

ATTACHMENT E: Case-control Telephone Interview

Hello, my name is _____ from the Puerto Rico Department of Health in collaboration with the Centers for Disease Control and Prevention. Could I please speak with [__name__]?

I am calling you because I am partnering with WIC and the Puerto Rico Department of Health to evaluate different services that have been offered to pregnant women in order to help them protect themselves and their babies from Zika. We are also trying to learn more about the best ways to prevent Zika among women who were tested for Zika virus by their doctor. Would you be willing to talk with me for a few minutes (less than 25 minutes) about your experience and the types of Zika prevention services you received in the past few months? Everything we discuss will be kept confidential. It will help us know how we can do a better job of helping you and other pregnant women in Puerto Rico.

No – *thank you for your time! Have a nice day.* **[End interview]**

Yes, [If yes, are you over 18 years of age]

Great! Thank you for your willingness to share your opinions with me.

Your doctor reported that you had blood drawn for a Zika test on <specimen collection date>. Is that correct?

No *[Stop the interview]*

Yes – continue

I would like to ask you some questions about the three months before you had your blood drawn. It might be helpful to look at a calendar to help remember your activities during that time; do you have a calendar that you can use?

Your opinions will help us improve the types of services we can offer women. I have just a few questions that will take less than 25 minutes. If we get disconnected, I will call you back.

Before I begin I want to go over a couple of items:

- This interview is voluntary. You can decline to answer any question and you can end our conversation at any time
- There are no right or wrong answers. I am interested in your opinion. If you don't understand the question, feel free to let me know and I can ask it another way. This is not a test, so feel free to say you don't know or don't have an opinion to offer and "I don't know" is a perfectly acceptable response to any question I ask you.
- The information you provide today will not be shared with anyone except those involved in this project. It's important to know that the questions I'm about to ask you will not affect your eligibility for WIC services in any way. Our reports will include the responses of ALL the women who talk with us so that you can provide honest answers without worrying that your answers will hurt you in any way.

Public reporting burden of this collection of information is estimated to average 20 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. An agency may not conduct or sponsor, and a person is not required to respond to a collection of information unless it displays a currently valid OMB control number. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden to CDC/ATSDR Information Collection Review Office, 1600 Clifton Road NE, MS D-74, Atlanta, Georgia 30333; ATTN: PRA (0920-1118).

- Do you have any questions before we begin?

First, I'd like to ask you questions about materials or supplies you might have received from the WIC program.

1. Have you heard of Zika Prevention Kits?

- Yes continue to question 2 (ZPK receipt)
- No

No or if unsure what ZPKs are: *The Zika Prevention Kit is a tote bag that contains educational information from the Puerto Rico Health Department and the Centers for Disease Control and Prevention about how to prevent Zika infection while you are pregnant along with items that could help prevent Zika virus infection. Items in the kit include: a mosquito bed net, mosquito repellent, condoms, and some include mosquito dunks (larvicide) and thermometers.*

2. Have you received a Zika Prevention Kit?

- No - skip to Q11 (Did you attend an educational session about Zika?)
- Yes

What day did you receive the ZPK?

Date: _____

3. When you received the Zika Prevention Kit, what color was the tote bag?

- White
- Blue
- Green
- Other, please specify:
- Don't know/Not sure
- Refused

4. Did you open your Zika Prevention Kit?

- No (skip to Q7, educational session)

Why not? _____

- Refused

- Yes

5. What did the information in the kit say you need to do? (Probe for use repellents, use bed net, use condoms, etc.) [Don't read options - wait for response]

- Use insect repellent
- Sleep under bed net
- Put mosquito dunks in standing water
- Use condoms/don't have unprotected sex
- Go to doctor if ill
- Other, please specify: _____

6. What items were included in the kit? (Do not read, tick all mentioned)

- Repellent
- Bed net
- Mosquito dunks

- Condom(s)
- Thermometer
- Educational materials
- Other, please specify: _____

7. Did you **use up** any of the items that were included in the Zika prevention kit? Which items?

Yes, which items

- Repellent
- Condoms
- Mosquito dunks (or other larvicide)
- Mosquito bed net

No – skip to Q9

Don't know/not sure

Refused

8. Did you purchase any items to replace the items in the kit that you used up (or needed to replace)?

Yes, which items

- Repellent
- Condoms
- Mosquito dunks (or other larvicide)
- Mosquito bed net

No, why not?

- Do not have money to buy
- Items are too expensive (too costly)
- Am embarrassed to buy (e.g., condoms)
- Do not feel I need them (they don't offer protection)
- Other, please specify: _____

Don't know/not sure

Refused

9. If you got to say what items should go into a Zika Prevention Kit to help pregnant women in Puerto Rico to protect themselves from getting infected with Zika, what items would you put in the kit?

