planning Assumptions for Collier County
Appendix A-3 Planning Assumptions for Glades County
Appendix A-4 Planning Assumptions for Hendry County
Appendix A-5 Planning Assumptions for Lee County
Appendix A-6 Planning Assumptions for Sarasota County42

ppendix B Working Data Tables	.48
Appendix B-1 Charlotte County Working Data Tables	. 50
Appendix B-2 Collier County Working Data Tables	. 56
Appendix B-3 Glades County Working Data Tables	.62
Appendix B-4 Hendry County Working Data Tables	.68
Appendix B-5 Lee County Working Data Tables	.74
Appendix B-6 Sarasota County Working Data Tables	.80
Appendix B-7 Southwest Region Working Data Tables	.86

Statewide Regional Evacuation Study Behavioral Analysis

Southwest Florida Region

I. Introduction

A study was conducted to provide guidance in selecting behavioral assumptions to be used in evacuation transportation modeling and shelter planning. For residents the process included telephone interviews with residents of the region and analysis of that and other data to derive indications of how the population would respond in the event of certain threats, most notably hurricanes. The SRES survey data was used in conjunction with data from previous evacuation surveys to derive probable behaviors to be used as planning assumptions. For tourists planning assumptions were based on generalizations about tourist behavior in hurricane evacuations derived from previous studies. SRES transportation and shelter analyses might employ behavioral assumptions that differ from those found in this document.

Planning assumptions were developed for five evacuation behaviors:

- **Evacuation rate** the percentage of people who will leave their home (residents) or accommodation (vacationers) to go someplace safer in response to a hurricane threat
- **Out-of-county trips** Percent of evacuating households (residents) or parties (vacationers) who will travel to destinations out of their county of residence (residents) or accommodation (vacationers)
- Type of refuge Percent of evacuating households (residents) or parties (vacationers) who will seek refuge in public shelters, the homes of friends and relatives, hotels and motels, and other locations such as churches and workplaces. For vacationers their own residence constituted an additional type of refuge.
- **Percent of available vehicles** Vehicles that will be used by evacuating households (residents) or parties (vacationers) as a percentage of the total number of vehicles available in the household that could be used
- **Evacuation timing** Percent of total evacuating households (residents) or parties (vacationers) who will leave their homes (residents) or accommodations

(vacationers) at various times, with respect to when an evacuation notice is issued by public officials.

II. Methods

A. Data Collection and Sample Sizes

To support the behavioral analysis for residents, telephone interviews were conducted by Kerr & Downs Research with 1900 residents of the Southwest Florida region – 400 in each coastal county and 150 in each non-coastal county. More interviews were done in coastal counties so that distinctions could be made among hurricane evacuation zones within the coastal counties. The 400 interviews in coastal counties were allocated among evacuation zones after consultation with county emergency management officials in each county. Sample sizes, also broken down according to whether the respondent lived in a site-built home or a mobile home (including manufactured homes), are shown in Table 1. The total in Table 1 excludes respondents whose residence could not be identified as site-built or mobile home.

	Site-built Homes	Mobile Homes	SB + MH
Charlotte Cat 1	88	12	100
Charlotte Cat 2	90	9	99
Charlotte Cat 3	94	6	100
Charlotte Cat 4-5	60	10	70
Charlotte Non-surge	60	10	70
Collier Cat 1	20	7	27
Collier Cat 2-3	133	13	146
Collier Cat 4-5	147	3	150
Collier Non-surge	47	3	50
Lee Cat 1, North	97	2	99
Lee Cat 1, South	84	16	100
Lee Cat 2-3	88	10	98
Lee Cat 4-5	43	7	50
Lee Non-surge	47	3	50
Sarasota Cat 1	81	19	100
Sarasota Cat 2	85	14	99
Sarasota Cat 3	92	6	98
Sarasota Cat 4-5	46	4	50
Sarasota Non-surge	47	3	50
Glades (Non-coastal)	75	75	150
Hendry (Non-coastal)	101	45	146
TOTAL	1614	268	1882

Table 1. Sample sizes in Southwest Florida counties

Some questions in the survey were asked of only a portion of the sample. For example, only respondents who were living in the region in 2004 were asked about their response in Charley. Only those who left their homes to go someplace safer in Charley were asked where they went when they left their homes. Therefore, for certain questions, sample sizes were smaller than the figures shown in Table 1.

Other surveys with the public have been conducted in the region with respect to hurricane evacuation. Surveys have been a part of some of the region's earlier hurricane evacuation studies, one as recently as 2001. At least some of the Southwest Florida counties were included in surveys conducted following Charley, Frances, and Jeanne, but the 2007 SRES survey included questions about those storms with a larger sample. A survey was administered in Lee County following Wilma. Data from the previous surveys was used to supplement the 2007 SRES survey.

B. Questionnaire

Questions used in the telephone interviews were developed for use statewide as part of the Statewide Regional Evacuation Study. They were supplemented by questions submitted by the Regional Planning Council on behalf of counties in the region. Most questions in the survey dealt with hurricane evacuation:

- Information sources
- Perceived vulnerability
- Evacuation intentions
- Obstacles to evacuation
- Evacuation behavior in past hurricane threats
- Demographics

In addition to the hurricane questions, a portion of respondents in each county were asked questions about evacuation in freshwater flooding, hazardous material accidents, wildfires, and nuclear power plant accidents.

Responses to all questions in the survey are reported in the *Statewide Regional Evacuation Study Program: Southwest Florida Region Behavioral Survey Report,* prepared by Kerr & Downs Research, including a copy of the questionnaire.

C. Use of Survey Findings

Responses to individual survey questions alone are not usually good indicators of how residents will respond in actual threats. A mix of the following indicators was used in deriving behavioral assumptions to use in planning:

- Intended responses
- Responses in past threats
- Responses in past threats in other locations
- Factors usually correlated with actual response

1. Intended Responses

Some of the survey questions asked respondents what they would do in certain situations – whether they would evacuate, where they would go, and so forth. Answers to those questions constitute intended responses and they provide a very straightforward indicator of behavior. Unfortunately, intended responses often do not match actual responses. That is, people often don't do what they said they would do. In some cases there are statistical adjustments to intended responses that result in much closer matches to actual behavior. For example, in most locations actual use of public shelters is only about half the level indicated by intended response surveys.

2. Actual Responses

A number of survey questions asked interviewees how they responded in past hurricane threats. Depending on the county, Southwest Florida survey participants were asked about their evacuation behavior in three of the following hurricanes: Charley, Frances, Ivan, Jeanne, and Wilma. An earlier survey in the region had provided actual response data about Georges. Responses in past threats can be good predictors of future response, but only if the past threats are similar to future threats. In the Southwest Florida Region responses to the threats posed by the hurricanes asked about in the survey were not as great as those that could occur in future storms. Therefore, the evacuation participation rates observed in those storms are not necessarily good indicators of what it is reasonable to plan for in future threats. For other behaviors such as type of refuge and destination, past responses can be compared for consistency from one evacuation to another and can be used as a comparison with intended responses.

3. Past Response in Other Locations

Although all places are different, responses and patterns observed in one set of locations are often good indicators of what can occur elsewhere, when conditions are similar. This is particularly useful when planning for threats for which there is no reliable response data for similar threats for the region. As part of the SRES, twelve different hurricane threats were asked about in one county or another. In addition, public response has been documented in many other hurricane threats both in and out of Florida, some of which are relevant to planning in the Southwest Florida region. For example, in the great majority of evacuations fewer than 15% of evacuees leave on their own, prior to an evacuation notice being issued by public officials. Due to the consistency of that finding, it is reasonable to apply it to the Southwest Florida counties.

4. Statistical Predictors

Data from other hurricane evacuation surveys like those described above have been analyzed statistically to identify factors that have been correlated with evacuation behavior. Certain variables have been found to predict actual response better than others. For example, perceived vulnerability, actual vulnerability (e.g., evacuation zone), housing type, and hearing evacuation orders are all good predictors of whether residents will evacuate. The SRES survey measured perceived vulnerability, evacuation zone, housing type, and expectation of being told to evacuate, and those factors were combined to provide an indication of whether interviewees would evacuate in certain storm threats, from certain locations, and from certain types of housing. Other variables were used to provide an indication of other evacuation behaviors.

5. Combining Information

There is no simple one-rule-fits-all technique for using the above information in deriving behavioral assumptions for planning. The best solution is to employ the best available mix of indicators, relying most heavily on the best information available for each behavior and scenario in question, for a particular county and storm threat. When good, reliable actual response information was available for a certain storm threat scenario, it was relied on more than other types of information. When actual response information was lacking, a combination of intended response, trends from other locations, and application of predictor variables was used.

D. Sample Size Considerations

SRES survey statistics were derived from the sample described previously (section I.A. above). The sample provides an estimate of values for the population of people from which the sample was drawn. For example, a sample of Collier County residents was interviewed for the purpose of estimating how the larger population of Collier County residents would respond to the same questions.

The sampling plan used in the SRES survey was designed to provide statistically useful county-level data, given budgetary constraints. However, sample estimates become less reliable statistically when the responses are disaggregated, as they were in the analyses conducted as part of the SRES. When responses are broken down by evacuation zone within a county and then by housing type, population-level differences among zones and between housing types are not always as large as they might appear in the sample. This is because sampling error increases when sample size decreases. Therefore, differences in the sample might not be large enough to support a conclusion that similar differences exist in the population from which the sample was selected, due to sampling error.

Aggregating results across counties helps overcome zonal and housing disaggregation problems. However, county variations – if they exist – are masked when results are aggregated at the regional level. The analysis looked as survey results at both the county and regional levels, relying on county-level data to the extent that sample sizes justified that level of analysis, but relying more on regional data when county-level sample sizes were too small.

This is especially true for actual response data. Many SRES respondents were not living in their current county when past storm threats occurred, so they were not asked about their response in those storms. If a resident was living in the area at the time but didn't evacuate, that person couldn't be asked where he or she went (e.g., public shelter, outof-county). Therefore, for certain actual response questions, regional statistics were more meaningful than county statistics.

III. Planning Assumptions for Residents

A. Organization of Tables

Planning assumptions for residents are shown in Appendix A. Appearing below each table there is a brief description of the content of the table. At the beginning of the appendices there is an explanation of how to read the tables.

1. Coastal Counties

For each coastal county there are 14 tables:

- 1. Evacuation rate for site-built homes
- 2. Out-of-county trip rates for site-built homes
- 3. Percent of available vehicles to be used by site-built homes
- 4. Public shelter use rates for site-built homes
- 5. Friend and relative use rates for site-built homes
- 6. Hotel and motel use rates for site-built homes
- 7. Other refuge use rates for site-built homes
- 8. Evacuation rate for site-built homes
- 9. Out-of-county trip rates for mobile and manufactured homes
- 10. Percent of available vehicles to be used by mobile and manufactured homes
- 11. Public shelter use rates for mobile and manufactured homes
- 12. Friend and relative use rates for mobile and manufactured homes
- 13. Hotel and motel use rates for mobile and manufactured homes
- 14. Other refuge use rates for mobile and manufactured homes

In each table for coastal counties there are planning assumptions for six evacuation zones:

- 1. Areas needing to evacuate due to storm surge flooding from category 1 hurricanes
- 2. Areas needing to evacuate due to storm surge flooding from category 2 hurricanes
- 3. Areas needing to evacuate due to storm surge flooding from category 3 hurricanes
- 4. Areas needing to evacuate due to storm surge flooding from category 4 hurricanes
- 5. Areas needing to evacuate due to storm surge flooding from category 5 hurricanes
- 6. Areas not needing to evacuate due to storm surge flooding from hurricanes

Zones were defined relative to zones currently used by each county. In instances where counties currently aggregate zones the planning assumptions were interpolated for intermediate zones. For example, if a county used zones 1-2, 3, and 4-5, trends across those zones were used to specify assumptions for zones 1, 2, 3, 4, and 5.

2. Non-coastal Counties

For each non-coastal county there are seven tables. Data for site-built homes and mobile or manufactured homes are shown in the same tables for non-coastal counties because there are no surge-related evacuation zones. The tables for non-coastal counties are:

- 1. Evacuation rate for site-built homes and mobile or manufactured homes
- 2. Out-of-county trip rates for site-built homes and mobile or manufactured homes
- 3. Percent of available vehicles to be used by site-built homes and mobile or manufactured homes
- 4. Public shelter use rates for site-built homes and mobile or manufactured homes
- 5. Friend and relative use rates for site-built homes and mobile or manufactured homes
- 6. Hotel and motel use rates for site-built homes and mobile or manufactured homes
- 7. Other refuge use rates for site-built homes and mobile or manufactured homes

Within each table planning assumptions are provided for category 1, 2, 3, 4, and 5 hurricanes.

B. Working Data Tables

Responses for all survey questions are included in the Survey Data Report prepared by Kerr & Downs Research. In deriving planning assumptions, responses to certain questions are more important than others, and they are used more effectively if organized differently than as they appear in the Survey Data Report. The most salient variables from the survey were put into working data tables for use in supporting the derivation of planning assumptions, and the tabulations appear as Appendix B. There is an appendix for each county and one for the region.

The tabulations include responses to questions about perceived vulnerability, intended response, and actual response in past hurricane threats. The tables are arrayed to facilitate inspection of responses most relevant to derivation of specific planning assumptions (evacuation rate, destinations, refuge, vehicles). If there were too few responses to a question for the data to be statistically useful, cells in tables were left blank (with a hyphen in the cell). The tables in the working data table appendices are not intended to be replacements for the more complete description of the survey data included in the Survey Data Report. Readers should refer to the Survey Data Report for a more thorough understanding of the questions used to generate the background data tables.

The regional aggregation of background data is more reliable statistically due to the larger sample size, particularly for actual response data and when looking at responses separately by zone or housing type. County data was used to differentiate planning assumptions among counties when differences were large enough to warrant differentiation.

C. Evacuation Rates

Evacuation rates refer to the percentage of people who will leave their homes to go someplace safer during a hurricane threat. This is a critical variable for planning because it drives the number of vehicles on the roadways during an evacuation. Responses will vary even for hurricanes of the same intensity, depending on how great the threat appears to be to one's specific location, as well as other factors. Evacuation rates on the periphery of warning areas tend to be lower than in areas closest to the projected path of a threatening storm. A strong category 4 hurricane which has maintained its intensity for a day or more prior to landfall will elicit greater response than one which intensifies from a 2 to a 4 just six hours prior to landfall or one which weakens from a 4 to a 2 twelve hours prior to landfall. Both media attention and actions by public officials will vary from one strong category 4 hurricane to another due to similar considerations. A large category 4 storm will receive greater attention from media and officials than a small category 4 storm (e.g., Floyd, "Andrew's Big Brother"). Actions by public officials have a great impact on evacuation rate. People are much

Statewide Regional Evacuation Studies Program

more likely to evacuate, especially in strong storms, when they believe they have been ordered to evacuate than when they believe they have received a recommendation to evacuate or haven't been told at all whether they should evacuate. A problem is that many people (often 30% in category 1 evacuation zones) fail to hear, comprehend, or believe that evacuation orders apply to them. The methods and aggressiveness used to disseminate evacuation notices affect evacuation rates.

The planning assumptions for evacuation rates are the *maximum probable rates*. They assume that a threatening storm of a given category poses its greatest threat to each county. That is,

- 1. The storm's forecast track is over the county early and throughout at least a full day of the threat.
- 2. The storm has been at the specified intensity for at least a day of the threat and remains at that intensity until landfall.
- 3. The storm makes landfall in the county.

These conditions aren't met very often, and recent threats in the Southwest Florida region have not generated evacuation rates as high as some of those in the planning assumptions. In fact in the 12 storms asked about in one county or another as part of the SRES the highest evacuation rates observed for site-built homes in the category 1 evacuation zone in any county was 80% (Santa Rosa in Ivan and Nassau in Floyd). But evacuation rates over 90% have been documented in other threats (e.g., Escambia in Frederic, parts of Pinellas in Elena, most of coastal Georgia and southern South Carolina in Floyd, and Galveston, Texas in Rita).

Applying the county planning assumptions to the entire region overstates evacuation rate for the region, because not every county in the region will meet the conditions. However, one doesn't know in advance the county to which they will apply, if any.

The planning assumptions assume that officials issue mandatory evacuation orders for surge-related evacuation zones for hurricanes of corresponding intensities (e.g., everyone in the category 1 evacuation zone is ordered to evacuate in a category 1 hurricane). It also assumes that all mobile homes and residents of manufactured housing are ordered to evacuate for hurricanes of all intensities.

The planning assumptions include shadow evacuation – people leaving from areas and structures not ordered by officials to evacuate. These assumptions can add substantially to the total number of people evacuating and generating shelter demand, but the phenomenon exists, particularly when conditions such as those enumerated above apply (storm is forecast for an extended period to strike the county, maintains its intensity, and makes landfall in the county). One reason that shadow evacuation occurs is that many people have misconceptions about their vulnerability (see Appendix B).

D. Out-of-County Trips

Many evacuees go farther than necessary to reach safety, and the planning assumptions indicate the percentage of evacuees who will go to destinations outside their own county. The Survey Data Report lists the actual destination (i.e., city) where intended evacuees said they would go and where actual evacuees have gone in the past, if they said they would go or went beyond their own neighborhoods. Going out-ofcounty can increase evacuation clearance times but has occurred in the past and will in the future until officials are more successful at dissuading evacuees from doing so. Very few out-of-county evacuees seek refuge in public shelters. The great majority go to the homes of friends and relatives or to hotels and motels.

E. Type of Refuge

There are separate tables for the percentage of evacuees who will go to public shelters, the homes of friends and relatives, hotels and motels, and other types of refuge (such as churches, workplaces, and second homes). Survey respondents tend to overstate their likelihood of using public shelters and understate their likelihood of going to the homes of friends and relatives. Actual refuge use is the best indicator, but in the Southwest Florida region there have been too few evacuees in past hurricane threats included in the survey at the county level to provide highly reliable estimates for future planning. Planning assumptions for the counties reflect a reduced value of the intended public shelter use figures unless actual response values were consistent with the intended behavior. The ability of evacuees to actually go to their intended refuge or to the places they have gone in the past will depend of the availability of those refuges in future threats.

F. Percent of Available Vehicles

Many evacuating households tend to take only a portion of the vehicles available to them, mainly to avoid separating the family more than necessary. The planning assumptions indicate the percentage of vehicles available to households that will be used in an evacuation. The Survey Data Report includes the number of vehicles available to evacuating households and the number they would take. The percent-ofavailable figures are derived from those data. Although planners could use the number of vehicles per household from the SRES survey and reported in the Survey Data Report, census data should provide better statistical estimates of the number of vehicles available to households, to which the percent-of-available multipliers can be applied. The SRES survey asked only about intended vehicle use, but a large number of post-storm surveys have asked about actual vehicle use, and the intended use figures tend to match the actual use figures well.

G. Evacuation Timing

Not all evacuees leave at the same time. Some leave before public officials issue evacuation notices, some leave very soon following issuance of evacuation notices, and some wait until shortly before they expect the threatening storm to arrive.

1. Evidence from Past Evacuations

Many surveys documenting response following hurricane evacuations have asked evacuees to indicate the time and date when they departed their homes. The responses have been graphed to depict cumulative evacuation curves. The curves show how the evacuation (on the y-axis) grew over time (on the x-axis), typically with a few people leaving early and then increasing to the point at which 100% of the evacuees had eventually departed. The curves indicate when vehicles enter the evacuation network as evacuating vehicles, not when they reached their destinations or when they made other trips in the network prior to evacuating.

In general a graph of when evacuees depart often looks like the letter "S." In some evacuations the "S" is compressed laterally (i.e., over time) to appear thin and upright. Those curves occur when all departures occur in a relatively short period of time. They usually happen when evacuation notices were not issued early enough due to an unexpected change in a storm's track, forward speed, or intensity. By the time evacuation notices are issued, little time remains before anticipated landfall, so evacuees leave with a sense of urgency corresponding to the threat. This would be referred to as a relatively "fast" or "quick" response.

In other evacuations the "S" is stretched laterally and covers more of the length of the line on which it appears, with departures being distributed over a longer length of time. It looks "flatter." In those cases evacuation notices were issued well in advance of anticipated landfall of the storm, and residents were aware that they had the luxury of waiting longer before departing if they choose to do so. Some evacuees do wait longer before leaving, but not all do. Departures are distributed over a longer period of time than in the first example. This might be referred to as a "slow" response.

There are also evacuation timing curves that fall between those two, resulting in an "S" that is less compressed than the first, but less stretched than the second. This sort of evacuation results when evacuation notices are issued earlier than in the first example, but not as early as in the second case.

In all three scenarios evacuees collectively take as much time as they believe is available to them. Perceptions about the urgency of the evacuation account for variations in whether the evacuation is "quick," "slow," or in between ("normal").

2. Curves for Planning

The three evacuation timing scenarios described above are depicted graphically in Figure 1, reflecting the three versions of the letter "S." The slowest of the three curves assumes that evacuation notices were issued at least 24 hours before landfall. The fastest of the three assumes that evacuation notices were issued just 12 hours prior to the anticipated onset of hurricane conditions.

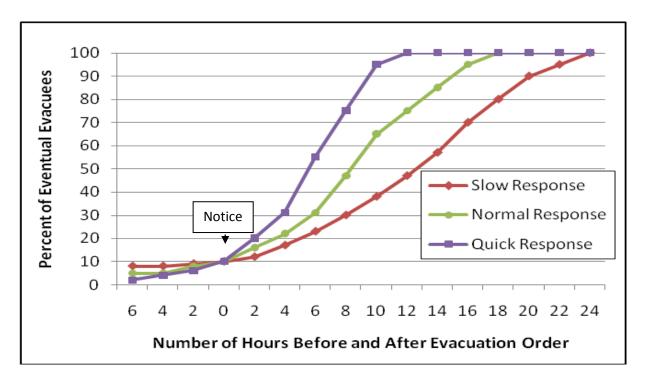


Figure 1. Evacuation timing curves for planning

3. Variations in the Curves

The haste in which evacuees depart is mainly a function of the perceived urgency of leaving sooner rather than later. Variations from storm to storm are usually a function of forecasts. If a forecast changes to indicate that landfall will occur sooner than previously anticipated, more people will started leaving. If intensity of a storm increases, indicating that additional areas of a community need to evacuate, departures from those areas will increase. These changes influence public response primarily through evacuation notices and instructions provided by local officials. Officials can significantly affect the distribution of departures by when they issue evacuation notices and how they word the notices and related announcements.

In each threat scenario occupants of less vulnerable areas (e.g., inland) will tend to wait longer to evacuate than those living in more hazardous locations (e.g., beaches). Variation in the curves is a function of variation in the perceived urgency of evacuating promptly, not demographics.

People prefer not to evacuate at night but will do so if necessary. Examples are Eloise, Elena, and Opal. Relatively few people leave prior to the issuance of evacuation notices by officials. People are willing to leave before watches and warnings are posted by the National Hurricane Center if asked to do so by local officials.

4. Examples of Actual Response Curves

Respondents to the SRES survey were not asked when they departed in past evacuations because too much time had passed between the evacuations and the interviews to trust the accuracy of recollections. The questions would also have made the interviews unacceptably lengthy. There are ample actual response curves that have been documented in other surveys.

Two-day Evacuations

If officials issue evacuation notices more than 24 hours prior to anticipated landfall, evacuation departures will be distributed over a period longer than 24 hours. Some evacuees will leave shortly after the evacuation notice during daylight hours, then departures will essentially stop on the evening of the first day, and then resume on the morning of the second day.

Most of the recent evacuations in Florida and elsewhere have taken place over a period of more than 24 hours. This has been the result of evacuation notices having been issued more than 24 hours prior to arrival of the storms. Curves were constructed for 11 different coastal regions in Floyd, for example, including four regions in Florida, and all 11 curves were distributed over more than a 24-hour period. All four of the 2004 major hurricanes in Florida (Charley, Frances, Ivan, and Jeanne) had evacuations that covered more than 24 hours. Evacuation departures in Katrina in Mississippi and Louisiana and in Rita in Texas in 2005 occurred over a period of two days or more. The same was true of Bertha and Fran in South Carolina in 1996, Georges in Florida in 1998, Lili in Texas and Louisiana in 2002, and Isabel in Virginia and Maryland in 2003.

One-day Evacuations

The prevalence of two-evacuations stems from good forecasts and a precautionary approach by public safety officials, particularly in stronger storms. If the National Hurricane Center goes forward with plans to extend the lead times for Hurricane Watches and Warnings by 12 hours, early issuance of evacuation notices will probably continue.

However, good early forecasts won't always be the case, or for other reasons evacuations notices won't be issued early enough to afford the luxury of having two days in which to evacuate. In those instances evacuations in certain areas will need to be rushed to completion following issuance of evacuation notices, and the duration of evacuations will be less than two days. If the goal of clearance time calculations is to estimate the minimum amount of time necessary to complete an evacuation safely, response curves of shorter duration than two days should be assumed.

The quickest of the one-day curves assumes that all evacuees depart within 12 hours of an evacuation notice being issued, with just 10% having left prior to the evacuation notice. Examples of approximately 12-hour response curves are Broward and Miami-Dade Counties in Andrew in 1992, Pinellas County in Elena in 1985, and Escambia County in Frederic in 1979. Storms in which evacuation departures were distributed over a 12 to 18 hour period include David in Miami-Dade in 1979 and Opal in northwest Florida in 1995. Eloise in northwest Florida in 1975 is a rare example of evacuation departures occurring over a period of just six hours, but in some locations as little as 45% of the public evacuated.

IV. Planning Assumptions for Vacationers

Compared to residents, there is relatively little data documenting how vacationers respond to hurricane threats, and no SRES survey was conducted with vacationers to ascertain their intentions. Recommendations for behavioral assumptions for tourists are derived from intended-response survey findings with visitors to other locations and from existing data on how vacationers have responded in other locations, including the Carolinas.

A. Evacuation Rates

There is no evidence that vacationers are reluctant to evacuate when a hurricane interrupts their visit to a coastal community. Based on observations of vacationer behavior in other locations, surveys in other locations concerning intended responses, it is reasonable to assume that 90% to 95% of vacationers will evacuate their accommodations *if evacuation orders are issued*.

B. Type of Refuge

Officials sometimes report a large number of vacationers in public shelters, but they represent a very small percentage of the total visitor population. Fewer than 5% of the evacuating vacationers will go to public shelters. Between 25% and 50% will seek inland hotels and motels. The remainder will return home or stay with friends and relatives in Florida, although the number returning home will depend on the distances traveled by tourists from home. Those most likely to return home live within a one-day drive of where they vacation.

C. Destinations

Up to 5% of tourist evacuees will stay within the county where their vacation accommodations were located or go to a nearby county to use a public shelter. At least half will go elsewhere in Florida to continue their vacation or wait out the storm. Up to half will return home, if they live within a one-day drive.

D. Vehicle Use

The great majority of tourists have a vehicle available to them when on vacation, often their own. Virtually all of the vehicles will be used in evacuating, either to other tourist destinations, home, or airports.

E. Evacuation Timing

Tourists leave at least as early as residents. The same curves used for residents should be used for tourists, unless officials order vacationers to evacuate earlier. Appendix A

Planning Assumptions

Reading the Planning Assumption Tables

Columns

Columns in tables represent threats posed by category 1, 2, 3, 4, and 5 hurricanes.

Rows

Rows in tables represent evacuation zones based on anticipated storm surge inundation: i.e., areas for which officials would issue evacuation notices due to the threat of storm surge and waves generated by category 1, 2, 3, 4, and 5 hurricanes. The sixth row in tables represents areas inland of the reach of storm surge inundation. Evacuation notices in inland areas (sixth rows of tables) would apply only to mobile homes and manufactured housing.

Cells

Cells in tables represent the evacuation behavior of residents living in the respective evacuation zone when faced with each of the five hurricane threats, e.g., response in a category 3 hurricane by residents living in a category 1 surge evacuation zone. All figures are percentages -- either percent of residents in the zone, percent of evacuees from the zone, or percent of available vehicles.



Appendix A-1

Planning Assumptions for Charlotte County

Charlotte Evacuation Rates (%)	Storm Threat Scenario					
Site-built Homes	Cat 1 Cat 2 Cat 3 Cat 4 Cat 5					
Cat 1 Surge Evacuation Zone	40	55	60	75	85	
Cat 2 Surge Evacuation Zone	30	50	55	70	85	
Cat 3 Surge Evacuation Zone	20	25	50	60	75	
Cat 4 Surge Evacuation Zone	10	10	30	60	70	
Cat 5 Surge Evacuation Zone	5	10	15	50	60	
Inland of Surge Evacuation Zones	5	5	10	15	20	

Table 1. Charlotte County evacuation rates for residents living in site-built homes

Evacuation rate indicates the percent of residents who will leave their homes to go someplace safer from each zone in each storm threat scenario. Figures are based on the assumption that officials order evacuation for surge evacuation zones corresponding to storm category, plus all mobile homes and manufactured homes. Figures also assume that that the actual storm track passes very close to the area being evacuated. Shaded cells indicate shadow evacuation – evacuation from areas not included in evacuation notices.

Table 2. Charlotte County out-of-county trip rates for residents living in site-built homes

Charlotte Out-of-county Trips (%)	Storm Threat Scenario					
Site-built Homes	Cat 1 Cat 2 Cat 3 Cat 4 Cat 5					
Cat 1 Surge Evacuation Zone	50	60	70	70	70	
Cat 2 Surge Evacuation Zone	50	60	70	70	70	
Cat 3 Surge Evacuation Zone	55	65	70	70	70	
Cat 4 Surge Evacuation Zone	55	65	70	70	70	
Cat 5 Surge Evacuation Zone	55	65	70	70	70	
Inland of Surge Evacuation Zones	55	65	70	70	70	

Out-of-county trip rate indicates the percent of evacuees from each zone who will seek refuge outside their own county of residence in each storm threat scenario.

Table 3. Charlotte County vehicle use rates for residents living in site-built homes

Charlotte Vehicle Use Rate (%)	Storm Threat Scenario					
Site-built Homes	Cat 1 Cat 2 Cat 3 Cat 4 Cat 5					
Cat 1 Surge Evacuation Zone	70	70	70	70	70	
Cat 2 Surge Evacuation Zone	70	70	70	70	70	
Cat 3 Surge Evacuation Zone	70	70	70	70	70	
Cat 4 Surge Evacuation Zone	70	70	70	70	70	
Cat 5 Surge Evacuation Zone	70	70	70	70	70	
Inland of Surge Evacuation Zones	70	70	70	70	70	

Vehicle use rate indicates of percentage of vehicles available to the evacuating household from each zone that will be used in evacuation in each storm threat scenario.

Charlotte Public Shelter Use (%)	Storm Threat Scenario					
Site-built Homes	Cat 1 Cat 2 Cat 3 Cat 4 Cat 5					
Cat 1 Surge Evacuation Zone	8	8	8	8	8	
Cat 2 Surge Evacuation Zone	8	8	8	8	8	
Cat 3 Surge Evacuation Zone	8	8	8	8	8	
Cat 4 Surge Evacuation Zone	12	12	12	12	12	
Cat 5 Surge Evacuation Zone	12	12	12	12	12	
Inland of Surge Evacuation Zones	5	5	5	5	5	

Table 4. Charlotte County public shelter use rates for residents living in site-built homes

Public shelter use rate indicates the percent of evacuees from each zone who will seek refuge in public shelters, in each storm threat scenario.

		and the first state of the stat
Table 5. Charlotte County	/ triend/relative refuge use ra	ates for residents living in site-built homes

Charlotte Friend/Relative Refuge Rates (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	55	55	55	55	55
Cat 2 Surge Evacuation Zone	55	55	55	55	55
Cat 3 Surge Evacuation Zone	55	55	55	55	55
Cat 4 Surge Evacuation Zone	55	55	55	55	55
Cat 5 Surge Evacuation Zone	55	55	55	55	55
Inland of Surge Evacuation Zones	55	55	55	55	55

Friend/relative rate indicates the percent of evacuees from each zone who will seek refuge in the homes of friends and relatives, in each storm threat scenario.