I would include the same items that are there now

I would include more (a current item) _____

I would add... (new items) _____

I would do something else entirely (specify) _____

Don't know/not sure

Refused

For any items that are not currently included in the Zika Prevention Kit, ask them why they would put the particular item in the kit? What protection do they think it offers?

10. Did you attend an educational session at WIC that provided information about Zika?

- No

- Don't know/not sure
- Refused
- Yes - What day did you attend the educational session?
Date: _____
- Don't know/refused

11. Did you receive educational materials (handouts, written information) about Zika from WIC?

- No
- Don't know/not sure
- Refused
- Yes

What day did you receive the materials?

Date: _____

- Don't know/refused

Now, I'm going to ask more questions about your activities in the 3 months before you got blood drawn for the Zika test. It might be helpful to look at a calendar to help remember this time period. For most of the questions, I'll be asking from now on, think about what you did in that period of time.

12. During the time three months before you had blood drawn for the Zika test, how often did you put mosquito repellent on skin that was not covered by clothing?

- Never or almost never
- Seldom or rarely
- Sometimes
- Often
- Usually or most of the time
- Always or almost always
- Refused

12a. *If yes to any repellent use and received ZPK:* Did you use the repellent from the ZPK?

- Yes
- No
- Refused

13. During that same time, how often did you wear long pants?

- a. Never or almost never
- b. Seldom or rarely
- c. Sometimes
- d. Often
- e. Usually or most of the time
- f. Always or almost always
- g. Refused

14. During that same time, how often did you wear a long-sleeved shirt?
- Never or almost never
 - Seldom or rarely
 - Sometimes
 - Often
 - Usually or most of the time
 - Always or almost always
 - Refused
15. During that same time, how often did you or somebody else in your household remove accumulated water and cover up or screen water containers inside and around your home (on your property)?
- Never or almost never
 - Seldom or rarely
 - Sometimes
 - Often
 - Usually or most of the time
 - Always or almost always
 - Refused
16. During that same time, did you ever put a mosquito dunk, or larvicide, in accumulated water around your home?
- Never or almost never
 - Seldom or rarely
 - Sometimes
 - Often
 - Usually or most of the time
 - Always or almost always
 - Refused
- 16a. *If yes and received ZPK, did you use the mosquito dunk from the Zika Prevention Kit?*
- Yes
- No
- Refused
17. During that same time, did you usually sleep under a mosquito net when you slept or took a nap?
- Never or almost never
 - Seldom or rarely
 - Sometimes
 - Often
 - Usually or most of the time
 - Always or almost always
 - Refused

17a. *If yes and received ZPK, did you use the mosquito net from the Zika Prevention Kit?*

Yes
No
Refused

The next questions are about sexual relations with your husband or male partner. Again, everything we discuss will be confidential.

18. During the three months before you had blood drawn for the Zika test, did you have sexual intercourse [that is, vaginal, anal, or oral (mouth-to-penis) sex] with your male partner?

No,
After recording response, go to question 21

Yes
Prefer not to answer

19. When you had sex during that same time, how often did you use a condom?

Every time I had sex → Go to question 22

Sometimes when I had sex → Go to question 22

I never used a condom when I had sex → Go to question 23

Prefer not to answer

20. *If used condoms and received ZPK*, Did you use condoms from the Zika Prevention Kit?

Yes
No
Refused

21. Is there anything that we haven't discussed that you have been doing to reduce the risk of mosquito bites to avoid getting Zika virus during the three months before you had blood drawn for the Zika test?

No
Yes, What?

Staying indoors

I moved to/spend more time in another location with fewer mosquitoes, or better housing

I have sprayed my house with pesticide by myself or my family

I have had a business come spray my house

Burn mosquito coils

Use mosquito zapper rackets

Other, please specify:

Refused

Questions about insecticide services for pregnant women

READ: *Indoor residual spraying (IRS) is when specially trained professionals spray insecticide inside of the home in and on the places that mosquitoes like to rest – usually dark and moist places. Examples of places are under tables, behind furniture, under beds and cabinets with sinks, and by dirty laundry. The spraying can be done anytime during the day and usually will kill mosquitoes for about three months. IRS is most effective when most houses in a neighborhood have their homes sprayed.*

22. Have you been offered spraying services for your home? [or Has anyone called you/contacted you to offer you spraying services for free?]