Charlotte Hotel/Motel Rates (%)	Storm Threat Scenario					
Site-built Homes	Cat 1 Cat 2 Cat 3 Cat 4 Cat 5					
Cat 1 Surge Evacuation Zone	25	25	25	25	25	
Cat 2 Surge Evacuation Zone	25	25	25	25	25	
Cat 3 Surge Evacuation Zone	25	25	25	25	25	
Cat 4 Surge Evacuation Zone	25	25	25	25	25	
Cat 5 Surge Evacuation Zone	25	25	25	25	25	
Inland of Surge Evacuation Zones	25	25	25	25	25	

Table 6. Charlotte County hotel/motel refuge use rates for residents living in site-built homes

Hotel/motel rate indicates the percent of evacuees from each zone who will seek refuge in hotels and motels, in each storm threat scenario.

Table 7. Charlotte Count	v other refuge use rates t	for residents living in site-built homes

Charlotte Other Refuge Rates (%)	Storm Threat Scenario				
Site-built Homes	Cat 1 Cat 2 Cat 3 Cat 4 Cat 5				
Cat 1 Surge Evacuation Zone	12	12	12	12	12
Cat 2 Surge Evacuation Zone	12	12	12	12	12
Cat 3 Surge Evacuation Zone	12	12	12	12	12
Cat 4 Surge Evacuation Zone	8	8	8	8	8
Cat 5 Surge Evacuation Zone	8	8	8	8	8
Inland of Surge Evacuation Zones	15	15	15	15	15

Other refuge rate indicates the percent of evacuees from each zone who will seek refuge in locations such as churches, second homes, and workplaces, in each storm threat scenario.

Table 8. Charlotte County evacuation rates for residents living in mobile and manufactured homes

Charlotte Evacuation Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	70	75	85	90	95
Cat 2 Surge Evacuation Zone	60	70	80	90	95
Cat 3 Surge Evacuation Zone	60	70	80	90	95
Cat 4 Surge Evacuation Zone	50	60	80	85	90
Cat 5 Surge Evacuation Zone	50	60	80	85	90
Inland of Surge Evacuation Zones	50	55	70	80	85

Evacuation rate indicates the percent of residents who will leave their homes to go someplace safer from each zone in each storm threat scenario. Figures are based on the assumption that officials order evacuation for surge evacuation zones corresponding to storm category, plus all mobile homes and manufactured homes. Figures also assume that that the actual storm track passes very close to the area being evacuated.

Table 9. Charlotte County out-of-county trip rates for residents living in mobile and manufactured homes

Charlotte Out-of-county Trips (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	35	40	50	50	50
Cat 2 Surge Evacuation Zone	30	35	40	40	40
Cat 3 Surge Evacuation Zone	30	30	35	40	40
Cat 4 Surge Evacuation Zone	20	20	20	30	30
Cat 5 Surge Evacuation Zone	20	20	20	30	30
Inland of Surge Evacuation Zones	20	20	20	30	30

Out-of-county trip rate indicates the percent of evacuees from each zone who will seek refuge outside their own county of residence in each storm threat scenario.

Table 10. Charlotte County vehicle use rates for residents living in mobile and manufactured homes

Charlotte Vehicle Use Rate (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	85	85	85	85	85
Cat 2 Surge Evacuation Zone	85	85	85	85	85
Cat 3 Surge Evacuation Zone	85	85	85	85	85
Cat 4 Surge Evacuation Zone	85	85	85	85	85
Cat 5 Surge Evacuation Zone	85	85	85	85	85
Inland of Surge Evacuation Zones	85	85	85	85	85

Vehicle use rate indicates of percentage of vehicles available to the evacuating household from each zone that will be used in evacuation in each storm threat scenario.

Table 11. Charlotte County public shelter use rates for residents living in mobile and manufactured homes

Charlotte Public Shelter Use (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	5	5	5	5	5
Cat 2 Surge Evacuation Zone	5	5	5	5	5
Cat 3 Surge Evacuation Zone	10	10	10	10	10
Cat 4 Surge Evacuation Zone	10	10	10	10	10
Cat 5 Surge Evacuation Zone	15	15	15	15	15
Inland of Surge Evacuation Zones	15	15	15	15	15

Public shelter use rate indicates the percent of evacuees from each zone who will seek refuge in public shelters, in each storm threat scenario.

Table 12. Charlotte County friend/relative refuge use rates for residents living in mobile and manufactured homes

Charlotte Friend/Relative Refuge Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	65	65	65	65	65
Cat 2 Surge Evacuation Zone	65	65	65	65	65
Cat 3 Surge Evacuation Zone	65	65	65	65	65
Cat 4 Surge Evacuation Zone	65	65	65	65	65
Cat 5 Surge Evacuation Zone	65	65	65	65	65
Inland of Surge Evacuation Zones	65	65	65	65	65

Friend/relative rate indicates the percent of evacuees from each zone who will seek refuge in the homes of friends and relatives, in each storm threat scenario.

Table 13. Charlotte County hotel/motel refuge use rates for residents living in mobile and manufactured
homes

Charlotte Hotel/Motel Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	20	20	20	20	20
Cat 2 Surge Evacuation Zone	20	20	20	20	20
Cat 3 Surge Evacuation Zone	20	20	20	20	20
Cat 4 Surge Evacuation Zone	20	20	20	20	20
Cat 5 Surge Evacuation Zone	15	15	15	15	15
Inland of Surge Evacuation Zones	15	15	15	15	15

Hotel/motel rate indicates the percent of evacuees from each zone who will seek refuge in hotels and motels, in each storm threat scenario.

Table 14. Charlotte County other refuge use rates for residents living in mobile and manufactured homes

Charlotte Other Refuge Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	10	10	10	10	10
Cat 2 Surge Evacuation Zone	10	10	10	10	10
Cat 3 Surge Evacuation Zone	5	5	5	5	5
Cat 4 Surge Evacuation Zone	5	5	5	5	5
Cat 5 Surge Evacuation Zone	5	5	5	5	5
Inland of Surge Evacuation Zones	5	5	5	5	5

Other refuge rate indicates the percent of evacuees from each zone who will seek refuge in locations such as churches, second homes, and workplaces, in each storm threat scenario.

Appendix A-2

Planning Assumptions for Collier County

Collier Evacuation Rates (%)	Storm Threat Scenario					
Site-built Homes	Cat 1	Cat 1 Cat 2 Cat 3 Cat 4 Ca				
Cat 1 Surge Evacuation Zone	50	60	70	80	90	
Cat 2 Surge Evacuation Zone	30	55	60	75	85	
Cat 3 Surge Evacuation Zone	20	25	60	75	75	
Cat 4 Surge Evacuation Zone	10	5	35	60	70	
Cat 5 Surge Evacuation Zone	5	5	25	50	60	
Inland of Surge Evacuation Zones	5	5	10	20	20	

Table 1. Collier County evacuation rates for residents living in site-built homes

Evacuation rate indicates the percent of residents who will leave their homes to go someplace safer from each zone in each storm threat scenario. Figures are based on the assumption that officials order evacuation for surge evacuation zones corresponding to storm category, plus all mobile homes and manufactured homes. Figures also assume that that the actual storm track passes very close to the area being evacuated. Shaded cells indicate shadow evacuation – evacuation from areas not included in evacuation notices.

Table 2. Collier County out-of-county trip rates for residents living in site-built homes

Collier Out-of-county Trips (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	60	65	70	70	70
Cat 2 Surge Evacuation Zone	60	65	70	70	70
Cat 3 Surge Evacuation Zone	60	65	70	70	70
Cat 4 Surge Evacuation Zone	60	65	70	70	70
Cat 5 Surge Evacuation Zone	60	65	70	70	70
Inland of Surge Evacuation Zones	60	60	65	70	70

Out-of-county trip rate indicates the percent of evacuees from each zone who will seek refuge outside their own county of residence in each storm threat scenario.

Table 3. Collier County vehicle use rates for residents living in site-built homes

Collier Vehicle Use Rate (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	75	75	75	75	75
Cat 2 Surge Evacuation Zone	75	75	75	75	75
Cat 3 Surge Evacuation Zone	75	75	75	75	75
Cat 4 Surge Evacuation Zone	75	75	75	75	75
Cat 5 Surge Evacuation Zone	75	75	75	75	75
Inland of Surge Evacuation Zones	70	70	70	70	70

Vehicle use rate indicates of percentage of vehicles available to the evacuating household from each zone that will be used in evacuation in each storm threat scenario.

Collier Public Shelter Use (%)	Storm Threat Scenario				
Site-built Homes	Cat 1 Cat 2 Cat 3 Cat 4				
Cat 1 Surge Evacuation Zone	8	8	8	8	8
Cat 2 Surge Evacuation Zone	10	10	10	10	10
Cat 3 Surge Evacuation Zone	10	10	10	10	10
Cat 4 Surge Evacuation Zone	12	12	12	12	12
Cat 5 Surge Evacuation Zone	12	12	12	12	12
Inland of Surge Evacuation Zones	10	10	10	10	10

 Table 4. Collier County public shelter use rates for residents living in site-built homes

Public shelter use rate indicates the percent of evacuees from each zone who will seek refuge in public shelters, in each storm threat scenario.

Table 5. Collier County friend/relative refuge use rates for residents living in site-built homes

Collier Friend/Relative Refuge Rates (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	60	60	60	60	60
Cat 2 Surge Evacuation Zone	60	60	60	60	60
Cat 3 Surge Evacuation Zone	60	60	60	60	60
Cat 4 Surge Evacuation Zone	60	60	60	60	60
Cat 5 Surge Evacuation Zone	60	60	60	60	60
Inland of Surge Evacuation Zones	60	60	60	60	60

Friend/relative rate indicates the percent of evacuees from each zone who will seek refuge in the homes of friends and relatives, in each storm threat scenario.

Collier Hotel/Motel Rates (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	25	25	25	25	25
Cat 2 Surge Evacuation Zone	25	25	25	25	25
Cat 3 Surge Evacuation Zone	25	25	25	25	25
Cat 4 Surge Evacuation Zone	25	25	25	25	25
Cat 5 Surge Evacuation Zone	25	25	25	25	25
Inland of Surge Evacuation Zones	25	25	25	25	25

Table 6. Collier County hotel/motel refuge use rates for residents living in site-built homes

Hotel/motel rate indicates the percent of evacuees from each zone who will seek refuge in hotels and motels, in each storm threat scenario.

Table 7. Collier Count	v other refuge use rates t	for residents living in site-built homes

Collier Other Refuge Rates (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	10	10	10	10	10
Cat 2 Surge Evacuation Zone	7	7	7	7	7
Cat 3 Surge Evacuation Zone	7	7	7	7	7
Cat 4 Surge Evacuation Zone	5	5	5	5	5
Cat 5 Surge Evacuation Zone	5	5	5	5	5
Inland of Surge Evacuation Zones	5	5	5	5	5

Other refuge rate indicates the percent of evacuees from each zone who will seek refuge in locations such as churches, second homes, and workplaces, in each storm threat scenario.

Statewide Regional Evacuation Studies Program

Collier Evacuation Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	70	75	85	90	95
Cat 2 Surge Evacuation Zone	60	70	80	90	95
Cat 3 Surge Evacuation Zone	60	70	80	90	95
Cat 4 Surge Evacuation Zone	50	60	80	85	90
Cat 5 Surge Evacuation Zone	50	60	80	85	90
Inland of Surge Evacuation Zones	50	55	70	80	85

Evacuation rate indicates the percent of residents who will leave their homes to go someplace safer from each zone in each storm threat scenario. Figures are based on the assumption that officials order evacuation for surge evacuation zones corresponding to storm category, plus all mobile homes and manufactured homes. Figures also assume that that the actual storm track passes very close to the area being evacuated.

Table 9. Collier County out-of-county trip rates for residents living in mobile and manufactured homes

Collier Out-of-county Trips (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	35	40	50	50	50
Cat 2 Surge Evacuation Zone	30	35	40	40	40
Cat 3 Surge Evacuation Zone	30	30	35	40	40
Cat 4 Surge Evacuation Zone	20	20	20	30	30
Cat 5 Surge Evacuation Zone	20	20	20	30	30
Inland of Surge Evacuation Zones	20	20	20	30	30

Out-of-county trip rate indicates the percent of evacuees from each zone who will seek refuge outside their own county of residence in each storm threat scenario.

Table 10. Collier Count	vehicle use rates for residents living in mobile and manufactured home	es

Collier Vehicle Use Rate (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	80	80	80	80	80
Cat 2 Surge Evacuation Zone	80	80	80	80	80
Cat 3 Surge Evacuation Zone	80	80	80	80	80
Cat 4 Surge Evacuation Zone	80	80	80	80	80
Cat 5 Surge Evacuation Zone	80	80	80	80	80
Inland of Surge Evacuation Zones	80	80	80	80	80

Vehicle use rate indicates of percentage of vehicles available to the evacuating household from each zone that will be used in evacuation in each storm threat scenario.

Collier Public Shelter Use (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1 Cat 2 Cat 3 Cat 4 Cat 5				
Cat 1 Surge Evacuation Zone	5	5	5	5	5
Cat 2 Surge Evacuation Zone	5	5	5	5	5
Cat 3 Surge Evacuation Zone	10	10	10	10	10
Cat 4 Surge Evacuation Zone	10	10	10	10	10
Cat 5 Surge Evacuation Zone	15	15	15	15	15
Inland of Surge Evacuation Zones	15	15	15	15	15

Table 11. Collier County public shelter use rates for residents living in mobile and manufactured homes

Public shelter use rate indicates the percent of evacuees from each zone who will seek refuge in public shelters, in each storm threat scenario.

Table 12. Collier County friend/relative refuge use rates for residents living in mobile and manufactured homes

Collier Friend/Relative Refuge Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	55	55	55	55	55
Cat 2 Surge Evacuation Zone	55	55	55	55	55
Cat 3 Surge Evacuation Zone0	50	50	50	50	50
Cat 4 Surge Evacuation Zone	50	50	50	50	50
Cat 5 Surge Evacuation Zone	50	50	50	50	50
Inland of Surge Evacuation Zones	50	50	50	50	50

Friend/relative rate indicates the percent of evacuees from each zone who will seek refuge in the homes of friends and relatives, in each storm threat scenario.

Table 13. Collier County hotel/motel refuge use rates for residents living in mobile and manufactured homes

Collier Hotel/Motel Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	30	30	30	30	30
Cat 2 Surge Evacuation Zone	30	30	30	30	30
Cat 3 Surge Evacuation Zone	30	30	30	30	30
Cat 4 Surge Evacuation Zone	30	30	30	30	30
Cat 5 Surge Evacuation Zone	25	25	25	25	25
Inland of Surge Evacuation Zones	25	25	25	25	25

Hotel/motel rate indicates the percent of evacuees from each zone who will seek refuge in hotels and motels, in each storm threat scenario.

Statewide Regional Evacuation Studies Program

Table 14. Collier County other refuge use rates for residents living in mobile and manufac	tured homes

Collier Other Refuge Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	10	10	10	10	10
Cat 2 Surge Evacuation Zone	10	10	10	10	10
Cat 3 Surge Evacuation Zone	10	10	10	10	10
Cat 4 Surge Evacuation Zone	10	10	10	10	10
Cat 5 Surge Evacuation Zone	10	10	10	10	10
Inland of Surge Evacuation Zones	10	10	10	10	10

Other refuge rate indicates the percent of evacuees from each zone who will seek refuge in locations such as churches, second homes, and workplaces, in each storm threat scenario.

Appendix A-3

Planning Assumptions for Glades County

Table 1. Glades County evacuation rates for residents living in site-built homes and mobile or manufactured homes

Glades Evacuation Rates	Storm Threat Scenario				
	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Site Built Homes	15	20	30	35	40
Mobile and Manufactured Homes	55	70	80	90	95

Evacuation rate indicates the percent of residents who will leave their homes to go someplace safer in each storm threat scenario. Figures assume that evacuation will be recommended for mobile and manufactured homes. Figures also assume that that the actual storm track passes very close to the area being evacuated.

Table 2. Glades County out-of-county trip rates for residents living in site-built homes and mobile or manufactured homes

Glades Out-of-county Trip Rates	Storm Threat Scenario				
	Cat 1 Cat 2 Cat 3 Cat 4 Ca				Cat 5
Site Built Homes	65	65	65	70	70
Mobile and Manufactured Homes	55	55	55	55	55

Out-of-county trip rate indicates the percent of evacuees who will seek refuge outside their own county of residence.

Table 3. Glades County vehicle use rates for residents living in site-built homes and mobile or manufactured homes

Glades Vehicle Use Rates	Storm Threat Scenario				
	Cat 1 Cat 2 Cat 3 Cat 4 C				Cat 5
Site Built Homes	80	80	80	80	80
Mobile and Manufactured Homes	90	90	90	90	90

Vehicle use rate indicates of percentage of vehicles available to the evacuating household that will be used in evacuation in each storm threat scenario.



Table 4. Glades County public shelter use rates for residents living in site-built homes and mobile or manufactured homes

Glades Public Shelter Use Rates		Storm Threat Scenario				
	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5	
Site Built Homes	15	15	15	15	15	
Mobile and Manufactured Homes	15	15	15	15	15	

Public shelter use rate indicates the percent of evacuees who will seek refuge in public shelters, in each storm threat scenario.

Table 5. Glades County friend/relative refuge use rates for residents living in site-built homes and mobile or manufactured homes

Glades Friend/Relative Use Rates	Storm Threat Scenario				
	Cat 1 Cat 2 Cat 3 Cat 4				Cat 5
Site Built Homes	60	60	60	60	60
Mobile and Manufactured Homes	55	55	55	55	55

Friend/relative rate indicates the percent of evacuees from each zone who will seek refuge in the homes of friends and relatives, in each storm threat scenario.

Table 6. Glades County hotel/motel refuge use rates for residents living in site-built homes and mobile or manufactured homes

Glades Hotel/Motel Use Rates		Storm Threat Scenario			
	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Site Built Homes	10	10	10	10	10
Mobile and Manufactured Homes	15	15	15	15	15

Hotel/motel rate indicates the percent of evacuees from each zone who will seek refuge in hotels and motels, in each storm threat scenario.

Table 7. Glades County other refuge use rates for residents living in site-built homes and mobile or manufactured homes

Glades Other Use Rates	Storm Threat Scenario				
	Cat 1 Cat 2 Cat 3 Cat 4 C				Cat 5
Site Built Homes	15	15	15	15	15
Mobile and Manufactured Homes	15	15	15	15	15

Other refuge rate indicates the percent of evacuees from each zone who will seek refuge in locations such as churches, second homes, and workplaces, in each storm threat scenario.

Appendix A-4

Planning Assumptions for Hendry County



Table 1. Hendry County evacuation rates for residents living in site-built homes and mobile or manufactured homes

Hendry Evacuation Rates	Storm Threat Scenario				
	Cat 1 Cat 2 Cat 3 Cat 4 Cat 4				Cat 5
Site Built Homes	15	20	30	35	40
Mobile and Manufactured Homes	55	70	80	90	95

Evacuation rate indicates the percent of residents who will leave their homes to go someplace safer in each storm threat scenario. Figures assume that evacuation will be recommended for mobile and manufactured homes. Figures also assume that that the actual storm track passes very close to the area being evacuated.

Table 2. Hendry County out-of-county trip rates for residents living in site-built homes and mobile or manufactured homes

Hendry Out-of-county Trip Rates	Storm Threat Scenario				
	Cat 1 Cat 2 Cat 3 Cat 4 Ca				Cat 5
Site Built Homes	65	65	65	70	70
Mobile and Manufactured Homes	45	45	45	45	45

Out-of-county trip rate indicates the percent of evacuees who will seek refuge outside their own county of residence.

Table 3. Hendry County vehicle use rates for residents living in site-built homes and mobile or manufactured homes

Hendry Vehicle Use Rates	Storm Threat Scenario				
	Cat 1 Cat 2 Cat 3 Cat 4				Cat 5
Site Built Homes	70	70	70	70	70
Mobile and Manufactured Homes	70	70	70	70	70

Vehicle use rate indicates of percentage of vehicles available to the evacuating household that will be used in evacuation in each storm threat scenario.

Table 4. Hendry County public shelter use rates for residents living in site-built homes and mobile or manufactured homes

Hendry Public Shelter Use Rates		Storm Threat Scenario				
	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5	
Site Built Homes	20	20	20	20	20	
Mobile and Manufactured Homes	20	20	20	20	20	

Public shelter use rate indicates the percent of evacuees who will seek refuge in public shelters, in each storm threat scenario.

Table 5. Hendry County friend/relative refuge use rates for residents living in site-built homes and mobile or manufactured homes

Hendry Friend/Relative Use Rates	Storm Threat Scenario				
	Cat 1 Cat 2 Cat 3 Cat 4 Cat				Cat 5
Site Built Homes	60	60	60	60	60
Mobile and Manufactured Homes	70	70	70	70	70

Friend/relative rate indicates the percent of evacuees from each zone who will seek refuge in the homes of friends and relatives, in each storm threat scenario.

Table 6. Hendry County hotel/motel refuge use rates for residents living in site-built homes and mobile or manufactured homes

Hendry Hotel/Motel Use Rates		Storm Threat Scenario				
	Cat 1 Cat 2 Cat 3 Cat 4				Cat 5	
Site Built Homes	10	10	10	10	10	
Mobile and Manufactured Homes	5	5	5	5	5	

Hotel/motel rate indicates the percent of evacuees from each zone who will seek refuge in hotels and motels, in each storm threat scenario.

Table 7. Hendry County other refuge use rates for residents living in site-built homes and mobile or manufactured homes

Hendry Other Use Rates	Storm Threat Scenario				
	Cat 1 Cat 2 Cat 3 Cat 4 Cat				
Site Built Homes	10	10	10	10	10
Mobile and Manufactured Homes	5	5	5	5	5

Other refuge rate indicates the percent of evacuees from each zone who will seek refuge in locations such as churches, second homes, and workplaces, in each storm threat scenario.

Appendix A-5

Planning Assumptions for Lee County

Lee Evacuation Rates (%)	Storm Threat Scenario						
Site-built Homes	Cat 1	Cat 1 Cat 2 Cat 3 Cat 4 Cat 5					
Cat 1 Surge Evacuation Zone	50	55	65	80	90		
Cat 2 Surge Evacuation Zone	30	45	60	70	85		
Cat 3 Surge Evacuation Zone	20	25	60	70	75		
Cat 4 Surge Evacuation Zone	10	10	35	65	70		
Cat 5 Surge Evacuation Zone	5	10	25	50	60		
Inland of Surge Evacuation Zones	5	5	10	15	20		

Table 1. Lee County evacuation rates for residents living in site-built homes

Evacuation rate indicates the percent of residents who will leave their homes to go someplace safer from each zone in each storm threat scenario. Figures are based on the assumption that officials order evacuation for surge evacuation zones corresponding to storm category, plus all mobile homes and manufactured homes. Figures also assume that that the actual storm track passes very close to the area being evacuated. Shaded cells indicate shadow evacuation – evacuation from areas not included in evacuation notices.

Table 2. Lee County out-of-county trip rates for residents living in site-built homes

Lee Out-of-county Trips (%)	Storm Threat Scenario					
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5	
Cat 1 Surge Evacuation Zone	50	55	60	70	70	
Cat 2 Surge Evacuation Zone	50	60	70	70	70	
Cat 3 Surge Evacuation Zone	55	65	70	70	70	
Cat 4 Surge Evacuation Zone	45	65	70	70	70	
Cat 5 Surge Evacuation Zone	55	65	70	70	70	
Inland of Surge Evacuation Zones	60	60	65	70	70	

Out-of-county trip rate indicates the percent of evacuees from each zone who will seek refuge outside their own county of residence in each storm threat scenario.

Table 3. Lee County vehicle use rates for residents living in site-built homes

Lee Vehicle Use Rate (%)	Storm Threat Scenario					
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5	
Cat 1 Surge Evacuation Zone	75	75	75	75	75	
Cat 2 Surge Evacuation Zone	75	75	75	75	75	
Cat 3 Surge Evacuation Zone	75	75	75	75	75	
Cat 4 Surge Evacuation Zone	75	75	75	75	75	
Cat 5 Surge Evacuation Zone	75	75	75	75	75	
Inland of Surge Evacuation Zones	75	75	75	75	75	

Vehicle use rate indicates of percentage of vehicles available to the evacuating household from each zone that will be used in evacuation in each storm threat scenario.

Lee Public Shelter Use (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	5	5	5	5	5
Cat 2 Surge Evacuation Zone	5	5	5	5	5
Cat 3 Surge Evacuation Zone	5	5	5	5	5
Cat 4 Surge Evacuation Zone	12	12	12	12	12
Cat 5 Surge Evacuation Zone	12	12	12	12	12
Inland of Surge Evacuation Zones	5	5	5	5	5

 Table 4. Lee County public shelter use rates for residents living in site-built homes

Public shelter use rate indicates the percent of evacuees from each zone who will seek refuge in public shelters, in each storm threat scenario.

Table 5. Lee County friend/relative refuge use rates for residents living in site-built homes

Lee Friend/Relative Refuge Rates (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	60	60	60	60	60
Cat 2 Surge Evacuation Zone	60	60	60	60	60
Cat 3 Surge Evacuation Zone	60	60	60	60	60
Cat 4 Surge Evacuation Zone	60	60	60	60	60
Cat 5 Surge Evacuation Zone	60	60	60	60	60
Inland of Surge Evacuation Zones	60	60	60	60	60

Friend/relative rate indicates the percent of evacuees from each zone who will seek refuge in the homes of friends and relatives, in each storm threat scenario.

Lee Hotel/Motel Rates (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	25	25	25	25	25
Cat 2 Surge Evacuation Zone	25	25	25	25	25
Cat 3 Surge Evacuation Zone	25	25	25	25	25
Cat 4 Surge Evacuation Zone	20	20	20	20	20
Cat 5 Surge Evacuation Zone	20	20	20	20	20
Inland of Surge Evacuation Zones	25	25	25	25	25

Table 6. Lee County hotel/motel refuge use rates for residents living in site-built homes

Hotel/motel rate indicates the percent of evacuees from each zone who will seek refuge in hotels and motels, in each storm threat scenario.

Table 7. Lee County other refuge use rates for residents living in site-built homes

Lee Other Refuge Rates (%)	Storm Threat Scenario					
Site-built Homes	Cat 1 Cat 2 Cat 3 Cat 4 C					
Cat 1 Surge Evacuation Zone	10	10	10	10	10	
Cat 2 Surge Evacuation Zone	10	10	10	10	10	
Cat 3 Surge Evacuation Zone	10	10	10	10	10	
Cat 4 Surge Evacuation Zone	8	8	8	8	8	
Cat 5 Surge Evacuation Zone	8	8	8	8	8	
Inland of Surge Evacuation Zones	10	10	10	10	10	

Other refuge rate indicates the percent of evacuees from each zone who will seek refuge in locations such as churches, second homes, and workplaces, in each storm threat scenario.

Statewide Regional Evacuation Studies Program

Lee Evacuation Rates (%)	Storm Threat Scenario					
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5	
Cat 1 Surge Evacuation Zone	70	75	85	90	95	
Cat 2 Surge Evacuation Zone	60	70	80	90	95	
Cat 3 Surge Evacuation Zone	60	70	80	90	95	
Cat 4 Surge Evacuation Zone	50	60	80	85	90	
Cat 5 Surge Evacuation Zone	50	60	80	85	90	
Inland of Surge Evacuation Zones	50	55	70	80	85	

Table 8. Lee County evacuation rates for residents living in mobile and manufactured homes

Evacuation rate indicates the percent of residents who will leave their homes to go someplace safer from each zone in each storm threat scenario. Figures are based on the assumption that officials order evacuation for surge evacuation zones corresponding to storm category, plus all mobile homes and manufactured homes. Figures also assume that that the actual storm track passes very close to the area being evacuated.

Table 9. Lee County out-of-county trip rates for residents living in mobile and manufactured homes

Lee Out-of-county Trips (%)	Storm Threat Scenario					
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5	
Cat 1 Surge Evacuation Zone	35	40	50	50	50	
Cat 2 Surge Evacuation Zone	30	35	40	40	40	
Cat 3 Surge Evacuation Zone	30	30	35	40	40	
Cat 4 Surge Evacuation Zone	20	20	20	30	30	
Cat 5 Surge Evacuation Zone	20	20	20	30	30	
Inland of Surge Evacuation Zones	20	20	20	30	30	

Out-of-county trip rate indicates the percent of evacuees from each zone who will seek refuge outside their own county of residence in each storm threat scenario.

Table 10. Lee County vehicle use rates for residents living in mobile and manufactured homes

Lee Vehicle Use Rate (%)	Storm Threat Scenario					
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5	
Cat 1 Surge Evacuation Zone	80	80	80	80	80	
Cat 2 Surge Evacuation Zone	80	80	80	80	80	
Cat 3 Surge Evacuation Zone	80	80	80	80	80	
Cat 4 Surge Evacuation Zone	80	80	80	80	80	
Cat 5 Surge Evacuation Zone	80	80	80	80	80	
Inland of Surge Evacuation Zones	80	80	80	80	80	

Vehicle use rate indicates of percentage of vehicles available to the evacuating household from each zone that will be used in evacuation in each storm threat scenario.

Lee Public Shelter Use (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1 Cat 2 Cat 3 Cat 4				
Cat 1 Surge Evacuation Zone	5	5	5	5	5
Cat 2 Surge Evacuation Zone	5	5	5	5	5
Cat 3 Surge Evacuation Zone	10	10	10	10	10
Cat 4 Surge Evacuation Zone	10	10	10	10	10
Cat 5 Surge Evacuation Zone	15	15	15	15	15
Inland of Surge Evacuation Zones	15	15	15	15	15

Table 11. Lee County public shelter use rates for residents living in mobile and manufactured homes

Public shelter use rate indicates the percent of evacuees from each zone who will seek refuge in public shelters, in each storm threat scenario.

Table 12. Lee County friend/relative refuge use rates for residents living in mobile and manufactured homes

Lee Friend/Relative Refuge Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	55	55	55	55	55
Cat 2 Surge Evacuation Zone	55	55	55	55	55
Cat 3 Surge Evacuation Zone	50	50	50	50	50
Cat 4 Surge Evacuation Zone	50	50	50	50	50
Cat 5 Surge Evacuation Zone	50	50	50	50	50
Inland of Surge Evacuation Zones	50	50	50	50	50

Friend/relative rate indicates the percent of evacuees from each zone who will seek refuge in the homes of friends and relatives, in each storm threat scenario.

Table 13. Lee County hotel/motel refuge use rates for residents living in mobile and manufactured homes

Lee Hotel/Motel Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	25	25	25	25	25
Cat 2 Surge Evacuation Zone	25	25	25	25	25
Cat 3 Surge Evacuation Zone	25	25	25	25	25
Cat 4 Surge Evacuation Zone	25	25	25	25	25
Cat 5 Surge Evacuation Zone	20	20	20	20	20
Inland of Surge Evacuation Zones	20	20	20	20	20

Hotel/motel rate indicates the percent of evacuees from each zone who will seek refuge in hotels and motels, in each storm threat scenario.