- Yes
- No (skip to question 24)
- Don't know/not sure
- Refused

23. Did you receive spraying services at your home? (or has your home been sprayed already?)

- Yes
 - When did the spraying services occur?
 - Date: _____

- No
- Don't know/not sure
- Refused

24. During the three months before you had blood drawn for the Zika test, did you notice any of the following activities in your community? Read the list and for each item, check No if they did not see it or Yes, if they did it.

| | No | Yes |
|--|--------------------------|--------------------------|
| a. Municipality workers applying larvicide | <input type="checkbox"/> | <input type="checkbox"/> |
| b. Fumigation trucks spraying insecticide | <input type="checkbox"/> | <input type="checkbox"/> |
| c. Efforts to clean up trash and remove tires | <input type="checkbox"/> | <input type="checkbox"/> |
| d. Community meetings to discuss Zika | <input type="checkbox"/> | <input type="checkbox"/> |
| e. Messages telling the community to eliminate accumulated water | <input type="checkbox"/> | <input type="checkbox"/> |
| f. Volunteers going to homes to teach about reducing mosquito breeding sites | <input type="checkbox"/> | <input type="checkbox"/> |
| g. Volunteers helping to install screen windows and doors | <input type="checkbox"/> | <input type="checkbox"/> |
| h. Neighbors or volunteers putting mosquito traps around homes | <input type="checkbox"/> | <input type="checkbox"/> |
| i. Neighbors or workers fixing septic tanks, covering pipes | <input type="checkbox"/> | <input type="checkbox"/> |
| j. School events about Zika | <input type="checkbox"/> | <input type="checkbox"/> |

k. Other, please specify:

□ □

Questions about mosquitoes in their environment (environmental stimuli)

For all the questions I'm about to ask, try to think about the three months before you had blood drawn.

25. During an average week from 7am - 7pm, how many hours (maximum 12) are you at home or in this community on:

| | Monday | Tuesday | Wednesday | Thursday | Friday | Saturday | Sunday |
|--------------------------|--------|---------|-----------|----------|--------|----------|--------|
| Number of hours (0 - 12) | | | | | | | |

26. In those three months, did you rent or own your home?

- Own
- Rent
- Occupy without paying rent (live with family or friend)
- Live in public housing
- Other, please specify:
- Refused

27. In what zipcode did you live?

a. Please specify: _____ -- _____

28. Did you have any air conditioning in your home?

- No, none
- Yes in one room, used at night
- Yes, in one room used all the time
- Yes in more than one room

29. Did the home where you live have any screens (*escrienes, tela metalico, tela mosquitero*) on windows that open?

- Not on any windows
- On some windows
- On all windows
- Don't know/not sure
- Refused

30. How about screens on the doors that open?

- None on the doors
- On some doors
- On all doors
- Don't know/not sure
- Refused

31. Do you work outside your home?

Yes

No

Refused

32. Think about the place where you spend the most time when you're not at home. This could be the place where you work (if applicable) or a friend or relative's home. How would you describe that place or building in terms of open-ness between the indoors and outdoors? Would you say that the environment is _____? (read each statement and select ONE that best describes the environment)

a. Completely outdoor ("open air") with either no windows or doors with screens

b. Partially indoor and outdoor with some windows or doors having screens

c. Completely Indoor with all windows and doors having screens

d. Indoor with air conditioning

e. Other (please describe): _____

33. What is the highest grade (or year) of regular school you completed?

a) Elementary/Middle school

b) High school

c) College/Junior College

d) Graduate degree

34. How many people are currently living in your household, including yourself?

a. Number: _____

35. Of these people, how many are children ≤ 18 years old?

a. Number: _____

36. Which of these categories best describes your total combined household income for the past 12 months? This should include income (before taxes) from all sources.

a. <\$25,000

b. \$25,000 - <\$50,000

c. \$50,000 - <\$75,000

d. \$75,000 - <\$100,000

e. >\$150,000

f. Don't know/not sure

g. Refused

37. During the three months before had blood drawn for the Zika test, did any members of your household have an illness with rash, fever, or body pain?

No [**Skip to question 38**]

Yes

How many people were ill? _____

Did this include your sex partner or husband? _____

Were they tested for Zika?

No

Don't know/not sure

Refused

Yes

Did a healthcare provider tell them they had Zika?

Yes

No

Don't know/not sure

Refused

Their opinion about what is needed and how to reach pregnant women

38. What do you think is needed or that needs to happen in order to protect pregnant women from getting infected with the Zika virus? [capture verbatim responses]

Thank you for answering these questions! Your answers will help us in our efforts to keep pregnant women and their babies healthy.

Do you have any more questions?