Statewide Regional Evacuation Studies Program

Table 14. Lee County	v other refuge use rates fo	or residents living in mobile and manufactured	homes

Lee Other Refuge Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	15	15	15	15	15
Cat 2 Surge Evacuation Zone	15	15	15	15	15
Cat 3 Surge Evacuation Zone	15	15	15	15	15
Cat 4 Surge Evacuation Zone	15	15	15	15	15
Cat 5 Surge Evacuation Zone	15	15	15	15	15
Inland of Surge Evacuation Zones	15	15	15	15	15

Other refuge rate indicates the percent of evacuees from each zone who will seek refuge in locations such as churches, second homes, and workplaces, in each storm threat scenario.

Appendix A-6

Planning Assumptions for Sarasota County

Sarasota Evacuation Rates (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 4	Cat 5		
Cat 1 Surge Evacuation Zone	40	50	65	85	95
Cat 2 Surge Evacuation Zone	25	45	65	80	95
Cat 3 Surge Evacuation Zone	20	25	60	75	90
Cat 4 Surge Evacuation Zone	10	10	30	75	85
Cat 5 Surge Evacuation Zone	5	10	15	50	85
Inland of Surge Evacuation Zones	5	5	15	15	20

Table 1. Sarasota County evacuation rates for residents living in site-built homes

Evacuation rate indicates the percent of residents who will leave their homes to go someplace safer from each zone in each storm threat scenario. Figures are based on the assumption that officials order evacuation for surge evacuation zones corresponding to storm category, plus all mobile homes and manufactured homes. Figures also assume that that the actual storm track passes very close to the area being evacuated. Shaded cells indicate shadow evacuation – evacuation from areas not included in evacuation notices.

Table 2. Sarasota County out-of-county trip rates for residents living in site-built homes

Sarasota Out-of-county Trips (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	50	50	55	60	60
Cat 2 Surge Evacuation Zone	50	50	55	60	60
Cat 3 Surge Evacuation Zone	55	55	60	60	60
Cat 4 Surge Evacuation Zone	55	55	60	60	60
Cat 5 Surge Evacuation Zone	55	55	60	60	60
Inland of Surge Evacuation Zones	55	55	60	60	60

Out-of-county trip rate indicates the percent of evacuees from each zone who will seek refuge outside their own county of residence in each storm threat scenario.

Table 3. Sarasota County vehicle use rates for residents living in site-built homes

Sarasota Vehicle Use Rate (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	70	70	70	70	70
Cat 2 Surge Evacuation Zone	70	70	70	70	70
Cat 3 Surge Evacuation Zone	70	70	70	70	70
Cat 4 Surge Evacuation Zone	70	70	70	70	70
Cat 5 Surge Evacuation Zone	70	70	70	70	70
Inland of Surge Evacuation Zones	70	70	70	70	70

Vehicle use rate indicates of percentage of vehicles available to the evacuating household from each zone that will be used in evacuation in each storm threat scenario.

Sarasota Public Shelter Use (%)	Storm Threat Scenario					
Site-built Homes	Cat 1	Cat 1 Cat 2 Cat 3 Cat 4 Cat				
Cat 1 Surge Evacuation Zone	5	5	5	5	5	
Cat 2 Surge Evacuation Zone	8	8	8	8	8	
Cat 3 Surge Evacuation Zone	8	8	8	8	8	
Cat 4 Surge Evacuation Zone	12	12	12	12	12	
Cat 5 Surge Evacuation Zone	12	12	12	12	12	
Inland of Surge Evacuation Zones	10	10	10	10	10	

Table 4. Sarasota County public shelter use rates for residents living in site-built homes

Public shelter use rate indicates the percent of evacuees from each zone who will seek refuge in public shelters, in each storm threat scenario.

Table 5. Sarasota County	/ friend/relative refuge use rates for it	residents living in site-built homes

Sarasota Friend/Relative Refuge Rates (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	65	65	65	65	65
Cat 2 Surge Evacuation Zone	60	60	60	60	60
Cat 3 Surge Evacuation Zone	60	60	60	60	60
Cat 4 Surge Evacuation Zone	60	60	60	60	60
Cat 5 Surge Evacuation Zone	60	60	60	60	60
Inland of Surge Evacuation Zones	60	60	60	60	60

Friend/relative rate indicates the percent of evacuees from each zone who will seek refuge in the homes of friends and relatives, in each storm threat scenario.

Sarasota Hotel/Motel Rates (%)	Storm Threat Scenario					
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5	
Cat 1 Surge Evacuation Zone	25	25	25	25	25	
Cat 2 Surge Evacuation Zone	20	20	20	20	20	
Cat 3 Surge Evacuation Zone	20	20	20	20	20	
Cat 4 Surge Evacuation Zone	20	20	20	20	20	
Cat 5 Surge Evacuation Zone	20	20	20	20	20	
Inland of Surge Evacuation Zones	20	20	20	20	20	

Table 6. Sarasota County hotel/motel refuge use rates for residents living in site-built homes

Hotel/motel rate indicates the percent of evacuees from each zone who will seek refuge in hotels and motels, in each storm threat scenario.

Table 7. Sarasota Count	v other refuge use rates	s for residents living in site-built homes

Sarasota Other Refuge Rates (%)	Storm Threat Scenario				
Site-built Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	5	5	5	5	5
Cat 2 Surge Evacuation Zone	12	12	12	12	12
Cat 3 Surge Evacuation Zone	12	12	12	12	12
Cat 4 Surge Evacuation Zone	8	8	8	8	8
Cat 5 Surge Evacuation Zone	8	8	8	8	8
Inland of Surge Evacuation Zones	10	10	10	10	10

Other refuge rate indicates the percent of evacuees from each zone who will seek refuge in locations such as churches, second homes, and workplaces, in each storm threat scenario.

Table 8. Sarasota County evac	uation rates for residents living	in mobile and manufactured homes

1		v			
Sarasota Evacuation Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	70	75	85	90	95
Cat 2 Surge Evacuation Zone	60	70	80	90	95
Cat 3 Surge Evacuation Zone	60	70	80	90	95
Cat 4 Surge Evacuation Zone	50	60	80	85	90
Cat 5 Surge Evacuation Zone	50	60	80	85	90
Inland of Surge Evacuation Zones	50	55	70	80	85

Evacuation rate indicates the percent of residents who will leave their homes to go someplace safer from each zone in each storm threat scenario. Figures are based on the assumption that officials order evacuation for surge evacuation zones corresponding to storm category, plus all mobile homes and manufactured homes. Figures also assume that that the actual storm track passes very close to the area being evacuated.

Table 9. Sarasota County out-of-county trip rates for residents living in mobile and manufactured homes

Sarasota Out-of-county Trips (%)	Storm Threat Scenario					
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5	
Cat 1 Surge Evacuation Zone	35	30	35	40	40	
Cat 2 Surge Evacuation Zone	30	30	30	40	40	
Cat 3 Surge Evacuation Zone	30	30	30	40	40	
Cat 4 Surge Evacuation Zone	25	25	30	30	30	
Cat 5 Surge Evacuation Zone	25	25	30	30	30	
Inland of Surge Evacuation Zones	25	25	30	30	30	

Out-of-county trip rate indicates the percent of evacuees from each zone who will seek refuge outside their own county of residence in each storm threat scenario.

Table 10. Sarasota County	vehicle use rates for residents living in mobile and manufactured homes

Sarasota Vehicle Use Rate (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	90	90	90	90	90
Cat 2 Surge Evacuation Zone	90	90	90	90	90
Cat 3 Surge Evacuation Zone	90	90	90	90	90
Cat 4 Surge Evacuation Zone	90	90	90	90	90
Cat 5 Surge Evacuation Zone	90	90	90	90	90
Inland of Surge Evacuation Zones	90	90	90	90	90

Vehicle use rate indicates of percentage of vehicles available to the evacuating household from each zone that will be used in evacuation in each storm threat scenario.

Table 11. Sarasota County public shelter use rates for residents living in mobile and manufactured homes

Sarasota Public Shelter Use (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	15	15	15	15	15
Cat 2 Surge Evacuation Zone	20	20	20	20	20
Cat 3 Surge Evacuation Zone	20	20	20	20	20
Cat 4 Surge Evacuation Zone	20	20	20	20	20
Cat 5 Surge Evacuation Zone	20	20	20	20	20
Inland of Surge Evacuation Zones	20	20	20	20	20

Public shelter use rate indicates the percent of evacuees from each zone who will seek refuge in public shelters, in each storm threat scenario.

Table 12. Sarasota County friend/relative refuge use rates for residents living in mobile and manufactured homes

Sarasota Friend/Relative Refuge Rates (%)	6) Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	50	50	50	50	50
Cat 2 Surge Evacuation Zone	50	50	50	50	50
Cat 3 Surge Evacuation Zone	50	50	50	50	5
Cat 4 Surge Evacuation Zone	50	50	50	50	50
Cat 5 Surge Evacuation Zone	50	50	50	50	50
Inland of Surge Evacuation Zones	50	50	50	50	50

Friend/relative rate indicates the percent of evacuees from each zone who will seek refuge in the homes of friends and relatives, in each storm threat scenario.

Table 13. Sarasota County hotel/motel refuge use rates for residents living in mobile and manufactured
homes

Sarasota Hotel/Motel Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	20	20	20	20	20
Cat 2 Surge Evacuation Zone	20	20	20	20	20
Cat 3 Surge Evacuation Zone	20	20	20	20	20
Cat 4 Surge Evacuation Zone	20	20	20	20	20
Cat 5 Surge Evacuation Zone	20	20	20	20	20
Inland of Surge Evacuation Zones	20	20	20	20	20

Hotel/motel rate indicates the percent of evacuees from each zone who will seek refuge in hotels and motels, in each storm threat scenario.

Statewide Regional Evacuation Studies Program

Table 14. Sarasota County	other refuge use rates for	r residents living in mobile and manufactured homes	

Sarasota Other Refuge Rates (%)	Storm Threat Scenario				
Mobile and Manufactured Homes	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Cat 1 Surge Evacuation Zone	15	15	15	15	15
Cat 2 Surge Evacuation Zone	10	10	10	10	10
Cat 3 Surge Evacuation Zone	10	10	10	10	10
Cat 4 Surge Evacuation Zone	10	10	10	10	10
Cat 5 Surge Evacuation Zone	10	10	10	10	10
Inland of Surge Evacuation Zones	10	10	10	10	10

Other refuge rate indicates the percent of evacuees from each zone who will seek refuge in locations such as churches, second homes, and workplaces, in each storm threat scenario.

Appendix B

Working Data Tables

Role of the Working Data Tables

Working data tables display data from the SRES Survey Data Report in a condensed, abbreviated format. They are not intended to replace the Survey Data Report, which contains more complete descriptions of question wording and sample size information, and should not be used without being familiar with the information in the Survey Data Report. The working data tables were prepared to facilitate in the use of the SRES survey data in deriving behavioral assumptions for planning. This was accomplished by organizing the survey data most relevant to particular behaviors together and placing as much of it as feasible on the same page to permit at-a-glance perusal of the most relevant information. As a consequence, variable names have been shortened to compress the space needed to display all of the pertinent data, and certain conventions have been applied to serve as reminders about caveats applicable in some instances.

One such caveat involves sample size constraints. If the number of respondents to a question was lower than 10, a dash appears in the respective cell, indicating that the sample size was too small to make useful inferences. If the sample size was between 10 and 20, the sample size is shown in parentheses (e.g., n=15). In Tables 1, 2, 3, 5, 6, and 7 the variable "Would Evac in Cat 4-5" has an asterisk and data entries are italicized to indicate that the sample size for that variable is smaller than for others in the same table. In Tables 10 and 12 responses for the variable "Could Stay w/ Friend/Rel" are reported for the county as a whole because there were generally too few respondents to the question within a particular evacuation zone at the county level. The SRES Survey Data Report contains information about actual numbers of responses.

Tables 1, 2, 3, and 4 as applied to site-built homes, Tables 5, 6, 7, and 8 as applied to mobile homes , and Table 9 contain information relevant to whether respondents will evacuate (i.e., leave their homes to go someplace safer). Tables 10, 11, and 12 summarize data used in projecting the type of refuge evacuees will employ. Tables 13, 14, and 15 pertain to whether evacuees will leave their own county. Table 16 is relevant for predicting the percentage of available vehicles that will be used by evacuating households.

Appendix B-1

Charlotte County Working Data Tables

Evacuation intentions in a 10	J MPH Category	y 2 Hurricane			
Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Flood in Cat 2	23	17	15	8	10
Unsafe in Cat 2	27	21	9	12	10
Expect Evac Notice in Cat 2	46	36	43	33	30
Would Evac in Cat 2*	-	-	27	47	50 (n=14)
Would Comply in Cat 2	75	74	65	62	40

Table 1. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, andEvacuation Intentions in a 100 MPH Category 2 Hurricane

Table 2. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, andEvacuation Intentions in a 125 MPH Category 3 Hurricane

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Flood in Cat 3	39	33	28	12	10
Unsafe in Cat 3	43	33	25	25	30
Expect Evac Notice in Cat 3	65	68	60	45	60
Would Evac in Cat 3*	-	-	50	57	57 (n=14)
Would Comply in Cat 3	81	82	70	67	45

Table 3. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Flood in Cat 4-5	58	44	49	23	25
Unsafe in Cat 4-5	66	68	58	58	35
Expect Evac Notice in Cat 4-5	86	84	87	83	65
Would Evac in Cat 4-5*		-	87	70	79 (n=14)
Would Comply in Cat 4-5	90	86	85	77	70

Table 4. Evacuation in Charley, Ivan, and Wilma and Type of Evacuation Notice Heard, if any

		<i>,</i> ,			
Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Evacuated in Charley	34	14	11	13	6 (n=18)
Heard Must	2	1	1	0	0 (n=18)
Heard Should	17	11	7	11	11 (n=18)
Heard Neither	81	87	92	89	89 (n=18)
Evacuated in Ivan	25	8	10	25	6 (n= 16)
Heard Must	0	2	5	0	0 (n=16)
Heard Should	5	3	5	11	6 (n=16)
Heard Neither	95	95	89	89	94 (n=16)
Evacuated in Wilma	11	11	3	6	0 (n=17)
Heard Must	0	0	0	0	0 (n=17)
Heard Should	5	0	4	2	6 (n=17)
Heard Neither	95	100	96	98	94 (n=17)

Table 5. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 100 MPH Category 2 Hurricane

	0				
Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Flood in Cat 2	17 (n=12)	-	-	10 (n=10)	-
Unsafe in Cat 2	83 (n=12)	-	-	30 (n=10)	-
Expect Evac Notice in Cat 2	83 (n=12)	-	-	40 (n=10)	-
Would Evac in Cat 2	-	-	-	-	-
Would Comply in Cat 2	92 (n=12)	-	-	60 (n=10)	-

Table 6. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Flood in Cat 3	50 (n=12)	-	-	20 (n=10)	-
Unsafe in Cat 3	92 (n=12)	-	-	30 (n=10)	-
Expect Evac Notice in Cat 3	92 (n=12)	-	-	70 (n=10)	-
Would Evac in Cat 3	-	-	-	-	-
Would Comply in Cat 3	92 (n=12)	-	-	100 (n=10)	-

Table 7. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Flood in Cat 4-5	58 (n=12)	-	-	20 (n=10)	-
Unsafe in Cat 4-5	83 (n=12)	-	-	70 (n=10)	-
Expect Evac Notice in Cat 4-5	100 (n=12)	-	-	90 (n=10)	-
Would Evac in Cat 4-5	-	-	-	-	-
Would Comply in Cat 4-5	100 (n=12)	-	-	90 (n=10)	-

Table 8.	Evacuation in	Charley, Ivan	, and Wilma and	Type of Evacuation	Notice Heard, if any

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Evacuated in Charley	-	-	-	-	-
Heard Must	-	-	-	-	-
Heard Should	-	-	-	-	-
Heard Neither	-	-	-	-	-
	-	-	-	-	-
Evacuated in Ivan	-	-	-	-	-
Heard Must	-	-	-	-	-
Heard Should	-	-	-	-	-
Heard Neither	-	-	-	-	-
	-	-	-	-	-
Evacuated in Wilma	-	-	-	-	-
Heard Must	-	-	-	-	-
Heard Should	-	-	-	-	-
Heard Neither	-	-	-	-	-

Table 9. Evacuation in Charley, N	ian, and Wilma, Depending on Type o	f Evacuation Notice Heard
	Site-Built Homes	Mobile Homes
Evacuated in Charley IF		
Heard Must	-	-
Heard Should	41	-
Heard Neither	13	-
Evacuated in Ivan IF		
Heard Must	-	-
Heard Should	40 (n=15)	-
Heard Neither	12	24 (n=17)
Evacuated in Wilma IF		
Heard Must	-	-
Heard Should	-	-
Heard Neither	6	16

Table 9. Evacuation in Charley, Ivan, and Wilma, Depending on Type of Evacuation Notice Heard

Table 10. Intended Use of Public Shelters, Having Friends with Whom Respondent Intending to Go to				
Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Ivan, and Wilma				

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Public Shelter in Cat 2	14	10	13	12	5
Public Shelter in Cat 3	14	10	12	13	5
Public Shelter in Cat 4-5	11	7	14	15	0
Could Stay w/ Friend/Rel			39	-	
Public Shelter in Charley	22 (n=18)	0 (n=10)	-	-	-
Public Shelter in Ivan	0 (n=14)	-	-	9 (n=11)	-
Public Shelter in Wilma	-	-	-	-	-

Table 11. Type of Refuge Used in Charley, Ivan, and Wilma

	Site-Built Homes	Mobile Homes (2005-06)
Public Shelters		
Charley	19	7 (n=14)
lvan	3	-
Wilma	0 (n=19)	-
Friends/Relatives		
Charley	63	79 (n=14)
Ivan	42	-
Wilma	53 (n=19)	-
Hotels/Motels		
Charley	7	0 (n=14)
lvan	37	-
Wilma	32 (n=19)	-
Other		
Charley	12	14 (n=14)
lvan	16	-
Wilma	16 (n=19)	-

Table 12. Intended Use of Public Shelter, Having Friends with Whom Respondent Intending to Go to
Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Ivan, and Wilma

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Public Shelter in Cat 2	0 (n=12)	-	-	0 (n=10)	-
Public Shelter in Cat 3	0 (n=12)	-	-	0 (n=10)	-
Public Shelter in Cat 4-5	8 (n=12)	-	-	10 (n=10)	-
Could Stay w/ Friend/Rel	-				
Public Shelter in Charley	-	-	-	-	-
Public Shelter in Ivan	-	-	-	-	-
Public Shelter in Wilma	_	_	_	-	_

Table 13. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Ivan, and Wilma Evacuating Out-of-County

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Out of County in Cat 2	77	81	67	71	91 (n=11)
Out of County in Cat 3					92
Out of County in Cat 4-5					93 (n=14)
Out of County in Charley	56 (n=18)	-	-	-	-
Out of County in Ivan	92 (n=12)	-	-	73 (n=11)	-
Out of County in Wilma	-	-	-	-	-

Table 14. Percent of Evacuees in Charley, Ivan, and Wilma Evacuating Out-of-County

Region Total	Site-Built Homes	Mobile Homes
Out of County		
Charley	57	50 (n=14)
Ivan	86	-
Wilma	95 (n=19)	-

Table 15. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Ivan, and Wilma Evacuating Out-of-County

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Out of County In Cat 2	-	-	-	-	-
Out of County in Cat 3	-	-	-	-	-
Out of County in Cat 4-5	-	-	-	-	-
	-	-	-	-	-
Out of County in Charley	-	-	-	-	-
Out of County in Ivan	-	-	-	-	-
Out of County in Wilma	-	-	-	-	-

Table 16. Percent of Vehicles Available to Household Evacuees Intend to Use in Evacuation

Vehicle Use	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	
Site Built Homes		69				
Mobile Homes	85					

Appendix B-2

Collier County Working Data Tables

Evacuation Intentions in a 100 MPH Category 2 Hurricane						
Site Built Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge		
Flood in Cat 2	24	14	2	2		
Unsafe in Cat 2	33	18	6	17		
Expect Evac Notice in Cat 2	65	41	39	51		
Would Evac in Cat 2*	88 (n=16)	86	55	49		
Would Comply in Cat 2	80	77	67	72		

Table 1. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 100 MPH Category 2 Hurricane

Table 2. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

	0 1	1			
Site Built Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Flood in Cat 3	47	33	18	28	
Unsafe in Cat 3	62	48	31	30	
Expect Evac Notice in Cat 3	86	70	57	72	
Would Evac in Cat 3*	87 (n=15)	93	66	62	
Would Comply in Cat 3	88	89	84	83	

Table 3. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Site Built Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Flood in Cat 4-5	67	52	41	47	
Unsafe in Cat 4-5	76	79	59	66	
Expect Evac Notice in Cat 4-5	94	87	76	89	
Would Evac in Cat 4-5*	94 (n=16)	97	83	79	
Would Comply in Cat 4-5	93	97	88	89	

Table 4. Evacuation in Charley, Ivan, and Wilma and Type of Evacuation Notice Heard, if any

Site Built Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Evacuated in Charley	34	21	3	11	
Heard Must	15	10	3	6	
Heard Should	28	15	22	20	
Heard Neither	57	75	75	74	
Evacuated in Ivan	22	10	3	9	
Heard Must	5	2	3	9	
Heard Should	18	16	19	6	
Heard Neither	77	83	78	88	
Evacuated in Wilma	62	31	12	30	
Heard Must	25	10	0	5	
Heard Should	29	23	19	18	
Heard Neither	46	67	81	78	

Table 5. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 100 MPH Category 2 Hurricane

	0				
Mobile Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Flood in Cat 2	39 (n=13)	-	-	-	
Unsafe in Cat 2	85 (n=13)	-	-	-	
Expect Evac Notice in Cat 2	77 (n=13)	-	-	-	
Would Evac in Cat 2	-	-	-	-	
Would Comply in Cat 2	85 (n=13)	-	-	-	

Table 6. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

Mobile Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Flood in Cat 3	54	-	-	-	
Unsafe in Cat 3	77	-	-	-	
Expect Evac Notice in Cat 3	85	-	-	-	
Would Evac in Cat 3	-	-	-	-	
Would Comply in Cat 3	92 (n=13)	-	-	-	

Table 7. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Mobile Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Flood in Cat 4-5	77 (n=13)	-	-	-	
Unsafe in Cat 4-5	100 (n=13)	-	-	-	
Expect Evac Notice in Cat 4-5	100 (n=13)	-	-	-	
Would Evac in Cat 4-5	-	-	-	-	
Would Comply in Cat 4-5	92 (n=13)	-	-	-	

Table 8. Evacuation in Charley, Ivan, and Wilma and Type of Evacuation Notice Heard, if any

Mobile Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Evacuated in Charley	-	-	-	-	
Heard Must	-	-	-	-	
Heard Should	-	-	-	-	
Heard Neither	-	-	-	-	
Evacuated in Ivan		-	-	-	
Heard Must	-	-	-	-	
Heard Should	-	-	-	-	
Heard Neither	-	-	-	-	
Evacuated in Wilma	64 (n=11)	-	-	-	
Heard Must	46 (n=11)	-	-	-	
Heard Should	18 (n=11)	-	-	-	
Heard Neither	36 (n=11)	-	-	-	

	Site-Built Homes	Mobile Homes
Evacuated in Charley IF		
Heard Must	65	-
Heard Should	37	-
Heard Neither	11	-
Evacuated in Ivan IF		
Heard Must	-	-
Heard Should	42	-
Heard Neither	4	-
Evacuated in Wilma IF		
Heard Must	82	50(n=10)
Heard Should	54	-
Heard Neither	24	-

Collier County	
Table 9. Evacuation in Charley, Ivan, and Wilma, Depending on	Type of Evacuation Notice Heard

Table 10. Intended Use of Public Shelters, Having Friends with Whom Respondent Intending to Go to
Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Ivan, and Wilma

Site Built Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Public Shelter in Cat 2	9	13	18	15	
Public Shelter in Cat 3		13	20	13	
Public Shelter in Cat 4-5	8	14	18	9	
Could Stay w/ Friend/Rel	51				
Public Shelter in Charley	0	5	-	-	
Public Shelter in Ivan	6 (16)	-	-	-	
Public Shelter in Wilma	5	11	-	17 (12)	

Table 11. Type of Refuge Used in Charley, Ivan, and Wilma

	Site-Built Homes	Mobile Homes (2005-06)
Public Shelters		
Charley	4	10 (n=10)
lvan	10	-
Wilma	8	8 (n=13)
Friends/Relatives		
Charley	66	40 (n=10)
Ivan	50	-
Wilma	60	46 (n=13)
Hotels/Motels		
Charley	21	40 (n=10)
Ivan	23	-
Wilma	25	31 (n=13)
Other		
Charley	9	10 (n=10)
Ivan	13	-
Wilma	7	8 (n=13)

Table 12. Intended Use of Public Shelter, Having Friends with Whom Respondent Intending to Go to Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Ivan, and Wilma

Mobile Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Public Shelter in Cat 2	0 (n=13)	-	-	-	
Public Shelter in Cat 3	0 (n=13)	-	-	-	
Public Shelter in Cat 4-5	0 (n=13)	-	-	-	
Could Stay w/ Friend/Rel			-		
Public Shelter in Charley	-	-	-	-	
Public Shelter in Ivan	-	-	-	-	
Public Shelter in Wilma	-	_	-	-	

Table 13. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Ivan, and Wilma Evacuating Out-of-County

Site Built Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Out of County in Cat 2	76	66	63	62	
Out of County in Cat 3	76	66	63	66	
Out of County in Cat 4-5	80	71	65	70	
Out of County in Charley	79	46	-	-	
Out of County in Ivan	87 (n=15)	-	-	-	
Out of County in Wilma	77	62	-	73 (n=11)	

Table 14. Percent of Evacuees in Charley, Ivan, and Wilma Evacuating Out-of-County

Region Total	Site-Built Homes	Mobile Homes
Out of County		
Charley	63	40 (n=10)
Ivan	71	-
Wilma	71	42 (n=12)

Table 15. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Ivan, and Wilma Evacuating Out-of-County

Mobile Homes	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Out of County In Cat 2	40 (n=10)	-	-	-	
Out of County in Cat 3	40 (n=10)	-	-	-	
Out of County in Cat 4-5	-	-	-	-	
Out of County in Charley	-	-	-	-	
Out of County in Ivan	-	-	-	-	
Out of County in Wilma	-	-	-	-	

Table 16. Percent of Vehicles Available to Household Evacuees Intend to Use in Evacuation

Vehicle Use	Cat 1	Cat 2-3	Cat 4-5	Non-surge	
Site Built Homes		78		68	
Mobile Homes	79				

Appendix B-3

Glades County Working Data Tables

Table 1. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 100 MPH Category 2 Hurricane

Site Built Homes	
Flood in Cat 2	16
Unsafe in Cat 2	17
Expect Evac Notice in Cat 2	53
Would Evac in Cat 2*	82 (n=11)
Would Comply in Cat 2	64

Table 2. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

Site Built Homes	
Flood in Cat 3	23
Unsafe in Cat 3	40
Expect Evac Notice in Cat 3	72
Would Evac in Cat 3*	91
Would Comply in Cat 3	76

Table 3. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Site Built Homes	
Flood in Cat 4-5	40
Unsafe in Cat 4-5	67
Expect Evac Notice in Cat 4-5	93
Would Evac in Cat 4-5*	100 (n=11)
Would Comply in Cat 4-5	88

Table 4. Evacuation in Charley, Frances, and Jeanne and Type of Evacuation Notice Heard, if any

Site Built Homes	
Evacuated in Charley	20
Heard Must	10
Heard Should	12
Heard Neither	78
Evacuated in Frances	24
Heard Must	4
Heard Should	22
Heard Neither	74
Evacuated in Jeanne	20
Heard Must	8
Heard Should	16
Heard Neither	76

Table 5. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, andEvacuation Intentions in a 100 MPH Category 2 Hurricane

Mobile Homes	
Flood in Cat 2	23
Unsafe in Cat 2	56
Expect Evac Notice in Cat 2	76
Would Evac in Cat 2*	95 (n=19)
Would Comply in Cat 2	81

Table 6. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

Mobile Homes	
Flood in Cat 3	36
Unsafe in Cat 3	72
Expect Evac Notice in Cat 3	88
Would Evac in Cat 3*	100
Would Comply in Cat 3	89

Table 7. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Mobile Homes	
Flood in Cat 4-5	47
Unsafe in Cat 4-5	84
Expect Evac Notice in Cat 4-5	96
Would Evac in Cat 4-5*	100 (n=19)
Would Comply in Cat 4-5	97

Table 8. Evacuation in Charley, Frances, and Jeanne and Type of Evacuation Notice Heard, if any

Mobile Homes	
Evacuated in Charley	51
Heard Must	13
Heard Should	25
Heard Neither	62
Evacuated in Frances	52
Heard Must	14
Heard Should	28
Heard Neither	58
Evacuated in Jeanne	56
Heard Must	20
Heard Should	26
Heard Neither	54

	Site-Built Homes	Mobile Homes
Evacuated in Charley IF		
Heard Must	-	-
Heard Should	-	92 (n=13)
Heard Neither	13	33
Evacuated in Frances IF		
Heard Must	-	-
Heard Should	27 (n=11)	86 (n=14)
Heard Neither	22	28
Evacuated in Jeanne IF		
Heard Must	-	90 (n=10)
Heard Should	-	77 (n=13)
Heard Neither	16	33

Table 9. Evacuation in Charley, Frances, and Jeanne, Depending on Type of Evacuation Notice Heard

Table 10. Intended Use of Public Shelters, Having Friends with Whom Respondent Intending to Go to Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Frances, and Jeanne

Site Built Homes	
Public Shelter in Cat 2	16
Public Shelter in Cat 3	15
Public Shelter in Cat 4-5	12
Could Stay w/ Friend/Rel	8 (n=12)
Public Shelter in Charley	20 (n=10)
Public Shelter in Frances	17 (n=12)
Public Shelter in Jeanne	30 (n=10)

Table 11. Type of Refuge Used in Charley, Frances, and Jeanne (beware: all n's are very small)

	Site-Built Homes	Mobile Homes
Public Shelters		
Charley	20 (n=10)	15
Frances	17 (n=12)	12
Jeanne	30 (n=10)	11
Friends/Relatives		
Charley	60 (n=10)	59
Frances	67 (n=12)	54
Jeanne	50 (n=10)	61
Hotels/Motels		
Charley	0 (n=10)	11
Frances	8 (n=12)	15
Jeanne	0 (n=10)	11
Other		
Charley	20 (n=10)	11
Frances	8 (n=12)	19
Jeanne	20 (n=10)	18

Table 12. Intended Use of Public Shelter, Having Friends with Whom Respondent Intending to Go to Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Frances, and Jeanne

Mobile Homes	
Public Shelter in Cat 2	17
Public Shelter in Cat 3	19
Public Shelter in Cat 4-5	19
Could Stay w/ Friend/Rel	29 (n=17)
Public Shelter in Charley	15
Public Shelter in Frances	12
Public Shelter in Jeanne	11

Glades County

Table 13. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Frances, and Jeanne Evacuating Out-of-County

Site Built Homes	
Out of County in Cat 2	68
Out of County in Cat 3	71
Out of County in Cat 4-5	74
Out of County in Charley	80 (n=10)
Out of County in Frances	67 (n=12)
Out of County in Jeanne	50 (n=10)

Table 14. Percent of Evacuees in Charley, Frances, and Jeanne Evacuating Out-of-County

Region Total	Site-Built Homes	Mobile Homes
Out of County		
Charley	80 (n=10)	54
Frances	67 (n=12)	58
Jeanne	50 (n=10)	52

Table 15. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Frances, and Jeanne Evacuating Out-of-County

Mobile Homes	
Out of County In Cat 2	50
Out of County in Cat 3	48
Out of County in Cat 4-5	54
Out of County in Charley	54
Out of County in Frances	58
Out of County in Jeanne	52

Table 16. Percent of Vehicles Available to Household Evacuees Intend to Use in Evacuation

Vehicle Use	
Site Built Homes	80
Mobile Homes	89

Appendix B-4

Hendry County Working Data Tables

Table 1. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 100 MPH Category 2 Hurricane

Site Built Homes	
Flood in Cat 2	20
Unsafe in Cat 2	21
Expect Evac Notice in Cat 2	38
Would Evac in Cat 2*	35 (n=17)
Would Comply in Cat 2	69

Table 2. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

Site Built Homes	
Flood in Cat 3	29
Unsafe in Cat 3	50
Expect Evac Notice in Cat 3	61
Would Evac in Cat 3*	41 (n=17)
Would Comply in Cat 3	76

Table 3. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Site Built Homes	
Flood in Cat 4-5	45
Unsafe in Cat 4-5	64
Expect Evac Notice in Cat 4-5	86
Would Evac in Cat 4-5*	59 (n=17)
Would Comply in Cat 4-5	90

Table 4. Evacuation in Charley, Frances, and Jeanne and Type of Evacuation Notice Heard, if any

Site Built Homes	
Evacuated in Charley	24
Heard Must	4
Heard Should	14
Heard Neither	83
Evacuated in Frances	24
Heard Must	1
Heard Should	17
Heard Neither	82
Evacuated in Jeanne	17
Heard Must	0
Heard Should	15
Heard Neither	86

Table 5. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 100 MPH Category 2 Hurricane

Mobile Homes	
Flood in Cat 2	38
Unsafe in Cat 2	58
Expect Evac Notice in Cat 2	64
Would Evac in Cat 2*	69 (n=13)
Would Comply in Cat 2	82

Table 6. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

Mobile Homes	
Flood in Cat 3	53
Unsafe in Cat 3	78
Expect Evac Notice in Cat 3	91
Would Evac in Cat 3*	69 (n=13)
Would Comply in Cat 3	89

Table 7. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Mobile Homes	
Flood in Cat 4-5	64
Unsafe in Cat 4-5	82
Expect Evac Notice in Cat 4-5	89
Would Evac in Cat 4-5*	77 (n=13)
Would Comply in Cat 4-5	93

Table 8. Evacuation in Charley, Frances, and Jeanne and Type of Evacuation Notice Heard, if any

Mobile Homes	
Evacuated in Charley	61
Heard Must	13
Heard Should	29
Heard Neither	58
Evacuated in Frances	59
Heard Must	15
Heard Should	21
Heard Neither	65
Evacuated in Jeanne	49
Heard Must	21
Heard Should	12
Heard Neither	67

Table 0 Evacuation in Charles	/ Erances and leanne	Dononding on	Type of Evacuation Notice Heard
	, i i anices, anu jeanne	, Depending on	Type of Evacuation Notice Heard

	Site-Built Homes	Mobile Homes
Evacuated in Charley IF		
Heard Must	-	-
Heard Should	46 (n=11)	-
Heard Neither	20	44 (n=18)
Evacuated in Frances IF		
Heard Must	-	-
Heard Should	57 (n=11)	-
Heard Neither	15	41
Evacuated in Jeanne IF		
Heard Must	-	-
Heard Should	46 (n=11)	-
Heard Neither	12	27



Table 10. Intended Use of Public Shelters, Having Friends with Whom Respondent Intending to Go to Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Frances, and Jeanne

17	
18	
21	
72 (n=18)	
21 (n=19)	
21 (n=19)	
31 (=13)	

Table 11. Type of Refuge Used in Charley, Frances, and Jeanne

	Site-Built Homes	Mobile Homes		
Public Shelters				
Charley	21 (n=19)	21 (n=19)		
Frances	21 (n=19)	15 (n=20)		
Jeanne	31 (n=13)	19 (n=16)		
Friends/Relatives				
Charley	68 (n=19)	68 (n=19)		
Frances	58 (n=19)	80 (n=20)		
Jeanne	54 (n=13)	75 (n=16)		
Hotels/Motels				
Charley	5 (n=19)	0 (n=19)		
Frances	11 (n=19)	5 (n=20)		
Jeanne	0 (n=13)	6 (n=16)		
Other				
Charley	5 (n=19)	11 (n=19)		
Frances	11 (n=19)	0 (n=20)		
Jeanne	15 (n=13)	0 (n=16)		

Table 12. Intended Use of Public Shelter, Having Friends with Whom Respondent Intending to Go to
Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Frances, and Jeanne

Fublic Shelter Could Stay, and Actual Fublic Shelter Ose in C					
Mobile Homes					
Public Shelter in Cat 2	20				
Public Shelter in Cat 3	20				
Public Shelter in Cat 4-5	16				
Could Stay w/ Friend/Rel	55 (n=11)				
Public Shelter in Charley	21 (n=19)				
Public Shelter in Frances	15 (n=20)				
Public Shelter in Jeanne	19 (n=16)				

Table 13. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Frances, and Jeanne Evacuating Out-of-County

Site Built Homes		
Out of County in Cat 2	68	
Out of County in Cat 3	69	
Out of County in Cat 4-5	72	
Out of County in Charley	63 (n=19)	
Out of County in Frances	61 (n=18)	
Out of County in Jeanne	54 (n=13)	

Table 14. Percent of Evacuees in Charley, Frances, and Jeanne Evacuating Out-of-County

Region Total	Site-Built Homes	Mobile Homes
Out of County		
Charley	63 (n=19)	42 (n=19)
Frances	61 (n=18)	50 (n=20)
Jeanne	54 (n=13)	38 (n=16)

Table 15. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Frances, and Jeanne Evacuating Out-of-County

Mobile Homes	
Out of County In Cat 2	45
Out of County in Cat 3	51
Out of County in Cat 4-5	62
Out of County in Charley	42 (n=19)
Out of County in Frances	50 (n=20)
Out of County in Jeanne	38 (n=16)

Table 16. Percent of Vehicles Available to Household Evacuees Intend to Use in Evacuation

Vehicle Use	
Site Built Homes	71
Mobile Homes	71

Appendix B-5

Lee County Working Data Tables

Lee County

Site Built Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Flood in Cat 2	21	30	14	5	0
Unsafe in Cat 2	22	33	15	14	11
Expect Evac Notice in Cat 2	51	57	40	28	21
Would Evac in Cat 2*	-	-	52	42	50
Would Comply in Cat 2	71	85	70	65	60

Table 1. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 100 MPH Category 2 Hurricane

Table 2. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

Site Built Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Flood in Cat 3	41	48	28	14	4
Unsafe in Cat 3	45	63	44	33	26
Expect Evac Notice in Cat 3	69	76	72	56	47
Would Evac in Cat 3*	-	-	76	50	57
Would Comply in Cat 3	74	88	78	81	64

Table 3. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Site Built Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Flood in Cat 4-5	59	69	39	37	9
Unsafe in Cat 4-5	65	87	71	65	55
Expect Evac Notice in Cat 4-5	86	92	85	84	64
Would Evac in Cat 4-5*	-	-	92	80	71
Would Comply in Cat 4-5	87	93	89	86	72

Table 4. Evacuation in Charley, Ivan, and Wilma and Type of Evacuation Notice Heard, if any

	<i>,, ,</i>	/ 1			
Site Built Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Evacuated in Charley	33	51	18	13	9
Heard Must	10	28	4	0	3
Heard Should	32	23	21	17	3
Heard Neither	58	49	75	83	94
Evacuated in Ivan	13	21	6	17	9
Heard Must	5	7	4	0	3
Heard Should	10	7	9	13	3
Heard Neither	58	86	87	88	94
Evacuated in Wilma	20	40	16	3	5
Heard Must	3	8	4	0	3
Heard Should	12	25	13	3	11
Heard Neither	85	68	83	97	87

Lee County

Table 5. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and
Evacuation Intentions in a 100 MPH Category 2 Hurricane

Mobile Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Flood in Cat 2	-	25 (n=16)	10 (n=10)	-	-
Unsafe in Cat 2	-	63 (n=16)	40 (n=10)	-	-
Expect Evac Notice in Cat 2	-	81 (n=16)	50 (n=10)	-	-
Would Evac in Cat 2	-	-	-	-	-
Would Comply in Cat 2	-	94 (n=16)	90 (n=10)	-	-

Table 6. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

Mobile Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Flood in Cat 3	-	38 (n=16)	30 (n=10)	-	-
Unsafe in Cat 3	-	88 (n=16)	60 (n=10)	-	-
Expect Evac Notice in Cat 3	-	88 (n=16)	70 (n=10)	-	-
Would Evac in Cat 3	-	-	-	-	-
Would Comply in Cat 3	-	100 (n=16)	90 (n=10)	-	-

Table 7. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Mobile Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Flood in Cat 4-5	-	56 (n=16)	40 (n=10)	-	-
Unsafe in Cat 4-5	-	81 (n=16)	90 (n=10)	-	-
Expect Evac Notice in Cat 4-5	-	94 (n=16)	100 (n=10)	-	-
Would Evac in Cat 4-5	-	-	-	-	-
Would Comply in Cat 4-5	-	94 (n=16)	100 (n=10)	-	-

Table 8. Evacuat	on in Charley, Ivan,	and Wilma and Type of	Evacuation Notice Heard, if any

Mobile Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Evacuated in Charley	-	100 (n=11)	-	-	-
Heard Must	-	46 (n=11)	-	-	-
Heard Should	-	18 (n=11)	-	-	-
Heard Neither	-	46 (n=11)	-	-	-
Evacuated in Ivan	-	60 (n=10)	-	-	-
Heard Must	-	10 (n=10)	-	-	-
Heard Should	-	30 (n=10)	-	-	-
Heard Neither	-	60 (n=10)	-	-	-
Evacuated in Wilma	-	92 (n=12)	-	-	-
Heard Must	-	42 (n=12)	-	-	-
Heard Should	-	33 (n=12)	-	-	-
Heard Neither	-	25 (n=12)	-	-	-

	Site-Built Homes	Mobile Homes
Evacuated in Charley IF		
Heard Must	73	-
Heard Should	41	-
Heard Neither	16	67 (n=12)
Evacuated in Ivan IF		
Heard Must	-	-
Heard Should	26 (n=19)	-
Heard Neither	8	31 (n=16)
Evacuated in Wilma IF		
Heard Must	80 (n=10)	-
Heard Should	44	-
Heard Neither	12	47 (n=15)

Lee County

Table 9. Evacuation in Charley, Ivan, and Wilma, Depending on Type of Evacuation Notice Heard

Lee County

Table 10. Intended Use of Public Shelters, Having Friends with Whom Respondent Intending to Go to
Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Ivan, and Wilma

Site Built Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Public Shelter in Cat 2	5	8	10	19	11
Public Shelter in Cat 3	6	8	7	23	11
Public Shelter in Cat 4-5	8	5	6	23	13
Could Stay w/ Friend/Rel	50				
Public Shelter in Charley	9	23	0 (n=10)	-	-
Public Shelter in Ivan	-	-	-	-	-
Public Shelter in Wilma	7 (n=15)	10	0 (n=11)	-	-

Table 11. Type of Refuge Used in Charley, Ivan, and Wilma

// 0	Site-Built Homes	Mobile Homes (2005-06)
Public Shelters		
Charley	13	25 (n=20)
lvan	7	-
Wilma	6	6 (n=16)
Friends/Relatives		
Charley	62	30 (n=20)
lvan	36	-
Wilma	58	44 (n=16)
Hotels/Motels		
Charley	16	30 (n=20)
Ivan	32	-
Wilma	28	25 (n=16)
Other		
Charley	7	15 (n=20)
Ivan	21	-
Wilma	8	25 (n=16)

Table 12. Intended Use of Public Shelter, Having Friends with Whom Respondent Intending to Go to Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Ivan, and Wilma

Mobile Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Public Shelter in Cat 2	-	6 (n=16)	20 (n=10)	-	-
Public Shelter in Cat 3	-	6 (n=16)	30 (n=10)	-	-
Public Shelter in Cat 4-5	-	6 (n=16)	30 (n=10	-	-
Could Stay w/ Friend/Rel			-		
Public Shelter in Charley	-	18 (n=11)	-	-	-
Public Shelter in Ivan	-	-	-	-	-
Public Shelter in Wilma	-	19 (n=11)	-	-	-

Lee County

Table 13. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Ivan, and Wilma Evacuating Out-of-County

Site Built Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Out of County in Cat 2	62	62	74	55	71
Out of County in Cat 3	62	62	82	46	74
Out of County in Cat 4-5	73	67	88	57	77
Out of County in Charley	35	43	50 (n=10)	-	-
Out of County in Ivan	-	_	-	-	-
Out of County in Wilma	73 (n=15)	62	73 (n=11)	-	-

Table 14. Percent of Evacuees in Charley, Ivan, and Wilma Evacuating Out-of-County

Region Total	Total Site-Built Homes	
Out of County		
Charley	42	45 (n=20)
Ivan	82	-
Wilma	66	71 (n=14)

Table 15. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Ivan, and Wilma Evacuating Out-of-County

Mobile Homes	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Out of County In Cat 2	-	58 (n=12)	-	-	-
Out of County in Cat 3	-	64 (n=11)	-	-	-
Out of County in Cat 4-5	-	60 (n=10)	-	-	-
Out of County in Charley	-	64 (n=11)	-	-	-
Out of County in Ivan	-	-	-	-	-
Out of County in Wilma	-	80 (n=10)	-	-	-

Table 16. Percent of Vehicles Available to Household Evacuees Intend to Use in Evacuation

Vehicle Use	Cat 1 N	Cat 1 S	Cat 2-3	Cat 4-5	Non-surge
Site Built Homes		75			
Mobile Homes	83				

Appendix B-6

Sarasota County Working Data Tables

Sarasota County

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge		
Flood in Cat 2	21	12	3	15	2		
Unsafe in Cat 2	28	17	12	20	15		
Expect Evac Notice in Cat 2	61	39	34	39	36		
Would Evac in Cat 2*	-	-	35	41	35		
Would Comply in Cat 2	82	68	75	74	72		

Table 1. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 100 MPH Category 2 Hurricane

Table 2. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Flood in Cat 3	48	32	19	35	9
Unsafe in Cat 3	54	49	45	52	43
Expect Evac Notice in Cat 3	79	71	59	76	57
Would Evac in Cat 3*	-	-	50	63	52
Would Comply in Cat 3	94	81	84	83	72

Table 3. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Flood in Cat 4-5	73	53	40	63	34
Unsafe in Cat 4-5	83	75	68	78	64
Expect Evac Notice in Cat 4-5	91	92	84	91	92
Would Evac in Cat 4-5*	-	-	77	85	76
Would Comply in Cat 4-5	95	88	94	96	87

Table 4. Evacuation in Charley, Frances, and Wilma and Type of Evacuation Notice Heard, if any

Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	
26	13	9	14	8	
15	6	1	3	0	
19	13	9	8	3	
66	82	90	89	97	
15	6	3	6	6	
5	2	0	0	0	
13	4	9	0	0	
83	95	91	100	100	
11	5	5	6	0	
4	2	0	0	0	
4	2	7	6	3	
91	97	93	94	97	
	Cat 1 26 15 19 66 15 5 13 83 13 83 11 4 4 4	Cat 1 Cat 2 26 13 15 6 19 13 66 82 15 6 5 2 13 4 83 95 11 5 4 2 4 2	Cat 1 Cat 2 Cat 3 26 13 9 15 6 1 19 13 9 66 82 90 15 6 3 5 2 0 13 4 9 83 95 91 11 5 5 4 2 0 4 2 7	Cat 1 Cat 2 Cat 3 Cat 4-5 26 13 9 14 15 6 1 3 19 13 9 8 66 82 90 89 15 6 3 6 5 2 0 0 13 4 9 0 83 95 91 100 11 5 5 6 4 2 0 0 4 2 7 6	

Sarasota County

Table 5. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and
Evacuation Intentions in a 100 MPH Category 2 Hurricane

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Flood in Cat 2	5	21 (n=14)	-	-	-
Unsafe in Cat 2	63 (n=19)	64 (n=14)	-	-	-
Expect Evac Notice in Cat 2	90 (n=19)	64 (n=14)	-	-	-
Would Evac in Cat 2	-	-	-	-	-
Would Comply in Cat 2	95 (n=19)	86(n=14)	-	-	-

Table 6. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Flood in Cat 3	4 (n=19)	43 (n=14)	-	-	-
Unsafe in Cat 3	84 (n=19)	79 (n=14)	-	-	-
Expect Evac Notice in Cat 3	95 (n=19)	93 (n=14)	-	-	-
Would Evac in Cat 3	-	-	-	-	-
Would Comply in Cat 3	100 (n=19)	93 (n=14)	-	-	-

Table 7. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Flood in Cat 4-5	53 (n=19)	71 (n=14)	-	-	-
Unsafe in Cat 4-5	100 (n=19)	93 (n=14)	-	-	-
Expect Evac Notice in Cat 4-5	100 (n=19)	100 (n=14)	-	-	-
Would Evac in Cat 4-5	-	-	-	-	-
Would Comply in Cat 4-5	100 (n=19)	100 (n=14)	-	-	-

Table 8. Evacuation in Charley, Frances, and Wilma and Type of Evacuation Notice Heard, if any	Table 8	. Evacuation in Charley,	Frances, and Wilma and T	Type of Evacuation Notice He	ard, if any
--	---------	--------------------------	--------------------------	------------------------------	-------------

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Evacuated in Charley	77 (n=13)	-	-	-	-
Heard Must	46	-	-	-	-
Heard Should	31	-	-	-	-
Heard Neither	23	-	-	-	-
Evacuated in Frances	46 (n=13)	-	-	-	-
Heard Must	15	-	-	-	-
Heard Should	15	-	-	-	-
Heard Neither	69	-	-	-	-
Evacuated in Wilma	30 (n=10)	-	-	-	-
Heard Must	20	-	-	-	-
Heard Should	10	-	-	-	-
Heard Neither	70	-	-	-	-

	Site-Built Homes	Mobile Homes
Evacuated in Charley IF		
Heard Must	50 (n=12)	80 (n=10)
Heard Should	39	-
Heard Neither	8	-
Evacuated in Frances IF		
Heard Must	-	-
Heard Should	15 (n=13)	-
Heard Neither	5	23 (n=13)
Evacuated in Wilma IF		
Heard Must	-	-
Heard Should	9 (n=11)	-
Heard Neither	4	8 (n=12)

Sarasota County

Table 9. Evacuation in Charley, Frances, and Wilma, Depending on Type of Evacuation Notice Heard

Sarasota County

Table 10. Intended Use of Public Shelters, Having Friends with Whom Respondent Intending to Go to				
Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Frances, and Wilma				

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Public Shelter in Cat 2	11	14	16	24	13
Public Shelter in Cat 3	10	15	15	24	13
Public Shelter in Cat 4-5	11	17	16	22	17
Could Stay w/ Friend/Rel			48	-	-
Public Shelter in Charley	8 (n=12)	-	-	-	-
Public Shelter in Frances	-	-	-	-	_
Public Shelter in Wilma	-	_	-	-	_

Table 11. Type of Refuge Used in Charley, Frances, and Wilma

	Site-Built Homes	Mobile Homes (2005-06)
Public Shelters		
Charley	9	24 (n=17)
Frances	13 (n=15)	30 (n=10)
Wilma	7 (n=14)	40 (n=10)
Friends/Relatives		
Charley	64	35 (n=17)
Frances	60 (n=15)	50 (n=10)
Wilma	64 (n=14)	60 (n=10)
Hotels/Motels		
Charley	24	41 (n=17)
Frances	13 (n=15)	10 (n=10)
Wilma	29 (n=14)	0 (n=10)
Other		
Charley	3	0 (n=17)
Frances	13 (n=15)	10 (n=10)
Wilma	0 (n=14)	0 (n=10)

Table 12. Intended Use of Public Shelter, Having Friends with Whom Respondent Intending to Go to
Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Frances, and Wilma

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Public Shelter in Cat 2	21 (n=19)	36 (n=14)	-	-	-
Public Shelter in Cat 3	21 (n=19)	36 (n=14)	-	-	-
Public Shelter in Cat 4-5	16 (n=19)	29 (n=14)	-	-	-
Could Stay w/ Friend/Rel	33 (n=18)				
Public Shelter in Charley	10 (n=10)	-	-	-	-
Public Shelter in Frances	-	-	-	-	_
Public Shelter in Wilma	-	-	-	_	_

Sarasota County

Table 13. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Frances,
and Wilma Evacuating Out-of-County

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Out of County in Cat 2	51	53	62	58	65
Out of County in Cat 3	56	55	62	58	65
Out of County in Cat 4-5	64	59	67	60	64
Out of County in Charley	58 (n=15)	-	-	-	-
Out of County in Frances	-	-	-	-	-
Out of County in Wilma	-	-	-	-	-

Table 14. Percent of Evacuees in Charley, Frances, and Wilma Evacuating Out-of-County

Region Total	Site-Built Homes	Mobile Homes
Out of County		
Charley	49	38 (n=16)
Frances	33 (n=15)	20 (n=10)
Wilma	43 (n=14)	10 (n=10)

Table 15. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Frances, and Wilma Evacuating Out-of-County

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge
Out of County In Cat 2	38 (n=16)	0 (n=10)	-	-	-
Out of County in Cat 3	41 (n=17)	-	-	-	-
Out of County in Cat 4-5	47 (n=15)	-	-	-	-
Out of County in Charley	40 (n=10)	-	-	-	-
Out of County in Frances	-	-	-	-	-
Out of County in Wilma	-	-	-	-	-

Table 16. Percent of Vehicles Available to Household Evacuees Intend to Use in Evacuation

Vehicle Use	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge		
Site Built Homes	72 70						
Mobile Homes	90						

Appendix B-7

Southwest Florida Region Working Data Tables

Officials, and Evacuation intentions in a 100 MPH Category 2 Humcane						
Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Flood in Cat 2	24	14	9	8	3	18
Unsafe in Cat 2	29	18	10	13	14	19
Expect Evac Notice in Cat 2	56	39	38	35	35	44
Would Evac in Cat 2*	88 (n=16)	70	30	46	44	54
Would Comply in Cat 2	78	73	70	67	65	67

Working Data Table 1. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 100 MPH Category 2 Hurricane

Working Data Table 2. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Flood in Cat 3	48	32	23	19	13	26
Unsafe in Cat 3	54	44	34	24	32	46
Expect Evac Notice in Cat 3	76	70	59	58	57	61
Would Evac in Cat 3*	87 (n=15)	85	50	59	57	61
Would Comply in Cat 3	85	84	77	78	70	76

Working Data Table 3. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

-		0				
Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Flood in Cat 4-5	65	48	45	40	29	43
Unsafe in Cat 4-5	75	74	63	65	58	65
Expect Evac Notice in Cat 4-5	90	87	86	83	80	89
Would Evac in Cat 4-5*	94 (n=15)	94	82	79	76	75
Would Comply in Cat 4-5	91	91	89	86	81	89

Working Data Table 4. Evacuation in Charley, Ivan, and Wilma and Type of Evacuation Notice Heard, if any (Charley, Frances, and Jeanne in Non-Coastal Counties)

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Evacuated in Charley	35	17	10	11	9	23
Heard Must	14	6	1	1	2	6
Heard Should	25	15	8	14	9	13
Heard Neither	62	79	91	85	89	81
Evacuated in Ivan	20	9	10	16	8	24 (Fr)
Heard Must	4	2	5	1	4	2
Heard Should	11	10	5	14	5	19
Heard Neither	85	87	89	85	92	79
Evacuated in Wilma	33	19	4	7	11	18 (Jn)
Heard Must	10	5	0	0	2	3
Heard Should	17	12	5	8	10	15
Heard Neither	73	83	95	92	88	82

Officials, and Evacuation intentions in a 100 MPH Category 2 Hufficalle							
Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal	
Flood in Cat 2	21	14	8 (n=12)	23	38 (n=16)	28	
Unsafe in Cat 2	69	58	58 (n=12)	46	56 (n=16)	57	
Expect Evac Notice in Cat 2	82	64	67 (n=12)	55	100(n=16)	72	
Would Evac in Cat 2*	-	-	-	82 (n=17)	70 (n=10)	84	
Would Comply in Cat 2	92	89	92 (n=12)	68	81 (n=16)	82	

Working Data Table 5. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 100 MPH Category 2 Hurricane

Working Data Table 6. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 125 MPH Category 3 Hurricane

-						
Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Flood in Cat 3	45	28	25 (n=12)	27	50 (n=16)	43
Unsafe in Cat 3	86	69	58 (n=12)	55	63 (n=16)	74
Expect Evac Notice in Cat 3	90	86	75 (n=12)	82	81 (n=16)	89
Would Evac in Cat 3*	-	-	-	82 (n=17)	60 (n=10)	88
Would Comply in Ct 3	97	89	100(n=12)	96	81 (n=16)	89

Working Data Table 7. Perceived Vulnerability, Expectation of Receiving an Evacuation Notice from Officials, and Evacuation Intentions in a 155 MPH Category 4 (nearly 5) Hurricane

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Flood in Cat 4-5	60	50	42 (n=12)	36	56 (n=16)	53
Unsafe in Cat 4-5	92	86	92 (n=12)	86	81 (n=16)	83
Expect Evac Notice in Cat 4-5	98	97	92 (n=12)	96	94 (n=16)	93
Would Evac in Cat 4-5*	-	-	-	88 (n=17)	70 (n=10)	91
Would Comply in Cat 4-5	97	100	100(n=12)	91	94 (n=16)	96

Working Data Table 8. Evacuation in Charley, Ivan, and Wilma and Type of Evacuation Notice Heard, if any (Charley, Frances, and Jeanne in Non-Coastal Counties)

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Evacuated in Charley	84	65	-	73 (n=11)	-	55
Heard Must	35	30	-	27 (n=11)	-	13
Heard Should	32	25	-	27 (n=11)	-	26
Heard Neither	32	45	-	46	-	61
Evacuated in Ivan	39	27 (n=11)	-	30 (n=10)	-	55 (Fr)
Heard Must	4	0 (n=10)	-	10 (n=10)	-	14
Heard Should	25	9 (n=11)	-	40 (n=10)	-	25
Heard Neither	71	91 (n=11)	-	50 (n=10)	-	61
Evacuated in Wilma	52	39	-	40 (n=15)	-	53 (Jn)
Heard Must	21	26	-	7	-	21
Heard Should	21					21
Heard Neither						59

Working Data Table 9. Evacuation in Charley, Ivan, and Wilma, Depending on Type of Evacuation Notice Heard

	Site-Built Homes	Mobile Homes
Evacuated in Charley IF		
Heard Must	63	83
Heard Should	39	84
Heard Neither	12	46
Evacuated in Ivan IF		
Heard Must	78	-
Heard Should	37	57 (n=14)
Heard Neither	9	27
Evacuated in Wilma IF		
Heard Must	83	94 (n=17)
Heard Should	47	69 (n=10)
Heard Neither	11	27

Working Data Table 10. Intended Use of Public Shelters, Having Friends with Whom Respondent Intending to Go to Public Shelter Could Stay, and Actual Public Shelter Use in Charley, Ivan, and Wilma in coastal counties, Charley, Frances, and Jeanne in non-coastal counties

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Public Shelter in Cat 2	9	12	15	18	12	17
Public Shelter in Cat 3	9	12	13	20	11	17
Public Shelter in Cat 4-5	9	11	15	19	11	14
Could Stay w/ Friend/Rel	42	49	61	45	39	80
Public Shelter in Charley	12	4	7 (n=14)	27 (n=15)	18 (n=11)	21
Public Shelter in Ivan	4	6 (n=18)	-	6 (n=16)	-	19 (Fr)
Public Shelter in Wilma	6	9	-	0 (n=11)	14 (n=14)	30 (Jn)

Working Data Table 11. Type of Refuge Used in Charley, Ivan, and Wilma

	Site-Built Homes	Mobile Homes		
Public Shelters				
Charley	12	18		
Ivan	6	19		
Wilma	7	16		
Friends/Relatives				
Charley	64	52		
Ivan	43	48		
Wilma	59	50		
Hotels/Motels				
Charley	15	19		
Ivan	32	24		
Wilma	27	21		
Friends/Relatives				
Charley	8	10		
Ivan	17	10		
Wilma	8	11		

Working Data Table 12. Intended Use of Pub Shelter, Could Stay with Friends, and Actual Public Shelter Use in Charley, Ivan, and Wilma in coastal counties; Charley, Frances, and Jeanne in non-coastal counties

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Public Shelter in Cat 2	10	19	33 (n=12)	14	13 (n=16)	18
Public Shelter in Cat 3	10	22	33 (n=12)	18	19 (n=16)	19
Public Shelter in Cat 4-5	10	19	33 (n=12)	18	25 (n=16)	18
Could Stay w/ Friend/Rel	37					64
Public Shelter in Charley	13	8 (n=13)	-	-	20	17
Public Shelter in Ivan	0 (n=11)	-	-	-	-	13 (Fr)
Public Shelter in Wilma						16 (Jn)

Working Data Table 13. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Ivan, and Wilma in Coastal Counties, Charley, Frances, and Jeanne in Non-coastal Counties, Evacuating Out-of-County

Site Built Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Out of County in Cat 2	67	68	64	62	68	68
Out of County in Cat 3	68	71	67	60	71	70
Out of County in Cat 4-5	74	75	72	63	73	73
Out of County in Charley	55	52	50 (n=14)	47 (n=15)	36 (n=11)	69
Out of County in Ivan	89	71	-	75 (n=16)	-	63 (Fr)
Out of County in Wilma	73	67	-	64 (n=11)	69 (n=13)	52 (Jn)

Working Data Table 14. Percent of Evacuees in Charley, Ivan, and Wilma Evacuating Out-of-County

Region Total	Site-Built Homes	Mobile Homes		
Out of County				
Charley	55	46		
Ivan	80	62		
Wilma	70	51		

Working Data Table 15. Intention to Evacuate to Out-of-County Destination, Percent of Evacuees in Charley, Ivan, and Wilma in Coastal Counties, Charley, Frances, and Jeanne in Non-coastal Counties, Evacuating Out-of-County

Mobile Homes	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Out of County In Cat 2	45	35	-	53 (n=15)	50 (n=16)	48
Out of County in Cat 3	47	35	60 (n=10)	56 (n=16)	56 (n=16)	57
Out of County in Cat 4-5	52	39	60 (n=10)	62 (n=16)	53 (n=15)	57
Out of County in Charley	48	42 (n=12)	-	-	-	49
Out of County in Ivan	82 (n=11)	-	-	-	-	54 (Fr)
Out of County in Wilma	57	-	-	-	-	47 (Jn)

Working Data Table 16. Percent of Vehicles Available to Household Evacuees Intend to Use in Evacuation

Vehicle Use	Cat 1	Cat 2	Cat 3	Cat 4-5	Non-surge	Non-coastal
Site Built Homes	73	77	76	73	71	75
Mobile Homes	83	91	97	74	74	82